

Member Governments

Town of Carrboro
Town of Chapel Hill
County of Chatham
City of Durham
County of Durham
County of Orange
NC Department of
Transportation
Town of Hillsborough

**DURHAM – CHAPEL HILL-CARRBORO
METROPOLITAN PLANNING ORGANIZATION
TECHNICAL COORDINATING COMMITTEE (TCC)**

AGENDA

**June 20, 2011
1:00 pm**

**City Council Committee Room
2nd floor Durham City Hall**

- 1. Preliminaries**
- 2. Adjustments to the Agenda**
- 3. Public Comments**

ACTION ITEMS

**4. Approval of May 25, 2011 TCC Meeting Minutes
(Attachment 4)**

A copy of the May 25, 2011 minutes is enclosed as Attachment 4.

TCC Action: Approve minutes of the May 25, 2011 TCC meeting.

**5. Triangle Regional Transit Program – Bus and Rail Investment Plan
(Attachment 5, 5A, 5B, 5C, 5D, 5E)**

**Patrick McDonough, Triangle Transit
Andy Henry, LPA Staff**

The TAC authorized the release of the Durham and Orange Bus and Rail Investment Plans at their May 11th meeting. At the time, the release was based on a presentation of the key service and financial information for the bus and rail transit systems. The full report for the Durham and Orange plans were released on June 1st and June 8th, respectively, and the MPO conducted six public workshops and made a Web-based survey and comment card available to gather public input on the plan. Attachment 5 lists the public workshops and summarizes the public input from the workshops, survey and comments cards. Attachment 5A is a complete compilation of all comments from these sources. The MPO Web site, www.dchcmpo.org, provides copies of the draft plans, maps and other materials made available to the public.

Local elected officials (including Durham City Council, Chapel Town Council and the Carrboro Board of Aldermen) approved resolutions of support for their respective Bus and Rail Investment Plans. Attachment 5B is a copy of these resolutions. The Durham Board of County Commissioners (BOCC) conducted a public hearing on the Durham Plan and proposed one-half cent sales tax for transit at their June 13th meeting, and will consider approval of the Durham County Plan and sales tax referendum at their June 27th meeting. The Orange Board of County

Commissioners (BOCC) discussed the Orange Plan and referendum at a recent meeting and will discuss the need for further analysis and a schedule at their June 21st meeting. The Orange BOCC is not expected to take action on a referendum this year.

State legislation (HB 148) requires the MPO to approve a financial plan before a referendum can occur on a one-half cent sales tax for transit. The MPO will consider approval of the financial plan (e.g., Bus and Rail Investment Plan) for Durham County. Given that the Orange BOCC is not expected to take action on a transit sales tax referendum this year, no action on the Orange financial plan is necessary at this time.

Attachment 5C is a copy of the final Durham County Bus and Rail Investment Plan. The following changes have been made to the draft Plan:

1. Sales Tax Revenue -- The annual proceeds from a one-half cent sales tax were increased from \$17.3 million to \$18.4 million based on the most recent data from the Durham County government (see page 12).
2. Commuter Rail – Weekend service was not included in the draft Plan. The final Plan indicates that weekend service will be considered based on future ridership demand (see page 7).
3. Northern Durham Park-and-Ride – A park-n-ride facility was added to the area near the intersection of N. Roxboro, Infinity and Latta roads (see map on page 9).
4. Borrowing and Passenger Revenue – Borrowing has been deleted and Passenger Revenue has been added as a Revenue Source (see page 12).

Attachment 5D is a copy of the draft Bus and Rail Investment Plan in Orange County. This is the same draft Plan that was released to the public – no changes have been made.

Attachment 5E is a draft copy of the presentation for this agenda item.

TCC Action: Recommend that the TAC approve the final Durham County Bus and Rail Investment Plan.

6. Triangle Regional Transit Program – Locally Preferred Alternative **(No Attachments)**

Greg Northcutt, Triangle Transit
Andy Henry, LPA Staff

Triangle Transit continues work on the Alternatives Analysis documents for the fixed-guideway alternatives between Durham and Chapel Hill and between Durham, Raleigh and eastern Wake County. The documents are expected to be finished the second week of July 2011. In order to keep the regional rail process moving forward, the TCC will consider requesting that the TAC provide authorization at their June 22nd meeting to release the draft Alternatives Analysis documents to the public when those documents are ready. The TCC will also consider making a recommendation for a public review process to move from the Alternatives Analysis to identifying the Locally Preferred Alternative.

LPA Staff anticipates the following schedule for the Locally Preferred Alternative:

- Triangle Transit completes draft Alternatives Analysis for two corridors – 2nd week of July.

- DCHC MPO releases draft Alternatives Analysis for public review – 2nd week of July.
- Local governments review Alternatives Analysis and provide comments to MPO – July through October 12.
- TCC reviews and comments on draft Alternatives Analysis – July 27.
- TAC reviews and comments on draft Alternatives Analysis – August 10.
- TAC conducts public hearing – September 14.
- TCC recommends Locally Preferred Alternative – September 28.
- TAC reviews and takes action on Locally Preferred Alternative – October 12

TCC Action: Recommend that the TAC authorize the LPA to release the draft Alternatives Analysis when completed.

7. FY 2014-2020 Transportation Improvement Program – Regional Priority List
(Attachment 7, 7A, 7B, 7C, 7D)

Ellen Beckmann, LPA Staff

NCDOT has begun developing the process for prioritizing projects for the next Transportation Improvement Program (TIP). All projects previously submitted by the MPOs, RPOs, and Divisions are already in the prioritization database and will be scored. MPOs, RPOs, and Divisions are asked to submit any new projects by July 2011. MPOs, RPOs, and Divisions will then be asked to rank projects by November 2011.

Attachment 7 is an overview of the 2014-2020 TIP development process. Attachment 7A is a copy of the local priority lists. Attachment 7B is a table of the local priority list projects grouped by mode. Attachment 7C is a summary comparison of the ranking methodologies for NCDOT, the adopted MPO methodology, and the TIP Subcommittee recommendation for changes to the MPO methodology. Attachment 7D is a document describing the recommended ranking methodology for the 2014-2020 TIP.

TCC Action: Recommend the submission of up to 15 new highway projects, 10 new bicycle projects, 10 new pedestrian projects, and transit projects to NCDOT SPOT. Recommend approval of the MPO ranking methodology.

8. Ramp Metering Study
(Attachment 8)

Joey Hopkins, NCDOT

KoSok Chae, LPA Staff

The North Carolina Department of Transportation (NCDOT), Durham-Chapel Hill-Carrboro MPO, and Capital Area MPO propose a joint feasibility study for possible Ramp-Metering deployment along segments of interstate and other selected freeway facilities in DCHC and CAMPO metropolitan areas. The scope of the study is yet to be determined, but the intent is to provide recommendations for any revised or new legislation needed to implement and manage ramp metering; to develop a framework for a marketing/outreach plan to stakeholders; to develop typical installation criteria including detection on mainline, ramps, and side streets; to develop criteria to rank potential ramp metering projects/segments by county; and to develop performance measures to show effectiveness of ramp metering. The specific routes will be determined during scoping but it is anticipated that the study will include most of the interstate facilities in both MPO areas and some additional freeway facilities.

The estimated cost is \$400,000 and NCDOT plans to fund \$350,000 and requests that the DCHC MPO and Capital Area MPO split the other \$50,000 in proportionate manner.

The TCC received a presentation on this item at its May 11, 2011 meeting and asked the TCC subcommittee would discuss / develop the study scope and funding.

The TCC subcommittee discussed the scope and funding at their June 7, 2011 meeting. The discussed items were

- A prorated cost share: The recommended split is 30% DCHC and 70% CAMPO.
- Non-federal match: NCDOT can fund the non-federal match if NCDOT handles this with an internal transfer. If there is a desire by the MPO to handle through a municipal agreement then the MPO would be responsible for the match. Advantage of an internal transfer method is to expedite its processing speed. Transparency is a typical advantage of a municipal agreement method, however it is anticipated that the processing will take a while.
- Spatial coverage scope: interstate and freeway in DCHC and CAMPO metropolitan areas.
- Temporal coverage scope: Based on current traffic and long-term traffic projections, the actual year (i.e. 2015, 2025, 2035) will be determined as part of scoping.
- Study period: The project will be lasting one year and if funding is approved should start this calendar year.

TCC Action: Recommend that the TAC endorse feasibility study and instruct staff to work with NCDOT and the CAMPO to develop the study scope and, agree to provide a portion of the \$50,000 funding needed for the study.

9. Section 5307 Funding

(Attachment 9, 9A, 9B)

Maricia Brown, LPA Staff

Section 5307 funds are allocated to urbanized areas for transit capital and operating assistance and for transportation related planning. The MPO's full apportionment was released by FTA in May. The MPO transit operators met to develop a recommended distribution of the MPO's FTA Section 5307 funds. A letter to FTA regarding the allocation of these funds among the transit operators (DATA, CHT, and TTA) will need to be approved. Once the allocation has been approved by the TAC, the transit operators will be authorized to seek application for planning related reimbursement expenses. Attachment 9 is the memo detailing FFY11's process and explanation of current issues. Attachments 9A and 9B are alternate letters of recommendation for FTA.

