



# Richard Johnson & Associates

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February 25, 2010

Mr. Glenn Adamick JBS Development 27441 Tourney Road, Suite 260 Valencia, CA 91355

RE: Vista Canyon Project- Off Site Oak Tree Report

City of Santa Clarita, California

Dear Mr. Adamick:

Pursuant to your request, an Oak Tree Resource Assessment Survey has been conducted by Richard Johnson & Associates Inc. (RJA) in late February to ascertain base line data in regard to the current condition of the existing City of Santa Clarita ordinance protected oak trees located off of the Vista Canyon project site and adjacent to Sand Canyon and Lost Canyon Road in locations near the intersection of these two roads. Street and trail improvements associated with the Vista Canyon project would result in encroachment into the "Protective Zone" of these two trees.

Specifications and photographs are included in this report related to individual tree species, size and overall condition.

All trees have been given a current International Society of Arboriculture (ISA) dollar value.

Respectfully submitted by,

RICHARD JOHNSON & ASSOCIATES, INC.

CERTIFIED ARBORIST

OSCE

AMERICAN SOCIETY

CONSULTING ARBORIST

Sean Brown – ISA Certified Arborist- WE-6913A Member – American Society of Consulting Arborists

## **Table of Contents**

Survey Methodology	<u>3</u>
ISA Valuation Methodology	3
Rating Review	4
Survey Result Summary	<u>5</u>
Tree Data	<u>5</u>
Tree Driplines	<u>5</u>
Specific Tree Notes	<u>5</u>
Proposed Encroachments	<u>6</u>
Tree Impact Status Details	7-10
ISA Valuation Worksheets	11-12
Oak Tree Photographs	12-17
Aerial View	18

## **Survey Methodology:**

- Reference material used:
  - o A site grading detail and oak tree map supplied by Alliance Land Planning and Engineering Inc.
- Tree diameter was field measured approximately 4.5 feet above grade with a LUFKIN diameter tape measure. This measurement is referred to as **DBH** (Diameter at Breast Height). Where low branching interfered with measuring the tree diameter at 4.5 feet, the measurement was moved and is noted in the report.
- Existing tree tags were utilized for this report.
- The surveyed trees were photographed with a Kodak digital camera to facilitate reader ease in identification. These pictures are for reference only and should not be used to ascertain actual condition and size of the surveyed tree specimens.
- The City of Santa Clarita, the jurisdiction under which the referenced project resides, mandates that each
  native tree specimen located on site be surveyed to ascertain a dollar value based on utilization of the
  methodology outlined by the International Society of Arboriculture (ISA

#### **ISA Valuation Methodology**

The values detailed in this report are based on guidelines established by the International Society of Arboriculture, Council Of Tree & Landscape Appraisers (CTLA) *Guide To Plant Appraisal*, 9<sup>th</sup> Edition, 2000, considered the industry standard in plant appraisals. The *Species Classification and Group Assignment 2004*, a regional supplement to the CTLA published by the Western Chapter of the ISA, was also utilized to set price per square inch of trunk.

The Trunk Formula Method was utilized to determine a value for the oak tree specimens located at the referenced site. It is important to note that this method does not take into consideration any cost for establishment. Current replacement price for a 60 inch box *Quercus* species was ascertained by obtaining a current nursery verbal quote. Price per square inch in caliper (diameter) was then calculated. The basic formula value was subsequently determined based on this trunk diameter and the condition/field rating given. Additional factors included tree species and percentage values for site location, contribution and tree placement for each individual tree. Where multiple trunks were present, only trunks that contributed proportional to the canopy were used in the value calculations. In cases where a high number of small diameter trunks existed, a similar sized tree with one trunk from the site was used as a comparison trunk diameter for the value calculation.

