To: Broadway Citizens Task Force  
From: Broadway Project Team  
Date: August 4, 2014  
RE: Follow-up to Questions Asked by CTF Members at July 17 CTF Meeting

At the July 17, 2014 CTF meeting, a list of questions CTF members had was compiled and this memo provides the questions and answers for your consideration.

1. **What is the number of people [who signed in at the June 12, 2014 Open House] who live within 1 mile of the project area?**

   The analyst who made the map and crunched the data for the June 12, 2014 Public Open House report was unavailable to provide us this information for the July 17 meeting. However, he has returned to the office and the following data has been updated in the report (now online at: [tdot.tucsonaz.gov/projects/broadway/public-meeting-4](tdot.tucsonaz.gov/projects/broadway/public-meeting-4)):

   “Of the approximately 246 participants who signed in, 226 (92%) left their address information. A GIS analysis of this information shows that **107 of the participants live within one mile of the Broadway project.** This equates to 47% of the people who provided their addresses, and compares to 78% of those providing addresses at Public Meeting #3.

2. **What is the exact language of the ballot? How did the north side widening decision come in to play?**

   The exact language of the RTA Plan ballot is: “Project 17. Broadway: Euclid to Country Club – Widen roadway to 6-lane arterial, plus 2 dedicated bus lanes, bike lanes, and sidewalks.” A sample ballot and the voter informational materials about the ballot is attached for your information.

   The decision to widen to the north side of Broadway was actually made by the Tucson Mayor and Council in 1987, when recommendations from the **1987 Broadway Corridor Transportation Study** were presented for their approval. Key approvals in 1987 were that Broadway should be widened to accommodate 6-lanes, plus 2 lanes for transit, to equal 150-feet in width, and that all the widening would occur to the north side of Broadway. These approvals resulted in an amendment to the **Tucson Major Streets and Routes Plan** in 1989, which reserved the future Right-of-Way for the widening.

3. **How do we address the question of why we are looking at weaving to the south, when it has always been planned to widen to the north?**

   In 2012, the Tucson Mayor and Council empowered the Broadway Citizens Task Force and instructed City staff to review the RTA project scope, consider alternatives, use creative design, and to let the U.S. Environmental Protection Agency’s **Guide to Sustainable Transportation Performance Measures** guide their work.
4. **Rincon Height Historic District: how is it impacted by losing buildings along Broadway?**

Rincon Heights Historic District was listed as a historic district on the National Register of Historic Places in February 2013. The registration documents for the district describe the composition of the historic district as (available online at: oip.tucsonaz.gov/preservation/national-register-historic-districts):

“Within the Rincon Heights Historic District there are 442 properties, of which 288 (65%) are considered contributing properties, 132 (30%) are considered non-contributing properties, and 22 (5%) are vacant (neither contributing nor non-contributing).”

To remain listed on the NRHP as a historic district, at least 51% of properties within the district must be contributors. When demolitions occur to contributors within districts, the composition numbers for the properties included in district are adjusted.

There are 42 properties within the Rincon Heights Historic District that are adjacent to Broadway: 17 contributing, 25 non-contributing, and 0 vacant. The following table explores alternative scenarios for impacts to the historic district from demolition of properties along Broadway. Hypothetical totals are included in the table to show the impacts to the percent of contributing properties. In a scenario in which the current historic district boundaries are kept, the number of contributing properties drops from 288 to 271, with a corresponding drop in percentage of contributors to the district from 65% to 61%. In this scenario, the strength of the historic district, as measured by the percentage of contributing properties, is decreased, but it does not threaten the historic district designation. Among the 27 National Register purely residential historic districts in Tucson, the percentage of historic contributing properties ranges between 57% (Barrio Anita Historic District) and 97% (El Encanto Estates Historic District).

Another scenario provides hypothetical totals if the current southern boundary of the district was redrawn to not include the Broadway properties, after the roadway project. Such a scenario decreases the overall number of properties within the district by 42 properties to 400, with 271 contributing (68%), 107 non-contributing (27%), and 22 vacant (5%). In this scenario, the strength of the historic district, measured as a percentage of contributing properties, is increased.