TCC Action: Recommend that the TAC endorse a letter to FTA for the distribution of Section 5307 funds.

10. FY 2012-2018 Metropolitan Transportation Improvement Program, 2035 Long Range Transportation Plan Amendment #2, and Air Quality Conformity Process

(No Attachments)

John Hodges-Copple, TJ COG

Ellen Beckmann, LPA Staff

Andy Henry, LPA Staff

The DCHC MPO will be approving three documents by August 2011:

- the FY 2012-2018 Metropolitan Transportation Improvement Program;
- Amendment #2 to the 2035 Long Range Transportation Plan; and
- corresponding air quality conformity determinations.

The MTIP must be coordinated with the State Transportation Improvement Program which is scheduled to be approved by the Board of Transportation in July 2011. The LRTP amendment is needed to ensure that the MTIP/STIP and the LRTP are consistent. Since both documents are subject to the air quality conformity process, air quality conformity determination reports must be prepared and approved.

The MPO's public involvement policy requires that the Air Quality Conformity Report be released for a 30-day public review and comment period and that a public hearing be conducted to receive comments on the amendment and Conformity Report. A draft Air Quality Conformity Report is being prepared by the Triangle J Council of Governments, covering the DCHC MPO, Capital Area MPO and NCDOT elements. This determination report is scheduled to be available for review by mid-June (the report may be complete by the June 22 TAC meeting). NCDOT and NCDAQ will review the document prior to MPO availability.

The following scheduled is proposed for the Air Quality Conformity Determination Report:

- June 2011 – TAC authorizes the release of the Air Quality Conformity Determination Report document, upon availability
- August 10, 2011 – TAC conducts public hearing and adopts the final MTIP, 2035 LRTP Amendment, and Air Quality Conformity Determination Report

TCC Action: Recommend that the TAC release the Air Quality Conformity Determination Report for public comment and schedule a public hearing at the August 10, 2011 TAC meeting.

11. Congestion Mitigation Air Quality and Surface Transportation Program Direct Attributable Call for Projects

(Attachment 11)

Ellen Beckmann, LPA Staff

The DCHC MPO has programmed CMAQ and STPDA funding through FY 2015. The MPO can program STPDA funding for FY 2016-2020 in the FY 2012-2018 TIP/work plan. NCDOT plans to ask MPOs to submit applications for CMAQ funding by October 31, 2011 in coordination with the submission of projects for Prioritization 2.0 for the 14-20 TIP. An email from NCDOT says that more information about the CMAQ call for projects will be sent out by June 30, 2011.

The LPA suggests that the call for STPDA and CMAQ funding be coordinated. A suggested schedule is:

- June TCC - discuss call for projects
- July TCC - share NCDOT information with TCC
- Early August deadline for project applications
- August TCC - review applications – make recommendation or refer to subcommittee
- September TCC - make recommendation to TAC
- October TAC - approve projects

For the last STPDA call for projects, funding was distributed by project type, mode, and jurisdiction according to a formula. A memo describing this formula from the May 14, 2008 TAC meeting is included as Attachment 11. The rescission required the MPO to somewhat modify STPDA project funding. The TCC should discuss how the STPDA process could be improved and if there are major program goals for the next call for projects.

TCC Action: Discuss schedule and goals for the next call for CMAQ and STPDA projects.

REPORTS FROM STAFF:

12. Reports from Staff

(Attachment 12)

Felix Nwoko, LPA Staff

TCC Action: Receive Report from staff

13. Report from the Chair

Mark Ahrendsen, TCC Chair

TCC Action: Receive Report from TCC Chair

14. NCDOT Report

(Attachment 14)

Wally Bowman, Division 5 – NCDOT

Mike Mills, Division 7 – NCDOT

INFORMATIONAL ITEMS

Adjourn

Next meeting: July 27, 2011

43 *According to the TCC Bylaws, when a member misses three meetings in a row he/she is not considered a*
44 *voting member on the third consecutive missed meeting. Voting privileges are reinstated on the second*
45 *consecutive meeting that he/she attends.*

46
47 Mark Ahrendsen, TCC Chair, called the meeting to order at 9: 06 a.m. The Alternate Voting

48 Members were identified and are indicated above.

49 **PRELIMINARIES:**

50 **Adjustments to the Agenda**

51 Julie Bollinger with NCDOT will discuss the handout that was distributed at the beginning of the
52 meeting on the 2040 Plan during the NCDOT Reports. Maricia Brown distributed a handout on JARC/NF
53 which will be discussed during agenda item #8 and an informational item for Section 5307 which will be
54 discussed during the Reports from Staff.

55 **Public Comments**

56 There were no public comments.

57 **ACTION ITEMS:**

58 **Approval of April 27, 2011 TCC Meeting Minutes (Attachment 4)**

59 A motion was made by Felix Nwoko and seconded by David Bonk to approve the April 27, 2011
60 TCC Meeting Minutes. The motion carried unanimously.

61 **Triangle Regional Transit Program (Attachment 5)**

62 Mark Ahrendsen provided an introduction for the Triangle Regional Transit Program. Mark
63 Ahrendsen stated that the TAC authorized the release of the plan for public comment at their May 2011
64 meeting. Ellen Beckmann stated five public outreach meetings have been scheduled. The June TAC
65 meeting is scheduled for June 22, 2011. Mark Ahrendsen stated it could be useful to have a TCC
66 meeting before the TAC meeting to discuss the transit Section 5307 sub-allocation, TIP, and other items.
67 David Bonk stated the Town of Chapel Hill Council is hearing the transit plan item tonight. Jeff Brubaker
68 stated that the Town of Carrboro Board of Alderman approved a resolution in support of putting the

69 referendum on the November ballot and recommending an interlocal agreement endorsing the plan.
70 Mark Ahrendsen stated the Durham City Council will consider the transit plan on June 6, 2011 and the
71 Durham Board of County Commissioners has received a recommendation from the manager. Karen
72 Lincoln stated the Orange County Board of County Commissioners received a presentation. It is on the
73 agenda for the first meeting in June. The County thought they would approve before the MPO, but the
74 feeling is that they won't be ready for a referendum this fall. Wib Gulley stated the Orange County
75 BOCC is concerned that it would jeopardize the other referendum this fall. They want to see the plan go
76 forward but it may consider a referendum later. It is not a question of whether to take this up, but a
77 matter of when to take it up. Wib Gulley stated both counties want to act by June. Tom King stated he
78 doesn't know about the Town of Hillsborough. Wib Gulley stated a presentation is scheduled for June
79 13, 2011.

80 Mark Ahrendsen stated we should bring something back to the TAC in June. David Bonk stated
81 the plans are related, but can stand by themselves. Mark Ahrendsen stated we can't control what other
82 jurisdictions do just the MPO's action. The schedule would require the TCC to meet June 20 or June 21,
83 2011. Wib Gulley stated Orange County may want public involvement later, not in June.

84 The TCC meeting in June will be held on June 20, 2011 in the afternoon. David Bonk stated the
85 TAC meeting will be on June 22, 2011 at 9:00 a.m. David Bonk questioned if there should be a public
86 hearing. If so, will it be an evening meeting?

87 John Tallmadge asked for clarification on the reports. It was decided that there would be two
88 separate reports, one for each county that could hopefully be merged.

89 Greg Northcutt stated they are proceeding for a LPA decision by the end of September 14.
90 Jonathan Parker stated the report should be ready to be released by June 22, 2011. David Bonk stated
91 that if the Town of Chapel Hill doesn't consider it on June 27, 2011 they don't meet again until
92 September 12, 2011.

93 **FY 2012-2018 Metropolitan Transportation Improvement Program, 2035 Long Range Transportation**
94 **Plan Amendment #2, and Air Quality Conformity Process (Attachments 6, 6A, 6B, 6C, and 6D)**

95 Ellen Beckmann provided an introduction and update for the FY 2012-2018 Metropolitan
96 Transportation Improvement Program, 2035 Long Range Transportation Plan Amendment #2, and Air
97 Quality Conformity Process, along with the attachments. Approval of the TIP and LRTP Amendment can
98 be delayed until August.

99 Minor changes need to be made to the amendment to include a change in description of the
100 East End Connector and add BOSS projects. Please review the TIP and let Ellen Beckmann know of any
101 changes or comments. David Bonk stated there may be a Town of Chapel Hill STPDA program change.

102 Mark Ahrendsen wants to bring back to the TAC to act on in August 2011.

103 **FY 2014-2020 Transportation Improvement Program – Regional Priority List (Attachments 7, 7A, 7B,**
104 **7C, and 7D)**

105 Ellen Beckmann provided an introduction for the FY 2014-2020 Transportation Improvement
106 Program – Regional Priority List, along with the attachments.

107 Jonathan Parker doesn't think light rail and commuter rail should be on the list because all the
108 bus expansions will have to be added. Joey Hopkins stated the Division will be submitting projects as
109 well.

110 Dale McKeel asked if the 2012-2018 TIP would be affected by the General Assembly actions and
111 Mark Ahrendsen stated he doesn't know.

112 A subcommittee meeting was set for June 8, 2011 at 9:00 a.m. The subcommittee will discuss
113 project ranking and the methodology.