#### **Rating Review:**

Individual species have been field rated in regard to form and health based on an A, B, C, D, F scale. The letter E is not utilized as a rating classification. Trees were also given a vigor rating as a percentage separate from the overall grade of the tree. The vigor represents the specimens' strength of growth

- A That tree is rated as an excellent specimen and needs no special attention at this time as long as construction and development impacts do not negatively effect its environment.
- B That condition of tree is average to slightly above average with regard to health and structure. Tree may have indicated possible need for minor pruning (deadwood removal). Implementing reasonable preservation procedures and practices, tree has excellent potential to survive planned development if construction guidelines and post-construction maintenance is followed.
- That condition of tree indicates need for moderate to extensive corrective maintenance with no assurance it will survive construction impact. Tree may be in good physiological condition while displaying one or more structural defects. Tree may display symptoms/signs of stress or decline due to adverse abiotic and/or biotic conditions.
- **D** That tree has serious problems with regard to health, disease, or structure such that it cannot be remedied through reasonable preservation procedures and practices.
- **F** No signs of life. No viable foliage.

Tree Vigor: <50% Very poor

**50%-60%** Poor

**60%-75%** Below Average **75%-85%** Average

**85%-100%** Good

It is important to note that the information included in this report was collected during an above ground visual observation consistent with professional standards. No extensive internal tree or subsurface investigation was made. Trees are living entities and subject to stress and disease that may not be apparent during cursory inspection. Therefore, no guarantee is given or implied that any of the trees will survive planned construction activity and/or relocation.

### **Survey Result Summary**:

	Total	Tree Tag Numbers		
Trees Surveyed	2	25B,45		
*Bold indicates Heritage Tree (2)				

## **Tree Data**

Tree#	DBH	Species	Grade	Vigor	Structure	Impact Status	ISA Value
25b	55.5	Q. agrifolia	B-	Average	Fair	Encroach	\$ <u>59,600.00</u>
45	43.3	Q. agrifolia	B-	Good	Fair to Good	Encroach	\$ <u>50,000.00</u>

## **Tree Driplines**

Tree#	N	NW	W	sw	S	SE	E	NE
25b	28	23	19	29	32	29	4	40
45	23	22	21	21	16	22	20	27

## **Specific Tree Notes**

Tree#	Notes	Recommendations as for current condition.
25B	Tree is located approximately 7 feet to the east of the pavement for Sand Canyon Road .3 miles south of the Sand Canyon/Lost Canyon intersection. Tree displays old fire damage/scars. Some hollow/decay at root buttress is previous fire and/or mechanical damage due to adjacent road. Some pruning wounds. Crown has been pruned high for vehicular clearance. Some epicormic growth from old wounds in upper canopy. Some included bark at main crotch. Pit in upper secondary crotch. Top of crown slightly thin. Some landscaping under the tree includes turf on the east side and succulents/natives on the west side. Except for the existing planter (approx 14'X35') tree is surrounded by pavement.	None.
45	Tree is located approximately 4 feet north of the pavement for Lost Canyon Road and west of the Sand Canyon/Lost Canyon intersection. Tree displays old fire damage/scars. Deep cavity/hollow in trunk. Some hollow section of upper main limbs. Old major wound closure at east base of trunk. Evidence of Oak Twig Girdler damage throughout canopy.	None. Oak Twig girdler is a common pest among this species and control is generally not warranted.

"Heritage Oak Tree" shall mean any oak tree measuring one hundred eight (108) inches or more in circumference or, in the case of a multiple trunk oak tree, two (2) or more trunks measuring seventy-two (72) inches each or greater in circumference, measured four and one-half (4.5) feet above the natural grade surrounding such tree. In addition, the Planning Commission and/or City Council may classify any oak tree, regardless of size, as a heritage oak tree if it is determined by a majority vote thereof that such tree has exceptional historic, aesthetic and/or environmental qualities of major significance or prominence to the community.