<table>
<thead>
<tr>
<th></th>
<th>Approved Rincon Heights Historic District (RHHD) Totals</th>
<th>District Properties on Broadway</th>
<th>Hypothetical New District Totals</th>
<th>Hypothetical Amended District Totals (if District Boundaries Redrawn to Exclude Broadway Properties)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Contributing</strong></td>
<td>288</td>
<td>17</td>
<td>271</td>
<td>271</td>
</tr>
<tr>
<td><strong>Non-contributing</strong></td>
<td>132</td>
<td>25</td>
<td>149</td>
<td>107</td>
</tr>
<tr>
<td><strong>Vacant</strong></td>
<td>22</td>
<td>0</td>
<td>22</td>
<td>22</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>442</td>
<td>42</td>
<td>442</td>
<td>400</td>
</tr>
<tr>
<td><strong>Percent Contributors of Total District</strong></td>
<td><strong>65%</strong></td>
<td><strong>4%</strong></td>
<td><strong>61%</strong></td>
<td><strong>68%</strong></td>
</tr>
</tbody>
</table>
5. **What is required by law for ADA for sidewalks?**

The minimum width required for sidewalks to be compliant is 36 inches, or 3 feet. However, as is described in Chapter 4 of the Federal Highway Administration’s “Designing Sidewalks and Trails for Access,” this is not generally acceptable, unless certain conditions apply (see page 4-8 of Chapter 4, accessed online at [www.fhwa.dot.gov/environment/bicycle_pedestrian/publications/sidewalk2/pdf.cfm](http://www.fhwa.dot.gov/environment/bicycle_pedestrian/publications/sidewalk2/pdf.cfm)):

“The pedestrian zone should never be less than 915 mm (36 in), which is the minimum width required for an accessible route (ADAAG 4.3.3, U.S. Access Board, 1991). The minimum width provides sufficient space for people who use mobility aids to travel within the restricted space, since most mobility devices have a maximum width of 710 mm (28 in). However, restricting the pedestrian zone to 915 mm (36 in) prevents passing and does not account for two-way travel, traveling with a sighted guide 1.22 m (48 in) or with a guide animal. This minimum width is only acceptable when:

1. A wider width is impossible;
2. The narrow width continues for as short a distance as possible; and
3. Passing spaces are provided at intervals of no more than 61.0 m (200 ft).”

TDOT’s standard sidewalk width is 6-feet. The guidance from the Institute of Transportation Engineers (ITE) Walkable Urban Thoroughfares Manual for streets and contexts similar to what exists on Broadway is 7.5 to 10.5 feet of sidewalk width, not including furnishing/landscape or edge buffering from traffic) with a predominantly commercial ground floor and 6 to 9.5 feet with a predominantly residential ground floor.

6. **What does law require for bike lanes?**

The State of Arizona traffic laws recognize bicycles as a legal form of transportation, with their use allowed on all roadways except where explicitly prohibited. The City of Tucson Department of Transportation has administrative requirements to include bike lanes on all roadways, at a minimum of 5 feet on roadways with posted speed limits less than 40 mph. TDOT has begun constructing bike lanes at 6 foot widths, to allow for more buffer space between vehicle lanes and bikes. This is being done in conjunction with roadway widening projects where available right-of-way exists. The National Association of City Transportation Officials (NACTO) bicycle design guide defines 6 feet as the desirable width for bicycle lanes adjacent to a curb-face (rather than parking), and for streets with high traffic volumes and regular truck traffic that a buffered bike lane or cycle track be provided.

7. **What are the viable transit options that would be considered for Broadway, for short-term through to long-term? What would be the right width for ‘T’ lanes into the future.**

Please see the separate memo from the project team to the Broadway CTF dated August 4, 2014, reference “August 7, 2014 CTF Meeting Materials for Items 3, 5, and 8. regarding Viable Transit Options for Broadway.”
8. When do we need to be concerned about moving utilities?

Utilities are typically addressed by engineers when projects move into final design (from 30%-100%). The types of utilities that will need to be identified, and then potentially relocated, include electric, water, gas, communications, wastewater/sewer. During this phase, the new locations for the utilities are ultimately determined.

It is typically the responsibility and financial burden of the utility companies - private and public - to move them. The RTA Broadway Project budget has some funding to cover utility work anticipated during construction.

As recommended by Wulf Grote in his February 25, 2014 presentation to the CTF, and as Tucson Department of Transportation Director Daryl Cole communicated at the May 22, 2014 CTF meeting, the concept of relocating all utilities out of the roadway is an important step that aids the future implementation of mass transit guideways, particularly for rail transit like light rail, streetcar, or trolley. This is something that will be considered at every step in the Broadway final design and engineering process.
There are four elements of the comprehensive 20-year transportation plan: roadway improvements, safety improvements, environmental and economic vitality improvements, and transit improvements.