114 **Job Access Reverse Commute and New Freedom – 2011 Call for Projects (Attachments 8, 8A, and 8B)**

115 Maricia Brown provided an introduction for the Job Access Reverse Commute and New Freedom
116 – 2011 Call for Projects, along with the attachments.
117

118 FTA had only released a partial apportionment and the handout reflects a full apportionment.
119 Felix Nwoko stated we need to notify the private operator of the award. Staff will inform them of the
120 stringent oversight and reporting conditions. Maricia Brown stated there will be further verification of
121 matching funds. The MPO is going to develop a performance evaluation.

122 A motion was made by Felix Nwoko and seconded by Andy Henry to go forward with the
123 recommended 2011 JARC & NF program of projects and reconsider funding other projects at a later
124 date. The motion carried unanimously.

125 **Congestion Management Process (CMP) Procedures and Responsibilities Report (Attachment 9)**

126 KoSok Chae provided an introduction for the Congestion Management Process (CMP)
127 Procedures and Responsibilities Report, along with the attachment. Felix Nwoko stated staff will work
128 with the agencies to get maps.

129 A motion was made by Felix Nwoko and seconded by Jeff Brubaker to recommend TAC approval
130 of the Congestion Management Process (CMP) Procedures and Responsibilities Report. The motion
131 carried unanimously.

132 **Ramp Metering Study**

133 Joey Hopkins stated NCDOT is proposing a joint feasibility study that would be funded between
134 NCDOT and the MPO for possible Ramp Metering. There are numerous benefits to Ramp Metering. The
135 estimated cost is \$400,000 and NCDOT plans to fund \$350,000 and is requesting that the MPO fund
136 \$25,000. Felix Nwoko had questions regarding the funding. The item was referred to a TCC
137 subcommittee.

138 After an extensive discussion, a motion was made to refer this item to a TCC subcommittee for a
139 recommendation at the next TCC meeting. The motion carried unanimously.

140 **REPORTS FROM STAFF:**

141 **Reports from Staff (Attachment 11)**

142 Maricia Brown discussed an informational item on the formula for the Section 5307 funds. This
143 item needs to be approved by June 30, 2011 so that Triangle Transit can use the funds. It will also apply
144 to the transit agencies within the MPO. This item will be discussed at a TCC subcommittee meeting on
145 June 8, 2011.

146 Felix Nwoko stated that some of the recommendations from the federal certification review
147 have been added to the staff report. There are deadlines for some of these plans. Jill Stark stated we
148 have nine months from the end of July. There are more commendations than recommendations. DCHC
149 has created many examples for other MPOs.

150 Felix Nwoko provided an update on the Greenhouse Gas Plan. David Bonk asked where Orange
151 County stood with their plan. Karen Lincoln stated ICLEI never provided a format that we could edit and
152 therefore it has never been adopted. David Bonk asked if the MPO will tell Orange County they have to
153 complete the plan and Felix Nwoko stated that is something that will have to be discussed.

154 **Report from the Chair**

155 There was not a report from the TCC Chair.

156 **NCDOT Report (Attachment 13)**

157 Joey Hopkins, NCDOT Division 5, provided an update on projects. The Complete Streets
158 guidelines will be out for public comment on May 27, 2011 for 60 days. David Bonk stated the TCC
159 needs to provide MPO comments. The website is www.nccompletestreets.org. Felix Nwoko asked for
160 an update on the T.W. Alexander Drive project and Joey Hopkins stated the project is back under
161 construction. It is behind right now, but we have hopes they can catch up.

162 Patrick Wilson, NCDOT Division 7, provided an update on projects. Patrick Wilson stated it has
163 been a learning curve for all on the review of local projects. We have come through audits in good
164 shape. The process will be streamlined as time goes on.

165 Julie Bollinger with NCDOT stated the 2040 Plan survey is closing June 30, 2011. There will be a
166 presentation in the next few months to both the TCC and TAC. NCDOT is ready to provide the
167 presentation now if needed.

168 **Adjourned**

169 There being no further business before the Technical Coordinating Committee, the meeting
170 adjourned at 11:28 a.m.

Bus and Rail Investment Plans

Public Workshops and Summary of Comments and Survey

Plan Released

The DCHC MPO released the Durham and Orange County Bus and Rail Transit Investment Plans for public comment on June 1, 2011 and June 8, 2011, respectively. The draft Plans, maps and meeting information were made available on the MPO Web site on those dates. Several local governments sent out press releases and LPA staff notified citizens and community leaders using established email lists, and local newspaper articles on the Plans included a list of the workshops.

Workshops

LPA staff conducted public workshops at the times and locations listed below. Triangle Transit staff and planners from local government staff assisted with the workshops, which were lightly attended, ranging from a few to seventeen participants. Staff also made presentation on the Plan at the DATA Users meeting on June 1st, and the Research Triangle Park Owners and Tenants meeting on June 9th.

- June 7, from 4 p.m. to 6:30 p.m. - Southwest Library, 3605 Shannon Road, Durham
- June 8, from 4 p.m. to 7 p.m. - Holton Career and Resource Center Senior Room, 401 N. Driver St., 2nd Floor, Durham
- June 14, from 4 p.m. to 7 p.m. - Chapel Hill Town Hall, 405 Martin Luther King, Jr. Blvd., Chapel Hill
- June 15, from 3 p.m. to 6 p.m. - North Regional Library, 221 Milton Rd., Durham
- June 16, from 4 p.m. to 7 p.m. - Orange County Library, 137 W. Margaret Ln., Hillsborough

Comments

Staff received comments from workshop participants and by citizens through email and the MPO Web site. The following bullet points provide a summary of those comments. Attachment 6A is a compilation of the comments in their entirety and of the complete survey.

- Comments showed strong support for Plans, especially given the anticipated growth in the area and need to remain economically competitive.
- Congestion and air quality benefits of the Plans are often identified.
- Detailed requests included:
 - Accommodate bicycles on rail vehicles
 - Provide more frequent bus service during non-peak hours
 - Make the Hope Valley bus route more efficient.

- Commuter Rail has advantages over Light Rail Transit (LRT) that include lower cost and less community disruption.
- Bus Rapid Transit (BRT) has advantages over LRT that include greater service flexibility and lower cost.
- Start a BRT system and move to LRT if the BRT is successful.
- The Meadowmont alternative is better because of the greater population density there.
- Make the bus improvements first. If successful, then move resources to rail transit.
- Rail needs to include RDU.
- A more compelling story is needed to get the public interested in the Plans.
- The Meadowmont Community Association presented a letter stating their support for the Light Rail Transit alternative using the NC 54 corridor and George King Road rather than the alternative that traverses Meadowmont.

Note that the comment form and survey continue to be made available on the MPO Web site. If there is additional significant input between the date of this summary document and the June 22nd TAC meeting, that input will be noted at the TAC meeting.

Survey

Citizens could take a Web-based survey designed to ascertain their preferences and support for various elements of the Bus and Rail Investment Plan. At the time this document was written, about 80 people had completed the survey. The following bullet points summarize the survey responses. The Web link for the survey is <https://www.surveymonkey.com/s/Transit-Plan>.

- Two-thirds of the respondents have a good knowledge of the major Plan elements through reading parts of the Plan or newspaper articles.
- Most respondents were aware of the plan through the newspapers.
- Support was slightly stronger for Commuter Rail and Local Bus Service.
- Forty percent preferred the light rail technology for the Durham-Chapel Hill corridor, while about one-in-five preferred whichever technology can be implemented the soonest.
- Thirty percent believed they would use Commuter Rail two times per week or more.
- Forty-five percent believed they would use the Light Rail Transit two times per week or more.
- Respondents believed the following bus improvements to be the most important:
 - Connect residents with jobs
 - Connect residents with other cities and towns, and regional destinations such as RDU
 - Expands service in high ridership corridors.
- The highest priority routes were for RDU airport and the Research Triangle Park (RTP).
- One-third believed they would use the transit services at least two times per week.
- Only twenty-three percent of the respondents currently use the bus transit system at least two times per week.

- There were many details in the narrative responses but perhaps the two most salient points include:
 - A desire to start implementing the bus and rail plan as soon as possible.
 - Some skepticism on the financial and service feasibility of rail transit.

Bus and Rail Investment Plans

Compilation of Comments, Comment Forms and Survey

The Durham-Chapel Hill-Carrboro Metropolitan Planning Organization (DCHC MPO) released the Durham County and Orange County Bus and Rail Investment Plans for public comment on June 1, 2011 and June 8, 2011, respectively. This document provides a complete compilation of the comments received as of June 17, 2011 in the following order:

1. Comments – These are comments received by email, usually from citizens using the MPO Web site. Page 2
2. Comment Cards – Comment Cards were available at the public workshops and continue to be available on the MPO's Web site. The completed cards have been scanned and presented. Page 5
3. Survey – A Web-based survey is available on the MPO Web site and was included in email contacts to citizens and community leaders. The survey results and text comments are included in this document. Page 12

From: David Dickson Jr. [ddickson@tsihealthcare.com]
Sent: Monday, June 13, 2011 4:43 PM
To: comments@dchcmpo.org
Subject: ADD THE TRANSIT TAX

This area will DIE if we do not improve our transit infrastructure. It's time to get with the program.