## **Proposed Encroachments**

RJA Inc. 2-25-2010

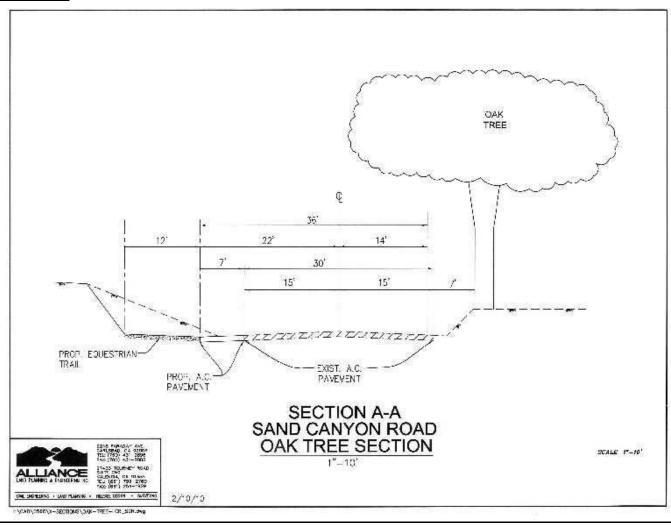
Tree#	Notes Based on information provided by client	Recommendations
1100#	based on information provided by chefit	Protective fencing must be installed around tree prior to and during entire encroachment period. All work within the "Protective Zone" must be monitored by project Arborist or similarly qualified person.
25B	As detailed on Sand Canyon Road Oak Tree Section A-A, existing pavement dimensions will be increased, primarily on the south side of the road. Minor grading will be needed to create the additional road bed.	Due to the fact that proposed infrastructure improvements closely match the existing infrastructure dimensions, tree impacts are expected to be minimal. In the case of root structure exposure due to proposed construction, all roots should be cleanly cut back to below grade, backfilled with soil and surrounding soil soaked with water.
		Protective fencing must be installed around tree prior to and during entire encroachment period. All work within the "Protective Zone" must be monitored by project Arborist or similarly qualified person.
	As detailed on Lost Canyon Road Oak Tree Section A-A, approximately six feet of pavement would be removed and replaced with curb, gutter and a decomposed granite trail.	Due to the fact that proposed infrastructure improvements closely match the existing infrastructure dimensions, tree impacts are expected to be minimal. In the case of root structure exposure due to proposed construction, all roots should be cleanly cut back to below grade, backfilled with soil and surrounding soil soaked with water.
45	Minor grading will be needed.  Pruning will be needed to provide a minimum of 12 ft clearance over the trail.	The portion of the canopy that will need to be pruned for clearance is minor and is not expected to severely impact tree health.

"Encroachment" shall mean any intrusion into the protected zone of an oak tree which includes, but is not limited to, pruning, grading, excavating, trenching, dumping of materials, parking of commercial vehicles, placement of incompatible landscaping or animal corrals, storage of materials or equipment, or the construction of structures, paving or other improvements. For purposes of this section, encroachment shall not include the action of a person physically entering the protected zone of an oak tree.

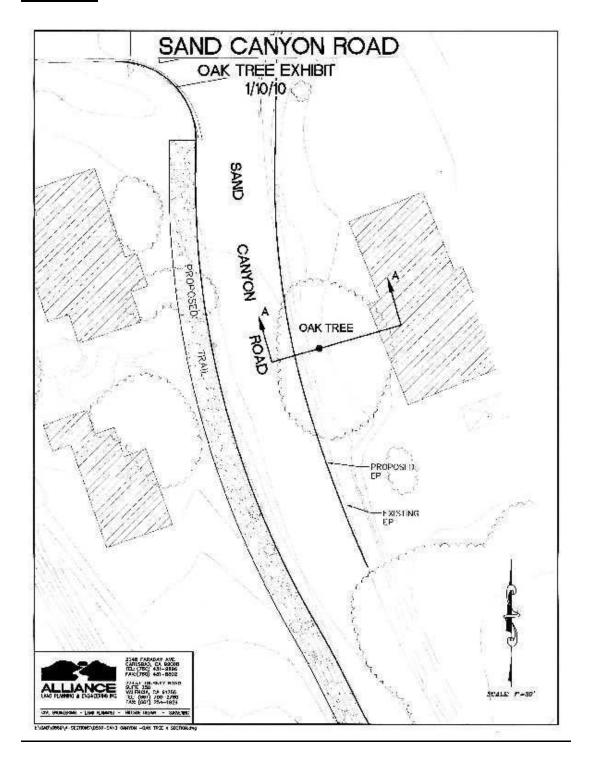
"Protective Zone" – An area extending from the trunk to five feet outside the edge of the outer edge of tree dripline or 15 feet outward from the trunk, whichever is the greatest distance.