The Roadway Improvement Element includes:
- 35 roadway projects
- 200 new lane-miles
- 10 new or improved grade separations at rail crossings
- 160 intersection improvements
- Corridors to be designed with citizen input

These improvements represent $1.159 billion of RTA revenues or 58% of the RTA funds. In addition, $334 million in development impact fees, federal, state, and regional funds are committed for these projects.

The Safety Improvement Element includes:
- 40 additional intersection safety and capacity improvements, not included in the roadway element
- Elderly and pedestrian safety improvements with an emphasis on safe routes to schools and improved mobility for disabled citizens
- 200 bus pullouts
- Railroad safety improvements and bridge deficiency improvements
- Signal technology upgrades to improve intersection traffic flow

These improvements represent $180 million or 9% of the RTA funding.

The Environmental and Economic Vitality Element includes:
- Connections of greenways, pathways, bikeways, and sidewalks
- (220 new miles of sidewalks, 550 new miles of bicycle lanes and multi-use paths)
- Transportation wildlife linkages to reduce road-kill, protect habitat, and improve driver safety
- Small business assistance, such as advising and coordinating with businesses during planning and construction

These improvements represent $115 million or 6% of the RTA funding.

The Transit Element includes:
- Expanded weekend and evening bus service
- Reduced bus rider wait time
- New and improved express bus routes with new express buses
- Expanded services for the elderly and people with disabilities
- Neighborhood transit circulators in Ajo, Green Valley/Sahuarita, Marana, and Oro Valley with express bus connections to Tucson employment and transit centers
- A new high-capacity streetcar system, including a nearly 4-mile track operating from the University Medical Center, to the University of Arizona campus, to the downtown area and leading to the west side of Interstate 10

These improvements represent $534 million or 27% of the RTA funding. Up to an additional $75 million of federal funds have been committed for the high-capacity streetcar system.

NOTE: For either ballot question I or II to be approved, both the proposed regional transportation plan and the proposed transaction privilege tax must be approved by a majority of the qualified voters voting on the measure. If either ballot question I or II fails to be approved by a majority of the qualified voters voting on the measure, both fail.

**QUESTION 1**
Do you approve the regional transportation plan for Pima County?
A "YES" vote indicates your approval of the proposed regional transportation plan as developed by the regional transportation authority and described in the election materials.
A "NO" vote indicates your disapproval of the proposed regional transportation plan.

**QUESTION 2**
Do you favor the levy of a transaction privilege (sales) tax for regional transportation purposes in Pima County?
A "YES" vote has the effect of imposing a transaction privilege (sales) tax in Pima County for twenty years to provide funding for the transportation projects contained in the regional transportation plan.
A "NO" vote has the effect of rejecting the transaction privilege (sales) tax for transportation purposes in Pima County.
Voters were provided informational brochures describing the upcoming special election ballot. The following pages are an excerpt from that document.
A new high-capacity streetcar system, including a nearly 4-mile track operating from the University Medical Center, to the University of Arizona campus, to the downtown area and leading to the west side of Interstate 10. These improvements represent $534 million or 27% of the RTA funding. Up to an additional $75 million of federal funds have been committed for the high-capacity streetcar system.

Construction Start Periods
The plan defines when construction will start for each project. Four 5-year construction periods have been identified. Fiscal year 2007 begins on July 1, 2006, and ends on June 30, 2007.

- Period 1 extends from fiscal year 2007 to fiscal year 2011
- Period 2 extends from fiscal year 2012 to fiscal year 2016
- Period 3 extends from fiscal year 2017 to fiscal year 2021
- Period 4 extends from fiscal year 2022 to fiscal year 2026

RTA Project List
The chart attached represents the four transportation plan elements: roadway improvement element, safety improvement element, environmental and economic vitality element, and the transit element. The chart describes the location of the roadway improvement element along with the type of improvements, the budgeted amount using the proposed one-half cent excise (sales) tax revenue, the percentage of the funding by each project, non-RTA funds that are committed to the project, and the construction start period.

The locations for the safety element, environmental and economic vitality element, and transit element are throughout the region. Each element is described with its respective one-half cent excise (sales) tax revenue budgets, the percentage of RTA funding for each project, non-RTA funds that are earmarked to the project, and its implementation period.