David Dickson

David M. Dickson, Jr.
President and CEO

TSI Healthcare
A NextGen Healthcare Value Added Support Organization
Electronic Health Records · Practice Management Systems · Revenue Cycle Management
Document Management Division · Electronic Data Interchange

101 Europa Drive, Suite 200 | Chapel Hill, NC | 27517
800.354.4205 (O) | 603.676.5695 (F)
www.tsihealthcare.com

From: Charles S Gordon [sworth01@bellsouth.net]
Sent: Wednesday, June 15, 2011 8:41 AM
To: comments@dchcmpo.org
Subject: financial plan

I favor strongly putting the proposal on the ballot. Charles Gordon

Charles S. Gordon
Broker Assoc.
Fonville Morisey Realty
1520 E Franklin St.
Chapel Hill, NC 27514
www.homesinresearchtriangle.com
Cell/Off. 919-869-1152 e-fax. 919-595-0528

From: lori Miller [millerla26@gmail.com]
Sent: Monday, June 13, 2011 10:22 AM
To: Henry, Andrew; Beckmann, Ellen
Subject: Buss and Rail

Andrew and Ellen,

I am unable to attend the open house forums, but would like to add my input. Please create a mass transit system for the Durham, Chapel Hill, RDU and Raleigh area. If you look at cost, it will always be prohibitive- each year the cost will go up and up.

If you look at the overall financial health of the community, mass transit is the way to go. You help folks get to work, create ways for folks to travel /visit areas they would find excuses not to (not enough parking, etc) and create a place that folks/ businesses will want to move into.

I thank you for your time

Lori Miller
Carrboro Citizen

From: Bob & Susan McClanahan [smcclanahan@nc.rr.com]
Sent: Monday, June 13, 2011 4:06 PM
To: comments@dchcmpo.org
Subject: Orange County Bus and Rail Investment Plan

Dear Transit Plan Staff,

I am very excited that this planning process is moving forward. I strongly support this plan that will

help to relieve congestion on I-40.
reduce our carbon footprint on the environment.

I believe that the light rail portion of this plan will be especially effective.

I do have one question/concern however. By increasing access, will we also be importing crime from Durham to Chapel Hill? Durham has difficulties with much youth violence. What is being done to address this issue?

Thank you!

Susan McClanahan

Notes from Phone Calls on DCHC MPO Bus and Rail Investment Plans

6/7/2011, 1:45 pm

Excited about the plan. In favor of progressive policies and growth in Durham. The cost of not having a rail system is more than the cost of building it.

Likes the Bull City Connector and would like to see it expanded. In favor of DATA being fare free.

Asked about how the train would be routed over New Hope Creek through area that floods regularly. Also asked about accommodating bicycles on the trains.

From: Will Senner [will.senner@gmail.com]
Sent: Friday, June 03, 2011 2:52 PM
To: comments@dchcmpo.org
Subject:Comments

Hello-

I just wanted to send you a brief email in support of investment in regional rail infrastructure in the triangle region, in particular light and commuter rail options to connect our major cities. I feel this is a significantly more prudent investment than bus or car alternatives given the need for support for "smart growth" within our region.

Thanks.

Will Senner

Resident of Durham

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

Please use the space below to provide comments on the bus investments.

It would be good to have more frequency during non-peak hours.

Please use the space below to provide comments on the revenue and financial elements of the plan.

I would support increasing the sales tax and providing tax incentives to companies that locate in areas that are good with mass transit.

Please use the space below for any additional comments.

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

C₂ alignment appears:

- o less costly
- o less damaging to the environment
- o less disruptive to a build out community

Please use the space below to provide comments on the bus investments.

BRT is:

- more flexible (important in our very rapidly changing environment)
- cheaper

Please use the space below to provide comments on the revenue and financial elements of the plan.

Need to know more about operating cost - Cost to Chapel Hill/Orange county and possible fares charged

Please use the space below for any additional comments.

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

DON'T. BRT IS SO MUCH CHEAPER. USE THE RIGHT OF WAY FOR BRT FIRST. IF IT PROVES TO^{BE} INSUFFICIENT, THEN PUT TRACKS IN THE ROW. MORE GENERALLY, WHY NO TRANSIT-ORIENTED DEVELOPMENT AS A WAY TO PAY FOR SERVICES? RATHER THAN REVENUE FROM SALES TAX. (GET THE EXPLANATION FROM McDONOUGH.)

Please use the space below to provide comments on the bus investments.

GENERALLY GOOD. FOCUS ON CARBORO-CHAPEL HILL-DURHAM, NOT OUTLIES (HILLSBOROUGH, MEBANE).

Please use the space below to provide comments on the revenue and financial elements of the plan.

Please use the space below for any additional comments.

Comment Form

DCHC MPO Bus and Rail Investment Plans

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Please use the space below to provide comments on the rail investments.

I think the LRT proposal is smarter both because of the increased service level, increased capacity, and the permanent nature of rail which will encourage TOD.

Please use the space below to provide comments on the bus investments.

I like many aspects of the plan, but think a close look should be taken at ridership once service begins and making adjustments as needed.

Please use the space below to provide comments on the revenue and financial elements of the plan.

Please use the space below for any additional comments.

The CI alignment through Meadavant makes the most sense, given Meadavant's population density and existing infrastructure planned for LRT.

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

No RAIL AT THIS TIME, FIX
THE BUS FIRST AND ONLY.

Please use the space below to provide comments on the bus investments.

WHAT I HEARD ABOUT NEW SET UP ABOUT
BUS SCHEDULE SHOULD GO FIRST TO WIN
TRUST WITH PEOPLE THAT REALLY RUN THE
BUS, NOT JUST FOR SPECIAL.

Please use the space below to provide comments on the revenue and financial
elements of the plan.

I HOPE TO FEDERAL GOVT
TRULY GET MORE PEOPLE VOICE HEARD ~~AND~~^{AND}
NOT A SHAME CHOICING FEW.

Please use the space below for any additional comments.

WAIT ON RAIL SYSTEM UNTIL THE
BUS SYSTEM IS CORRECTLY DONE.

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

See below

Please use the space below to provide comments on the bus investments.

Any expanded routes that do not include RDU will have little impact. I am not sure of the local RPA infrastructure to make this work, but to leave it out because of a difficult thought process will limit the attractiveness of the program

Please use the space below to provide comments on the revenue and financial elements of the plan.

* The handbook is nice but not compelling

Please use the space below for any additional comments.

There is a need to energize the public on these issues
So far the benefits of these investments have had limited attractiveness - i.e. little public support
Just announcing a meeting like Toledo's has little appeal - "What's in it for me & my kids - grandkids etc
The few \$ impact - gallons of gas not very interesting
Time traveled - loss of optional recreational time
Loss of family interaction time might make a more impressive story - see above *

Comment Form

DCHC MPO Bus and Rail Investment Plans

Comments may also be emailed to comments@dchcmpo.org.

Please use the space below to provide comments on the rail investments.

I'm in favor of the general concept of rail/light rail, reserving comment on the specifics. Anyone who has lived in densely populated corridors as ~~the~~ many places in Europe, understands the benefits. Need to consider connectors to the lines/routes to maximize use.

Please use the space below to provide comments on the bus investments.

I'm particularly interested in the corridor roughly paralleling Hwy 751 (Hope Valley Rd) as I live along it. Would appreciate a bus route that is more convenient than the current Route #70. I would be much more likely to use it.

Please use the space below to provide comments on the revenue and financial elements of the plan.










1/2 % sales tax (county) seems okay to me, depending on final ~~new~~ plans. Are we getting value for what we are ~~paying~~ paying for?

Please use the space below for any additional comments.

DCHC MPO Bus and Rail Investment Plan Survey



1. To what extent are you aware of a rail and bus transit plan in Durham County or Orange County? (You may choose more than one answer)

		Response Percent	Response Count
I have participated in public workshops in the last year.		26.9%	18
I have reviewed or read parts of the rail or bus plan.		65.7%	44
I have heard talk about it among family, friends, neighbors, or co-workers.		47.8%	32
I read something about the transit plans in the newspaper.		65.7%	44
I read something about the transit plans on television		9.0%	6
I read something about the transit plans on the radio		7.5%	5
I read something about the transit plans on a website		43.3%	29
I read something about the transit plans on social networking tool such as Facebook, Twitter, or MySpace		6.0%	4
I have not heard about it until now.		4.5%	3
		answered question	67
		skipped question	1

2. Review the following major elements of the plan and answer the question below. * Light Rail Transit (starts year 2025)- Operate between Durham, Duke, UNC-Chapel Hill about 18 hours per day; every 10-20 minutes (approximately 18 mile route) ** Capital Cost = \$1.4 Billion ** Operations Cost = \$15 million/year * Commuter Rail(starts year 2018)- Operate between Durham, Research Triangle Park and Raleigh at mostly peak travel times; every 20-30 minutes (approximately 37 mile route) ** Capital Cost = \$300 million ** Operations Cost = \$3 million /year * Expanded Bus Transit(starts year 2012)- Expanded local bus service linking homes and employment sites to other destinations in the county and Expanded regional bus service linking homes and employment sites to destinations outside the county. ** Capital Cost = \$88 million ** Operations Cost = \$278 million NOTE: costs are for years 2012 through 2035 Use the table below to indicate your level of support for the major elements described above.