## **Tree Impact Status Details**

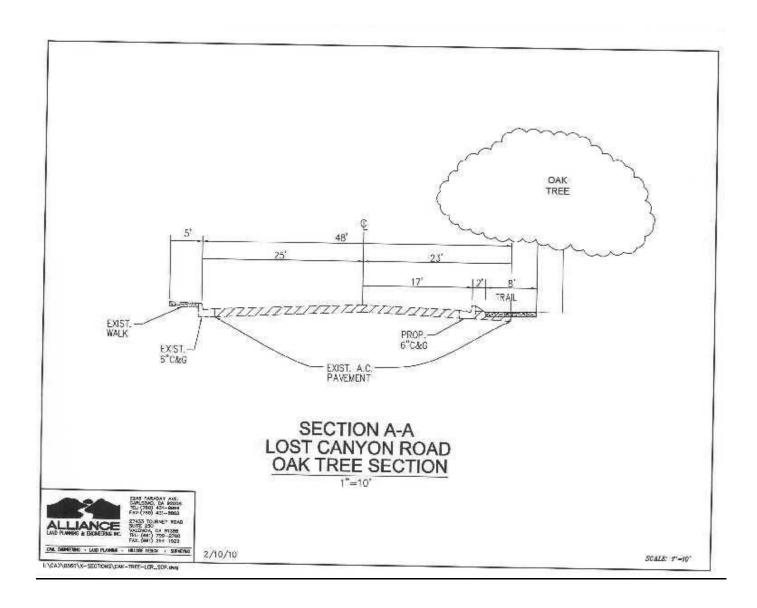
## **Tree #25B**



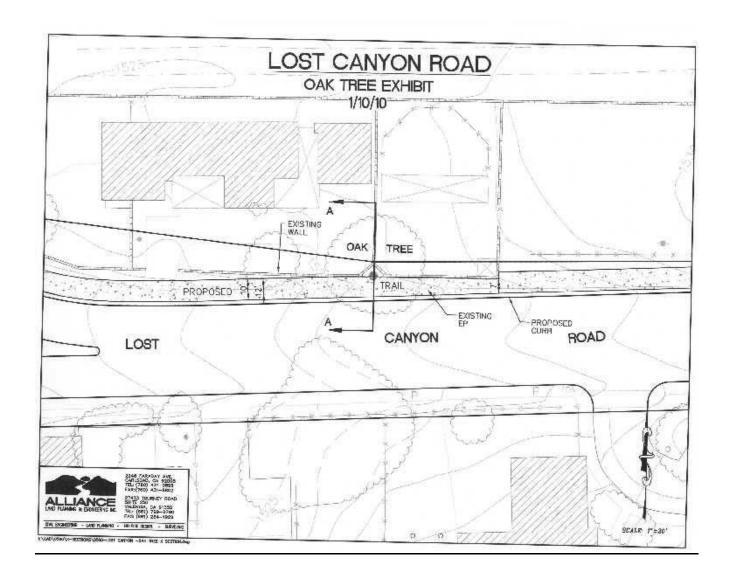
## **Tree #25B**



## **Tree #45**



## Tree #45



#### **ISA Valuation Worksheets**

#### **Trunk Formula Method Work Sheet**

Case # Oak Tree #25B Property Vista Canyon Project - Off-Site Oak Tree Report Date February 25, 2010

Appraiser Richard Johnson & Associates Inc.

Field Observations

- 1. Species Quercus agrifolia
- 2. Condition 80 \*%
- 3. Trunk Circumference in/cm Diameter 55.5 in/cm
- 4. Location% = [Site  $\underline{50}$ % + Contribution  $\underline{90}$ % + Placement  $\underline{50}$  %] /3 =  $\underline{63}$ %

Regional Plant Appraisal Committee and/or Appraiser-Developed or Modified Information

- 5. Species rating
- <u>100 %</u>
- 6. Replacement Tree Size (diameter) <u>5.5</u> in/cm (Trunk Area) <u>23.75</u> in2/cm2 Tar
- 7. Replacement Tree Cost \$ 1,600.00

(see Regional Information to use Cost selected)

- 8. Installation Cost \$ 1,400.00
- 9. Installed Tree Cost (#7 + #8) \$ 3,000.00
- 10. Unit Tree Cost \$ 67.00 per in2/cm2

(see Regional Information to use Cost selected)

Calculations by Appraiser using Field and Regional Information

11 . Appraised Trunk Area:

(TAa or ATAa; use Tables 4.4-4.7)
or c2 (#3) x 0.08 in2/cm2
or d2 (#3) x 0.785 2,443 in2/cm2

12 . Appraised Tree Trunk Increase (TAincr) =

TAa or ATAa  $\underline{1743}$  in2/cm2 (#11) - Tar  $\underline{23.75}$  in2/cm2 (#6) =  $\underline{1719.25}$  in2/cm2

- **13** . Basic Tree Cost = TAincr (#12)  $\underline{1719.25}$  in2/cm2 x Unit Tree Cost (#10) \$ 6 $\underline{7.00}$  per in2/cm2 + Installed Tree Cost (#9) \$ 3000.00 = \$ 118189.75
- **14 . Appraised Value =** Basic Tree Cost (#13) \$ <u>118189.75</u>

x Species Rating (#5) 100 % x Condition (#2) 80 % x Location (#4) 63 % = \$ 59,567.27

- 15. If the Appraised Value is \$5,000 or more, round it to the nearest \$100; if it is less, round to the nearest \$10.
- **16** . Appraised Value = (#14) \$ 59,600.00

#### **Trunk Formula Method Work Sheet**

Case # Oak Tree #45 Property Vista Canyon Project - Off-Site Oak Tree Report Date February 25, 2010

Appraiser Richard Johnson & Associates Inc.

Field Observations

- 1. Species Quercus agrifolia
- 2. Condition 79 \*%
- 3. Trunk Circumference in/cm Diameter 43.3 in/cm
- 4. Location% = [Site  $\underline{60}$ % + Contribution  $\underline{90}$ % + Placement  $\underline{70}$ %] /3 =  $\underline{73}$ %

Regional Plant Appraisal Committee and/or Appraiser-Developed or Modified Information

- 5. Species rating  $\underline{100\%}$
- 6. Replacement Tree Size (diameter) <u>5.5</u> in/cm (Trunk Area) <u>23.75</u> in2/cm2 Tar
- **7. Replacement Tree Cost** \$ 1,600.00 (see Regional Information to use Cost selected)
- 8. Installation Cost \$ 1,400.00
- 9. Installed Tree Cost (#7 + #8) \$ 3,000.00
- 10. Unit Tree Cost \$ <u>67.00</u> per in2/cm2

(see Regional Information to use Cost selected)

Calculations by Appraiser using Field and Regional Information

11 . Appraised Trunk Area:

(TAa or ATAa; use Tables 4.4-4.7)
or c2 (#3) x 0.08 in2/cm2
or d2 (#3) x 0.785 2,443 in2/cm2

12 . Appraised Tree Trunk Increase (TAincr) =

TAa or ATAa <u>1273</u> in2/cm2 (#11) - Tar <u>23.75</u> in2/cm2 (#6) = <u>1249.25</u> in2/cm2

- **13** . Basic Tree Cost = TAincr (#12)  $\underline{1249.25}$  in2/cm2 x Unit Tree Cost (#10) \$ 6 $\underline{7.00}$  per in2/cm2 + Installed Tree Cost (#9) \$  $\underline{3000.00}$  = \$  $\underline{86699.75}$
- **14** . **Appraised Value** = Basic Tree Cost (#13) \$ <u>86699.75</u> x Species Rating (#5) <u>100</u> % x Condition (#2) <u>79</u> % x Location (#4) <u>73</u> % = \$ <u>49,999.75</u>
- 15 . If the Appraised Value is \$5,000 or more, round it to the nearest \$100; if it is less, round to the nearest \$10.
- 16 . Appraised Value = (#14) \$ 50,000.00

# RJA Inc. 2-25-2010 Vis

## Tree #25B



South canopy



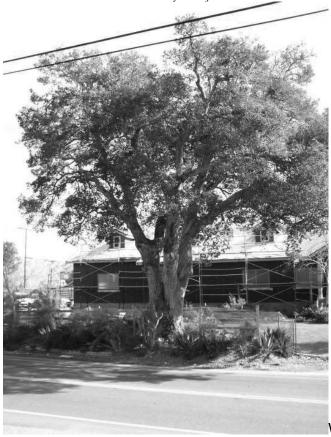
South lower trunk



North canopy



West trunk



West canopy

Tree #45



East canopy



South canopy









Southeast trunk