All dollar amounts are represented in thousands and are in 2006 constant dollars.

Broadway: Euclid to Country Club is listed as project #17, with a scope of: "Widen roadway to 6-lane arterial, plus 2 dedicated bus lanes, bike lanes, and sidewalks."
### RTA Project List In 2006 Dollars (Constant)

<table>
<thead>
<tr>
<th>Project Description</th>
<th>Budget 2006</th>
<th>Percent of FY</th>
<th>Estimated Construction Start Period</th>
<th>Construction End Period</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Roadway Improvement Element</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>28. Speedyway Boulevard, Camino Seco to Houghton Road</td>
<td>$14,127</td>
<td>0.7%</td>
<td>$3,600</td>
<td>1st Period</td>
</tr>
<tr>
<td>29. Houghton Road, Camino Seco to 6-lane arterial</td>
<td>$6,066</td>
<td>0.3%</td>
<td>$3,600</td>
<td>4th Period</td>
</tr>
<tr>
<td>30. 21st Street, Camino Seco to Houghton, 6-lane arterial</td>
<td>$5,571</td>
<td>0.3%</td>
<td>$3,600</td>
<td>3rd Period</td>
</tr>
<tr>
<td>31. Harrison Road, Golf Links to Kingsboro, New bridge over</td>
<td>$6,158</td>
<td>0.3%</td>
<td>$3,600</td>
<td>4th Period</td>
</tr>
<tr>
<td>32. Houghton Road, 1-10 to Tanque Verde, 6-lane arterial</td>
<td>$95,342</td>
<td>4.8%</td>
<td>$65,800</td>
<td>3rd Period</td>
</tr>
<tr>
<td>33. Houghton Road, 110 to Tanque Verde, 6-lane arterial</td>
<td>$9,600</td>
<td>0.5%</td>
<td>$3,600</td>
<td>2nd Period</td>
</tr>
<tr>
<td>34. Pinto Road, 6-lane arterial</td>
<td>$30,785</td>
<td>1.5%</td>
<td>$10,000</td>
<td>1st Period</td>
</tr>
<tr>
<td>35. Pinto Road, 6-31, Continental Ranch to Canoa Road</td>
<td>$15,755</td>
<td>0.7%</td>
<td>$3,600</td>
<td>1st Period</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td><strong>$1,168,889</strong></td>
<td><strong>38.3%</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. Safety Element</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>36. Intersection Safety and Capacity improvements</td>
<td>$100,000</td>
<td>0.0%</td>
<td>$100,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>37. Bikelane Pedestrian Safety Improvements</td>
<td>$30,000</td>
<td>0.7%</td>
<td>$30,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>38. Transit Corridor Bus Pullouts</td>
<td>$30,000</td>
<td>0.7%</td>
<td>$30,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>39. At-grade Pedestrian Safety Bridge Dickek</td>
<td>$15,000</td>
<td>0.3%</td>
<td>$15,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>40. Signal technology improves to improve intersection traffic</td>
<td>$15,000</td>
<td>0.3%</td>
<td>$15,000</td>
<td>All Periods</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td><strong>$180,000</strong></td>
<td><strong>0.5%</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Environmental and Economic Vitality Element</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>41. Greenways, Pathways, Bike Lanes, and Sidewalks</td>
<td>$30,000</td>
<td>0.0%</td>
<td>$30,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>42. Transportation-related Critical Wildlife Linkages</td>
<td>$30,000</td>
<td>0.0%</td>
<td>$30,000</td>
<td>All Periods</td>
</tr>
<tr>
<td>43. Small Business Assistance</td>
<td>$30,000</td>
<td>0.0%</td>
<td>$30,000</td>
<td>All Periods</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td><strong>$90,000</strong></td>
<td><strong>0.2%</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. Transit Element</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>44. Weekday Evening Bus Service Expansion</td>
<td>$37,717</td>
<td>0.0%</td>
<td>$37,717</td>
<td>1st Period</td>
</tr>
<tr>
<td>45. Weekend Bus Service Expansion</td>
<td>$16,199</td>
<td>0.0%</td>
<td>$16,199</td>
<td>1st Period</td>
</tr>
<tr>
<td>46. Bus Frequency and Area Expansion</td>
<td>$178,322</td>
<td>0.0%</td>
<td>$178,322</td>
<td>1st Period</td>
</tr>
<tr>
<td>47. Special Needs Transit Safety and Disabled Citizen</td>
<td>$108,830</td>
<td>0.0%</td>
<td>$108,830</td>
<td>1st Period</td>
</tr>
<tr>
<td>48. Neighborhood Circulator Bus Systems</td>
<td>$24,859</td>
<td>0.0%</td>
<td>$24,859</td>
<td>1st Period</td>
</tr>
<tr>
<td>49. Express Service Expansion</td>
<td>$65,001</td>
<td>0.0%</td>
<td>$65,001</td>
<td>1st Period</td>
</tr>
<tr>
<td>50. Downtown/University High-capacity transit (streetcar)</td>
<td>$67,277</td>
<td>0.0%</td>
<td>$67,277</td>
<td>1st Period</td>
</tr>
<tr>
<td>51. Park In-Ride transit centers</td>
<td>$14,700</td>
<td>0.0%</td>
<td>$14,700</td>
<td>1st Period</td>
</tr>
<tr>
<td><strong>Subtotal</strong></td>
<td><strong>$338,800</strong></td>
<td><strong>0.0%</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Grand Total</strong></td>
<td><strong>$1,997,689</strong></td>
<td><strong>100.0%</strong></td>
<td></td>
<td><strong>$490,432</strong></td>
</tr>
</tbody>
</table>