	Don't Support at All		Neutral		Strongly Support	Rating Average	Response Count
Light Rail Transit	13.2% (9)	5.9% (4)	8.8% (6)	14.7% (10)	57.4% (39)	3.97	68
Commuter Rail	11.8% (8)	2.9% (2)	7.4% (5)	19.1% (13)	58.8% (40)	4.10	68
Expanded Local Bus Transit	4.4% (3)	4.4% (3)	19.1% (13)	19.1% (13)	52.9% (36)	4.12	68
Expanded Regional Bus Transit	7.4% (5)	4.4% (3)	19.1% (13)	23.5% (16)	45.6% (31)	3.96	68
answered question							68
skipped question							0

3. Briefly describe any changes you want to make to the Bus and Rail Investment Plan (based on the description of major elements above, or your knowledge of other plan details).

**Response
Count**

32







answered question

32

skipped question

36

4. The Bus and Rail Investment Plan proposes a fixed guideway service to operate between Durham, Duke, and UNC-Chapel Hill (approximately 18 miles). This fixed-guideway could use one of several service types. Which of the following service types do you prefer? (Please choose one answer)

		Response Percent	Response Count
Light Rail Transit (provides urban and regional service with stations every ¼ to 2 miles; can operate on separate tracks or in the street, and averages 30mph)		39.0%	23
Bus Rapid Transit (buses provide very frequent service during commuting hours and operates both in the street and on separate guideway)		11.9%	7
Whichever is least expensive.		6.8%	4
Whichever can be implemented the soonest.		18.6%	11
Whichever attracts the most mixed-use development around stations.		10.2%	6
Whichever offers the fast travel time.		13.6%	8
		answered question	59
		skipped question	9

5. How often do you think you might use the Commuter Rail transit services that would operate from West Durham, through downtown Durham, Research Triangle Park, Raleigh, and to eastern Wake County? (Please choose one answer)

		Response Percent	Response Count
Very (at least 7 times per week)		11.3%	7
Somewhat (at least 2 times per week)		19.4%	12
Not very (once per month or less, such as special events)		46.8%	29
Not at all		12.9%	8
Don't know		9.7%	6
answered question			62
skipped question			6











6. How often do you think you might use the Light Rail transit services that would operate from East Durham, through downtown Durham, Duke University and Medical Center, and to UNC-Chapel Hill? (Please choose one answer)

		Response Percent	Response Count
Very (at least 7 times per week)		12.9%	8
Somewhat (at least 2 times per week)		32.3%	20
Not very (once per month or less, such as special events)		29.0%	18
Not at all		17.7%	11
Don't know		8.1%	5
answered question			62
skipped question			6






7. The Bus and Rail Investment Plan proposes several improvements to local bus transit (within your county) and regional bus transit service (between cities, towns and counties). These improvements include more frequent service and extended hours for existing routes, new routes and new facilities. From the following list, please rank the three most important bus transit improvements for you with 1 being the most important and 3 being the third most important. (You will select a total of three of the services listed below).

	Most Important	2nd most Important	3rd most Important	Rating Average	Response Count
Bus transit service that connects residents with jobs	45.7% (16)	37.1% (13)	17.1% (6)	2.29	35
Bus transit service that connects residents with post-secondary and vocational education opportunities	10.0% (1)	50.0% (5)	40.0% (4)	1.70	10
Expanded bus services in corridors with high ridership (for example, increase frequency to 15 minutes)	39.4% (13)	27.3% (9)	33.3% (11)	2.06	33
Bus service that connects residents with other cities and towns and regional destinations such RDU airport	50.0% (17)	20.6% (7)	29.4% (10)	2.21	34
Expanded dial-a-ride service for rural residents	0.0% (0)	50.0% (3)	50.0% (3)	1.50	6
More park-and-ride lots	35.7% (5)	21.4% (3)	42.9% (6)	1.93	14
Transit emphasis corridors with bus shelters and sidewalks	15.8% (3)	36.8% (7)	47.4% (9)	1.68	19
Neighborhood transit centers with bus shelters and seating	17.6% (3)	47.1% (8)	35.3% (6)	1.82	17
			Other (please specify)		6
			answered question		58
			skipped question		10






8. Which of the following routes do you think should be the highest priority for new or expanded bus transit services? (Please choose one answer)

		Response Percent	Response Count
Traveling to and from the Research Triangle Park		14.0%	8
Traveling to and from RDU Airport		17.5%	10
Traveling to and from the downtown Durham area		8.8%	5
Traveling to and from the downtown Raleigh area		5.3%	3
Traveling to and from Duke University and Medical Center		10.5%	6
Traveling to and from UNC-Chapel Hill and the adjacent hospitals		8.8%	5
Traveling to and from retail centers (such as malls, Wal-Mart, Target, etc.)		5.3%	3
Traveling within the city or county where you live		12.3%	7
No priority		5.3%	3
Don't know		12.3%	7
	Other (please specify)		4
answered question			57
skipped question			11

9. How often do you think you might use the bus transit services proposed in the Bus and Rail Investment Plan? (Please choose one answer)

		Response Percent	Response Count
Very (at least 7 times per week)		18.3%	11
Somewhat (at least 2 times per week)		33.3%	20
Not very (a few times per year, such as special events)		21.7%	13
Not at all		11.7%	7
Don't know		15.0%	9
answered question			60
skipped question			8

10. How often do you use public transportation, such as bus services, that are currently available in your area? (Please choose one answer)

		Response Percent	Response Count
Very (at least 7 times per week)		6.7%	4
Somewhat (at least 2 times per week)		16.7%	10
Not very (a few times per year, such as special events)		38.3%	23
Not at all		35.0%	21
Don't know		3.3%	2
answered question			60
skipped question			8

Page 2, Q3. Briefly describe any changes you want to make to the Bus and Rail Investment Plan (based on the description of major elements above, or your knowledge of other plan details).

1	I don't like the route chosen for LRT. Station location isn't the issue--it's the route. I would have designed it differently, but there may be constraints that I'm unaware of. I assume the route is a done deal at this point, anyway.	Jun 15, 2011 6:10 PM
2	Include AIRPORT stops, esp on *any* RAIL plan.	Jun 14, 2011 4:17 PM
3	A more comprehensive, Triangle-wide, light rail / commuter rail plan system would be even better.	Jun 14, 2011 1:10 PM
4	We need the TTA to run on Sunday!!!!	Jun 14, 2011 6:15 AM
5	Consider alternative crossing of New Hope Creek.	Jun 13, 2011 5:55 PM
6	It is important to pursue options that can be developed relatively quickly, since this is all about 20 years late getting started.	Jun 13, 2011 2:35 PM
7	Selfishly, I'm tired of paying for things that serve everyone else. Buses do not go near where I work so I don't care. It's easier to drive. I'm single, working class and I'm tired of supporting poor people with no car and rich people who work at the universities.	Jun 13, 2011 11:26 AM
8	Ensure bus routes are integrated and coordinated and new development is burgers along lines to provide ridership.	Jun 13, 2011 9:04 AM
9	no rail support it is a waste of many that will not benefit the environment or help many people move	Jun 13, 2011 8:59 AM
10	I would like to see southern Durham county linked in to the rail system--there are many residents within a few miles of the I-40 corridor that would benefit from having nearby train service to Raleigh, RTP, downtown Durham, Chapel Hill, or even closer places like Southpoint Mall.	Jun 13, 2011 8:22 AM
11	Pay a couple billion now, or five times that cost when the 1 million new residents arrive by the 2020s. Pay me now, or pay me later.	Jun 13, 2011 8:17 AM
12	Given the rate of growth in the region, traffic congestion and \$5 to \$10 gas in the near future, waiting until 2025 for light rail seems like it may be too little too late. the rail plans should be pushed up much soon for both regional and light rail.	Jun 13, 2011 7:53 AM
13	Why do we keep funding empty busses? The BullCity Connector is FREE, clean, convenient and still running practically empty according to my own eyes and recent stories in the paper.	Jun 13, 2011 7:23 AM
14	I urge more focus to be on the Durham-Chapel Hill corridor and eventually Charlotte.	Jun 13, 2011 7:13 AM
15	The most important thing is to get started with a plan.	Jun 13, 2011 7:02 AM
16	I can't imagine the rail would have enough ridership between Chapel Hill and Durham to sustain itself, no matter what numbers your consultants have presented. Set light rail up between Durham, RTP and Raleigh. Concentrate better bus service between Durham and UNC. Make it the gold standard for bus transportation in the southeast. Boulder, CO did it.	Jun 13, 2011 6:57 AM

Page 2, Q3. Briefly describe any changes you want to make to the Bus and Rail Investment Plan (based on the description of major elements above, or your knowledge of other plan details).

17	Any rail or regional bus lines must be able to connect to viable local transit as well. It doesn't help to travel between Durham and Raleigh if you can't get to where you need to go once you get there.	Jun 13, 2011 6:32 AM
18	Would prefer to link the light rail lines to the existing i-40 corridor if possible from UNC Hospitals up to RTP.	Jun 13, 2011 5:51 AM
19	I'm a bit skeptical that any rail option will work in the Triangle region. But, with gas prices staying high and the proper land use designations, people may take them. BRT may be the best short-term bet.	Jun 13, 2011 5:47 AM
20	N/A	Jun 13, 2011 5:40 AM
21	Add more Bike Paths	Jun 12, 2011 2:02 PM
22	Bring it on faster! As the population increases, it will be more difficult and costly to build what we've needed for decades already!	Jun 12, 2011 10:43 AM
23	Approximately 58% of the Durham-Orange Light Rail is in Durham County. However, Durham County is proposed to bear about 75% of the capital and operating costs. In part this may be due to Orange County/Chapel Hill not providing parking in support of the light rail transit. Whatever the reason, the proposed financial burden for Durham County seems out of proportion to the amount of light rail.	Jun 12, 2011 10:43 AM
24	So far so good. I would not waste a lot of resources on expanded regional bus. I'd rather see that money go towards either Light Rail or Bus Rapid Transit.	Jun 12, 2011 10:07 AM
25	I want to be sure you plan stations farther out on Hwy 98, to include all Grove Park subdivision entrances. (I'm a homeowner in Grove Park.)	Jun 11, 2011 9:35 AM
26	not sure light rail is financially feasible not sure the frequency of commuter rail provides much value	Jun 11, 2011 8:20 AM
27	Better coordination with study of NC54 corridor	Jun 11, 2011 8:03 AM
28	Sooner rather than later.	Jun 10, 2011 4:32 PM
29	I would like to have an idea about how much it would cost to ride. Also, would major employers provide free passes such as UNC which currently provides me with a TTA bus pass. Your question below has an answer "whichever is least expensive". Does this mean least expensive to build or to ride?	Jun 10, 2011 4:24 PM
30	expand the bus portion	Jun 10, 2011 2:25 PM
31	NO RAIL!!!!	Jun 10, 2011 11:53 AM
32	Move park and ride in north Durham to snow hill at Roxbury roads.	Jun 10, 2011 11:42 AM

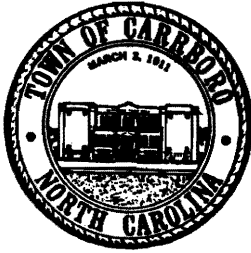
Page 3, Q7. The Bus and Rail Investment Plan proposes several improvements to local bus transit (within your county) and regional bus transit service (between cities, towns and counties). These improvements include more frequent service and extended hours for existing routes, new routes and new facilities.

...

1	Expanded service on weekends (Saturday night and Sunday) -- this is my 3rd most important choice	Jun 15, 2011 6:11 PM
2	any transit incentives geared toward transit-oriented development	Jun 13, 2011 7:14 AM
3	More Bike Paths.. this is also a low cost method of transportation	Jun 12, 2011 2:03 PM
4	Add trash cans that can't be removed	Jun 11, 2011 9:37 AM
5	Service that helps to accommodate future growth concentrated in compact, walkable communities	Jun 11, 2011 9:09 AM
6	Making sure the bus service is attractive and convenient	Jun 11, 2011 8:04 AM

Page 4, Q8. Which of the following routes do you think should be the highest priority for new or expanded bus transit services? (Please choose one answer)

1	connect Raleigh, Durham, and Chapel Hill so you can get anywhere in those cities within about an hour on public transportation.	Jun 14, 2011 10:49 AM
2	Crosstown buses in Durham that do not connect to the downtown station - grids please!	Jun 13, 2011 8:30 AM
3	These are terrible description. Increase bus transit services for everything. (Local and Express) Currently have to drive 9 miles to catch an express bus to downtown Raleigh or catch local bus to Express bus that takes almost 2 hours. Raleigh is only 23 miles away. based on current route and schedule , it does not make sense (economical/env./or time) to take an express bus that is inaccessible.	Jun 13, 2011 7:04 AM
4	Traveling to and from Brier Creek area (jobs)	Jun 11, 2011 9:39 AM



The following resolution was introduced by Alderman Gist and duly seconded by Alderman Haven-O'Donnell:

A RESOLUTION PROVIDING RECOMMENDATIONS TO THE ORANGE COUNTY BOARD OF COMMISSIONERS AND THE DURHAM-CHAPEL HILL-CARRBORO TRANSPORTATION ADVISORY COMMITTEE ON THE PROPOSED ORANGE COUNTY TRANSIT PLAN AND SUPPORTING A NOVEMBER 2011 REFERENDUM TO INCREASE THE COUNTY SALES TAX TO IMPLEMENT THE PLAN

Resolution No. 129/2010-11

WHEREAS, the Durham-Chapel Hill-Carrboro Metropolitan Planning Organization and Triangle Transit have proposed to construct light rail between Chapel Hill and Durham; and

WHEREAS, House Bill 148, approved in 2009, provides for funding from an increase in the county sales tax and vehicle registration fee to fund the construction of the light rail system; and

WHEREAS, House Bill 148 requires the development and adoption of a county transit plan to guide the use of additional sales tax and vehicle registration fees to construct and operate the light rail system and provide for bus services within Orange County; and

WHEREAS, the Town has worked in conjunction with Orange County, Chapel Hill, Hillsborough, the University of North Carolina at Chapel Hill, and Durham County to develop an Orange County Transit Plan which provides funding for bus services within Orange County and provides for the construction and operation of a light rail system between Chapel Hill and Durham; and

WHEREAS, House Bill 148 requires the approval of the Orange County Transit Plan by the Orange County Board of Commissioners and the Durham-Chapel Hill-Carrboro Transportation Advisory Committee; and

WHEREAS, implementation of the ½ cent sales tax increase requires approval through a county-wide referendum; and

WHEREAS, the Town has reviewed the proposed Orange County Transit Plan and believes adoption of the Plan will provide important resources to maintain and expand public transit services within Orange County;

NOW, THEREFORE, BE IT RESOLVED by the Carrboro Board of Aldermen that the Board of Aldermen endorses the proposed Orange County Transit Plan with the following recommendations:

- An inter-local agreement be developed and approved between Orange County, Carrboro, Chapel Hill, Hillsborough and the University of North Carolina at Chapel Hill.
- The Durham-Chapel Hill-Carrboro Metropolitan Planning Organization should include a provision requiring an annual report from Triangle Transit on the status of the Plan. This assessment should include an update on the status of all elements of the Plan.

BE IT FURTHER RESOLVED that the Board of Aldermen recommends that the Orange County Commissioners place a referendum to increase the Orange County sales tax by ½ cent to fund the Orange County Transit Plan on the November 2011 ballot.


The foregoing resolution having been submitted to a vote received the following vote and was duly adopted this 24th day of May 2011;

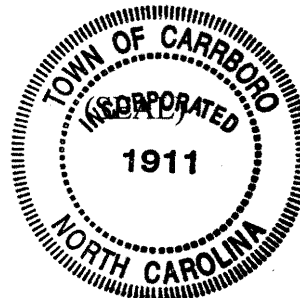
Ayes: Dan Coleman, Sammy Slade, Mark Chilton, Joal Hall Broun, Jacquelyn Gist, Randee Haven-O'Donnell

Noes: None

Absent or Excused: Lydia Lavelle

I, Catherine C. Wilson, Town Clerk for the Town of Carrboro do hereby certify that the foregoing is a true and accurate copy of a resolution duly adopted by the Board of Aldermen of the Town of Carrboro, NC.


Town Clerk



A RESOLUTION PROVIDING RECOMMENDATIONS TO THE ORANGE COUNTY BOARD OF COMMISSIONERS AND THE DURHAM-CHAPEL HILL-CARRBORO TRANSPORTATION ADVISORY COMMITTEE ON THE PROPOSED ORANGE COUNTY TRANSIT PLAN.

WHEREAS, the Durham-Chapel Hill-Carrboro Metropolitan Planning Organization and Triangle Transit have proposed to construct light rail between Chapel Hill and Durham; and

WHEREAS, N.C. House Bill 148, approved in 2009, provides for funding from an increase in the county sales tax and vehicle registration fee to fund the construction of the light rail system; and

WHEREAS, House Bill 148 requires the development and adoption of a county transit plan to guide the use of additional sales tax and vehicle registration fees to construct and operate the light rail system and provide for bus services within Orange County; and

WHEREAS, the Town has worked in conjunction with Orange County, Carrboro, Hillsborough, the University of North Carolina at Chapel Hill and Durham County to develop an Orange County Transit Plan which provides for the construction and operation of a light rail system between Chapel Hill and Durham and provides funding for bus services within Orange County; and

WHEREAS, House Bill 148 requires the approval of the Orange County Transit Plan by the Orange County Board of Commissioners and the Durham-Chapel Hill-Carrboro Transportation Advisory Committee; and

WHEREAS, implementation of the ½ cent sales tax increase requires approval through a county-wide referendum; and

NOW, THEREFORE, BE IT RESOLVED by the Council of the Town of Chapel Hill that the Town Council endorses the proposed Orange County Transit Plan with the following recommendations:

- An inter-local agreement be developed and approved between Orange County, Chapel Hill, Carrboro, Hillsborough and the University of North Carolina at Chapel Hill.
- The Durham-Chapel Hill-Carrboro Metropolitan Planning Organization should include a provision requiring an annual report from Triangle Transit on the status of the Plan. This assessment should include an update on the status of all elements of the Plan.