*Note: The large roadway construction projects are broken into several segments, hence, construction may start in multiple periods. The Safety Element and the Environmental and Economic Vitality Element reflect construction expenditures in each period. The Transit Element will begin service in the first period with continuous operations through FY 2016. Construction for the streetcar begins in the first period, but will not be fully completed until the second period. Federal funds for the high capacity streetcar are capped at $75 million.*
Plan Accountability

The plan includes accountability measures, oversight provisions and procedures for plan amendments.

Among the provisions that are required by law:

- An annual report stating revenues received during the fiscal year and all expenditures will be printed in two local newspapers by January of each year.
- Definition at the time of election of the cost, scope and construction start period of each project.
- Voter approval for substantial changes to the elements of the plan.

Pursuant to Arizona Revised Statutes section 48-5309 (B and D):

(B) The regional transportation plan may not be amended to add or delete an element or substantially change an element without prior approval of the electorate at a general or special election pursuant to subsection D of this section. The prior approval of the electorate required by this subsection is waived if a political subdivision causing changes within its jurisdiction to the regional transportation plan incurs the incremental costs of implementing the proposed changes.

(D) If a substantial change occurs, the board of directors shall request the county board of supervisors to provide a ballot proposition for consideration of a revised regional transportation plan on or before the date of the next general election. The board of supervisors shall provide the proposition at the next general election. If a majority of the qualified electors voting on the issue does not approve a revised regional transportation plan, expenditures authorized pursuant to section 48-5308, subsection C, except those obligated as of the date of the general election, are prohibited.

In addition, the governing board will establish a Citizens’ Oversight Committee to ensure that the plan will be implemented in accordance with the ballot measure and will certify that the voters’ desires are respected throughout the 20-year term.

RTA Funding

Over the 20-year period, the excise (sales) tax is forecasted to bring $2.1 billion of revenues in 2006 constant dollars. The revenue forecast was prepared by the University of Arizona’s Eller College of Management. The excise tax will be assessed on business transactions that are subject to the state transaction privilege tax at a rate of 10% of the rate prescribed by Arizona Revised Statutes section 42-5010 subsection A, applying as of January 1, 1990. Essentially, the resulting tax will be 0.5% or 1 cent per $2 purchase on state taxable items. The categories that are assessed include:

Retail Sales – Includes retail sales of automobiles, durable goods and other general merchandise, apparel, building materials, furniture, and other tangible personal property. Food and prescription drugs are excluded.
Contracting – Includes prime contracting and dealership of manufactured buildings and owner-builder operations.

Utilities – Includes producing and/or furnishing to consumers electricity, natural or artificial gas and water.

Restaurant and Bar – Includes sales at restaurant and drinking establishments.

Rental of Real "Commercial" Property – Includes leasing or renting of real "commercial" property, hotels and motels.

Rental of Personal Property – Includes leasing or renting tangible personal property such as leased vehicles and construction equipment.

Other – Includes operations of amusement places, intrastate telecommunications services, job printing, engraving, embossing and publication, publication of newspapers, magazines and other periodicals, intrastate transportation of persons, freight or property, and intrastate operation of pipelines for oil or natural or artificial gas.