This the 25th day of May, 2011.

Resolution of the Durham City Council in Support of the Bus and Rail Investment Plan for Durham and Orange Counties

WHEREAS, the Durham community has been recognized for its wonderful quality of life and economic vitality on many occasions over the past decade, including Durham's recent ranking as the best mid-sized city for jobs in the US by Forbes magazine, as the #1 housing market in the US by the Wall Street Journal, as one of the top places in the world to visit in 2011 by the New York Times and the #2 "green city" for lifestyle and quality of life by Country Home magazine; and

WHEREAS, the blessings of a vibrant local economy and high quality of life have brought significant transportation challenges to Durham and the region, including a surge in population growth that will add over one million new residents to our regional population of 1.5 million in the next 30 years, a 23% increase in commute times in the last decade, worsening traffic congestion on the area's major roads and streets, and difficulty in meeting air quality standards, with the most recent indication of the challenges being a study cited in Forbes magazine on May 10, 2011 which found that the Triangle region was the urban region in the US that suffered the most from rising gasoline prices; and

WHEREAS, over four years ago the region's two Transportation Advisory Committee's saw a need to strengthen mobility and transit options and named a blue ribbon group of citizens to address our transportation challenges and recommend bus and rail investments needed over the next 25 years; and

WHEREAS, that appointed citizens group (the STAC or Special Transit Advisory Commission) unanimously made recommendations that were formally adopted into the region's long-range transportation plan in 2009; and

WHEREAS, the North Carolina General Assembly enacted the Intermodal Transportation Fund Act in 2009 which allows Durham, Orange and Wake counties to hold referendums of their voters on adoption of an ½ cent sales tax for public transportation improvements; and

WHEREAS, local elected officials and their staffs in both Durham and Orange have prepared a detailed plan for needed bus and rail transportation improvements in their respective counties over the next quarter century that will provide substantial transportation, economic, environmental and quality of life benefits for their citizens.

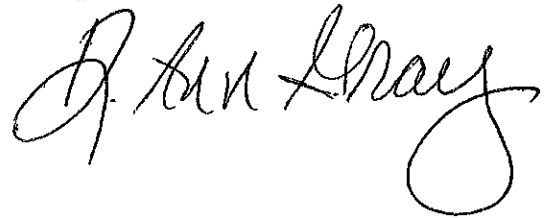
NOW THEREFORE, BE IT RESOLVED by the Durham City Council that they have reviewed the Bus and Rail Investment Plan presented to them and by this Resolution do support and recommend its adoption to the Durham Board of County Commissioners and recommend that if the Durham

Board of County Commissioners holds a referendum and the referendum passes, that the Durham Board of County Commissioners not implement the ½ cent sales tax or motor vehicle tax until a similar referendum is passed by the voters in either Orange or Wake Counties or both Orange and Wake Counties.

**APPROVED BY
CITY COUNCIL**

JUN 6 2011

CITY CLERK

A handwritten signature in black ink, appearing to read "J. Ann Gray". The signature is written in a cursive style with a large loop at the end of the last name.

The DRAFT Durham County Bus and Rail Investment Plan

6/16/2011

The Draft Durham County Bus and Rail Investment Plan

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The Draft Durham Bus and Rail Investment Plan

I. INTRODUCTION

The Durham community has achieved an enviable quality of life at the end of the first decade of the 21st century. Recent accolades include its ranking as the best mid-sized city for jobs in the US by *Forbes* magazine, as the #1 housing market in the US by the *Wall Street Journal*, as one of the top places in the world to visit in 2011 by the *New York Times* and the #2 “green city” for lifestyle and quality of life by *Country Home* magazine.

The Triangle region has also enjoyed a diverse, growing economy and attractive quality of life for a number of years, topping many best places to live and best places to work lists. With these successes has come a surging growth in population and demand upon our roads and highways. Since 2004, the Triangle has moved from 46th largest metro area to 40th in the US for 2009, and our vehicle demand on freeways is up by 28% over those five years. Recently, our region was named the 3rd most sprawling urban area in the country among the 83 areas studied.

In its 2009 long-range (2035) report, the Durham-Chapel Hill-Carrboro Metropolitan Planning Organization (DCHC MPO) noted that the region’s population would more than double over the 25-year period. For the last two decades, the demand on our roads has grown significantly faster than our population. Even with planned highway improvements and likely additional revenues for new roads, it is clear that Durham and the region will see declining levels of service on major roads in the next 25 years.

The economic costs for our increasingly congested roads are significant. In its 2010 Mobility report, the Texas Transportation Institute estimated that our region has “congestion costs” of almost one-half billion dollars a year. A May 10, 2011 study cited in *Forbes* magazine found that the Triangle region was ranked “America’s Biggest Gas Guzzler.” Finally, it will be difficult to impossible for many of Durham’s low to moderate income families to afford to get to new jobs and take advantage of the region’s prosperity unless enhanced transportation options are created.

Durham residents and its regional neighbors are aware of the growth in clogged roads, as well as the accompanying air quality problems, negative economic impacts and the loss of the quality of life we enjoy if these transportation challenges are not met. Local citizens and elected leaders have responded to these challenges, with some assistance from state government, as described below.

II. TRANSIT PLANNING STEPS LEADING UP TO THIS PLAN

In 2008, a blue-ribbon group of Triangle leaders (the Special Transit Advisory Commission, or STAC) began meeting. In May 2009 the STAC unanimously recommended a regional vision for bus and rail investments. One year later, the region's two MPO's fully incorporated the STAC recommendations into their long-range (25 year) transportation plan.

In August 2009, Governor Beverly Perdue signed into law the Congestion Relief and Intermodal Transport Fund Act (HB 148), legislation that allows Durham, Orange and Wake counties to generate new revenues for public transportation. These new revenues can include a one-half cent sales tax, if approved by the public through a referendum, and an additional \$10 in local and regional vehicle registration fees.

Over the last 18 months, Triangle Transit staff have worked with Durham, Durham County, the MPO and other regional transportation staff to develop a detailed, 25-year plan for new bus and rail investments designed to provide greater transportation options for residents and employers. This option would positively impact traffic congestion and air quality while supporting local land use policies. This plan is the culmination of that work and represents crucial public investments and services designed to maintain our quality of life and economic vitality in the next 25 years.

Extensive public engagement has occurred over the past year in the development of the bus and rail elements of this plan. Triangle Transit and local transportation staff members from the city, county and MPO conducted a series of 19 public workshops, at various locations throughout the Triangle, on the process and substance of the plan's development. A total of over 1,100 participants attended the meetings and provided over 500 comments on the plan. The project web site, www.ourtransitfuture.com, was viewed by over 31,000 individuals with 1.4 million page hits. The web site houses all of the presentation materials and proposed plan elements.

There have been dozens of meetings with citizens, local elected officials, staff and members of the region's MPO's, community stakeholders and business leaders to have feedback on the proposed bus and rail elements. The financial and service elements of this plan are coordinated with the corresponding Orange County Bus and Rail Investment Plan. Additionally, this bus and rail investment plan builds on existing transit services and does not eliminate current financial and service commitments.

III. PLAN ELEMENTS

A. New Bus Service

The major goals of the new and strengthened bus service in Durham County would include:

- connect more residents with job opportunities in Durham and the region
- connect more residents with post-secondary and vocational educational opportunities
- expand bus capacity in corridors with high current bus ridership
- provide better regional connections to other cities and the RDU Airport

Over the 23 year life-of the plan, a total of 77,000 additional bus hours in Durham County would be added (50,000 in the first three years, 27,000 over the 20 years). Today, DATA provides 177,000 annual bus hours. This 44% increase in bus service will provide service benefits to all areas of the county as detailed below and illustrated in the map in Section IV.

Over the first three years following a successful sales tax referendum, the following transit improvements will be made:

First 12-18 months following successful Sales Tax referendum

- Connecting more residents with jobs
 - New service from southwest Durham to Duke and VA Medical Centers
 - More frequent service to jobs at retail centers including Brier Creek, Northgate Mall, Southpoint Mall, The Village, and the vicinity of NC 54 and NC 55
 - New services from rural Durham County, Mebane and Hillsborough to Duke and VA Medical Centers
 - More dial-a-ride trips from rural Durham County to jobs throughout the county
- Connecting more residents with post-secondary and vocational educational opportunities
 - More dial-a-ride trips from rural Durham County to Durham Tech and job training opportunities
 - More frequent service to North Carolina Central University and Durham Tech
- Expanding bus capacity in corridors with high current bus ridership (15 minute frequency during peak hours)
 - Holloway Street/Liberty Street Corridor
 - North Roxboro Street
 - Chapel Hill-Durham Boulevard (US 15-501)
 - Fayetteville Street
 - West Chapel Hill Street
- Providing better regional connections to other cities and the RDU International Airport
 - Later Saturday Service between Downtown Durham and Downtown Chapel Hill; between Downtown Durham, RTP, and Raleigh; and, between Chapel Hill, southern Durham, RTP, and Raleigh
 - Sunday Service between Downtown Durham and Downtown Chapel Hill; between Downtown Durham, RTP, and Raleigh; and, between Chapel Hill, southern Durham, RTP, and Raleigh
 - Seven day per week service to RDU Airport

- More frequent express trips between Durham and Raleigh
- More frequent service between Chapel Hill, southern Durham, and RTP

Over the remaining 20 years of the transit investment plan, it is estimated that the sales tax will raise enough revenue to fund an additional 32,000 bus hours of service per year that will be phased in over the life of the plan. The resources will be used to continue to meet the plan's four goals as jobs and residences shift. When light rail and commuter rail services begin operation in later years of the plan, bus services will be shifted to avoid service duplication and to connect people with the rail stations.

Small Capital Projects

An estimated \$15 million in small capital projects supporting the Durham County bus network are also included in the Durham County Bus and Rail Investment Plan. The projects should be completed in the first three to five years. They include:

- Park-and-Ride lots in northern Durham County and various other locations of the city
- Four new neighborhood transit centers
- Three transit emphasis corridors (sidewalks, shelters, and transit signal priority)
- Pedestrian accessibility and amenities improvements at the 200 most-used bus stops

Please see spreadsheet at the end of the document for more specific information.

B. New Light Rail Service

The Durham County Bus and Rail Investment plan provides funding for a fixed guideway transit system that serves Durham and Orange Counties using Light Rail technology (LRT). The 17-mile alignment extends from the University of North Carolina (UNC) Hospitals to Alston Avenue in East Durham. A total of 17 stations have been proposed including a station next to the Dean Smith Center, the Friday Center, as well as a potential station at Meadowmont in Chapel Hill. Stations in Durham include Patterson Place along US 15-501, the South Square area, at Duke Medical Center and VA Medical Hospital, Ninth Street and downtown Durham, with convenient access to nearby bus and Amtrak intercity rail connections. Light Rail service characteristics and the type of activity centers and neighborhoods being served along the corridor dictate light rail station spacing of between ¼ mile and 2 miles.

Light Rail vehicles are electrically powered and travel at speeds up to 55 mph. The total, end-to-end, travel time for the 17-mile alignment is about 35 minutes including stops. The vehicles are approximately 90 feet long, can operate in both directions, and can be coupled with additional cars as ridership demand increases. Initial 2035 projections indicate that ridership will exceed 12,000 boardings per day. As with all long range projections, this estimate is subject to change as the ridership forecasting model is refined and validated.

Light rail vehicles can operate in exclusive right of way, as well as along urban streets, and characteristically serve accessible low platform (14 inches high) stations. The operations plan for the 17-mile alignment includes train frequencies (headways) of every 10 minutes during the morning and evening peak and 20 minutes during the off-peak hours and on weekends. Fifteen vehicles will be required to operate the system based on an 18 hour schedule each weekday. Several potential light rail vehicle maintenance facility locations are being evaluated and are also included in the financial plan. Detailed alignment and station location decisions will occur in the future at the preliminary engineering and final design stages, within 1-4 years after a successful referendum.

Durham County's share of capital cost for the Durham and Orange Light Rail Project is approximately \$1,050 million (2011 dollars). The total cost for the project is \$1.4 billion (\$2011). Durham County's share of operations and maintenance costs are estimated at \$11.3 million/year (2011 dollars). Total operations and maintenance cost are estimated at \$15 million/year.

C. New Commuter Rail Service

The Durham County Bus and Rail Investment Plan provides funding for a transit system that serves Durham and Wake County using Commuter Rail technology (CRT). The 37-mile alignment extends from West Durham to Greenfield Parkway in Garner via Durham, the Research Triangle Park, Morrisville, Cary, Raleigh, and Garner. A total of 12 stations have been proposed, including locations with major bus and Amtrak intercity rail connections available in downtown Durham, downtown Cary, and downtown Raleigh. Due to the vehicle's performance capabilities, length of the corridor, and the needs of activity centers being served, station spacing is typically between 2 miles and 10 miles for commuter rail systems..

Commuter Rail vehicles are pulled by diesel powered locomotives and travel at speeds up to 79 mph. Total, end-to-end, travel time for the 37-mile alignment is about 51 minutes including stops. The train would include a locomotive and multiple coach cars, sized according to anticipated ridership. Initial 2035 projections indicate ridership will exceed 7,000 boardings per day. This estimate is subject to change as the ridership forecasting model is refined and validated.

Commuter rail vehicles must remain in the railroad corridor (i.e. no street running). The operations plan for the alignment assumes the use of existing freight tracks where possible. In some instances, a second track will be constructed to enhance the capacity of the corridor to allow for continued increases in demand for both passenger and freight traffic in the corridor. Commuter Rail operation is recognized as an inter-urban service and operates on 20 to 30 minute train frequencies (headways), primarily during the morning and evening peak periods, with the opportunity for some limited off-peak service. The service is primarily oriented towards the work-week and peak-period commuting to major employment centers. Weekend service will be considered based upon future

ridership demand. Fifteen vehicles and a rail maintenance facility are also included in the plan.

Durham County's share of the capital cost for the Commuter Rail Project would be \$300 million (\$2011). The total capital cost for the Commuter Rail project is approximately \$645 million (2011). Durham County's annual operating and maintenance costs are estimated at \$2.57 million/year (\$2011). Total Operations and Maintenance costs are estimated at \$11 million/year (2011).

IV. Maps

Below you will find three maps.

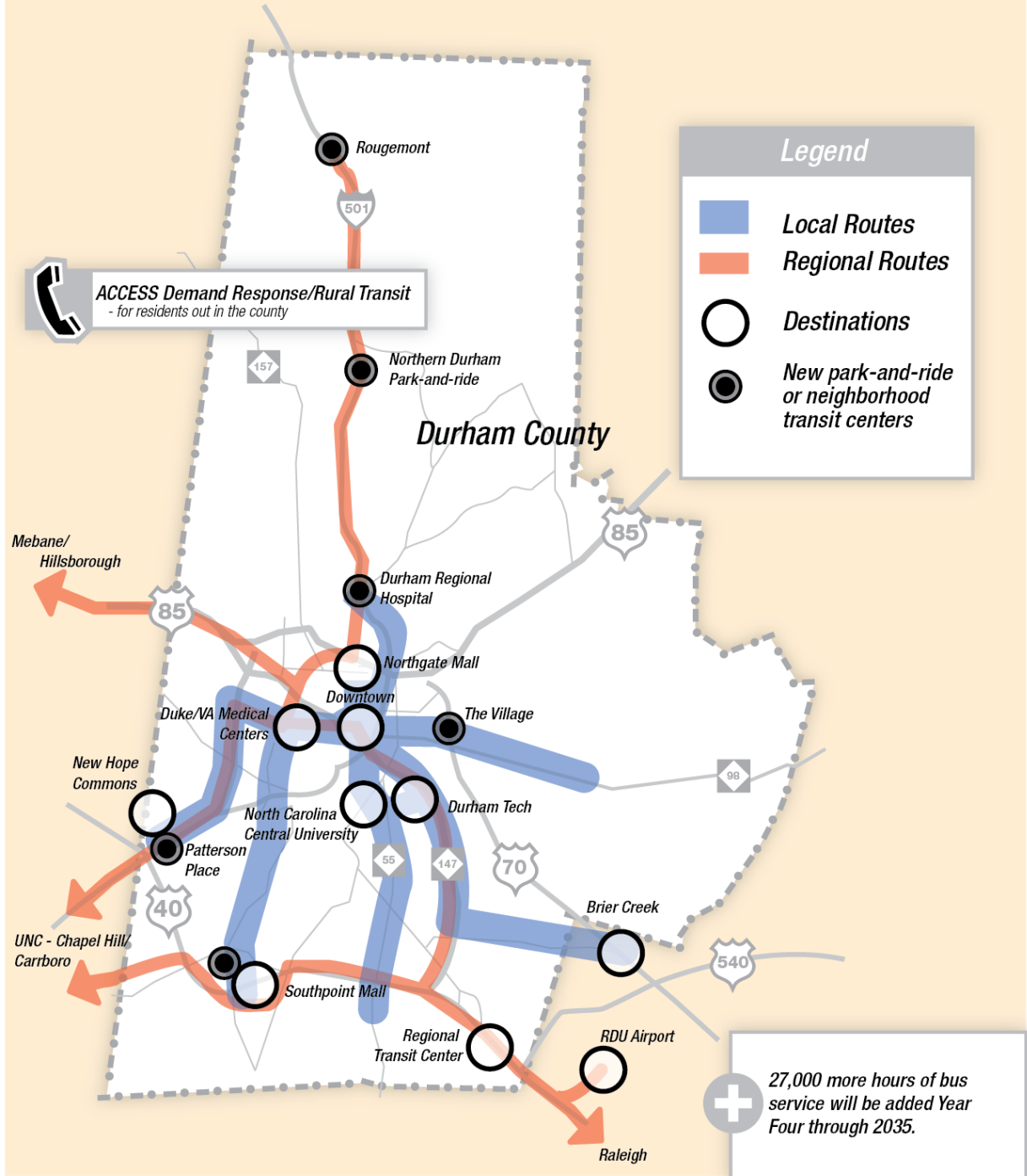
The first map (page 9) is a conceptual representation of where frequent local and regional bus service will be put into operation in the first three years following the implementation of this plan.

The second map (page 10) shows the Light Rail alignment from Downtown Durham to Chapel Hill.

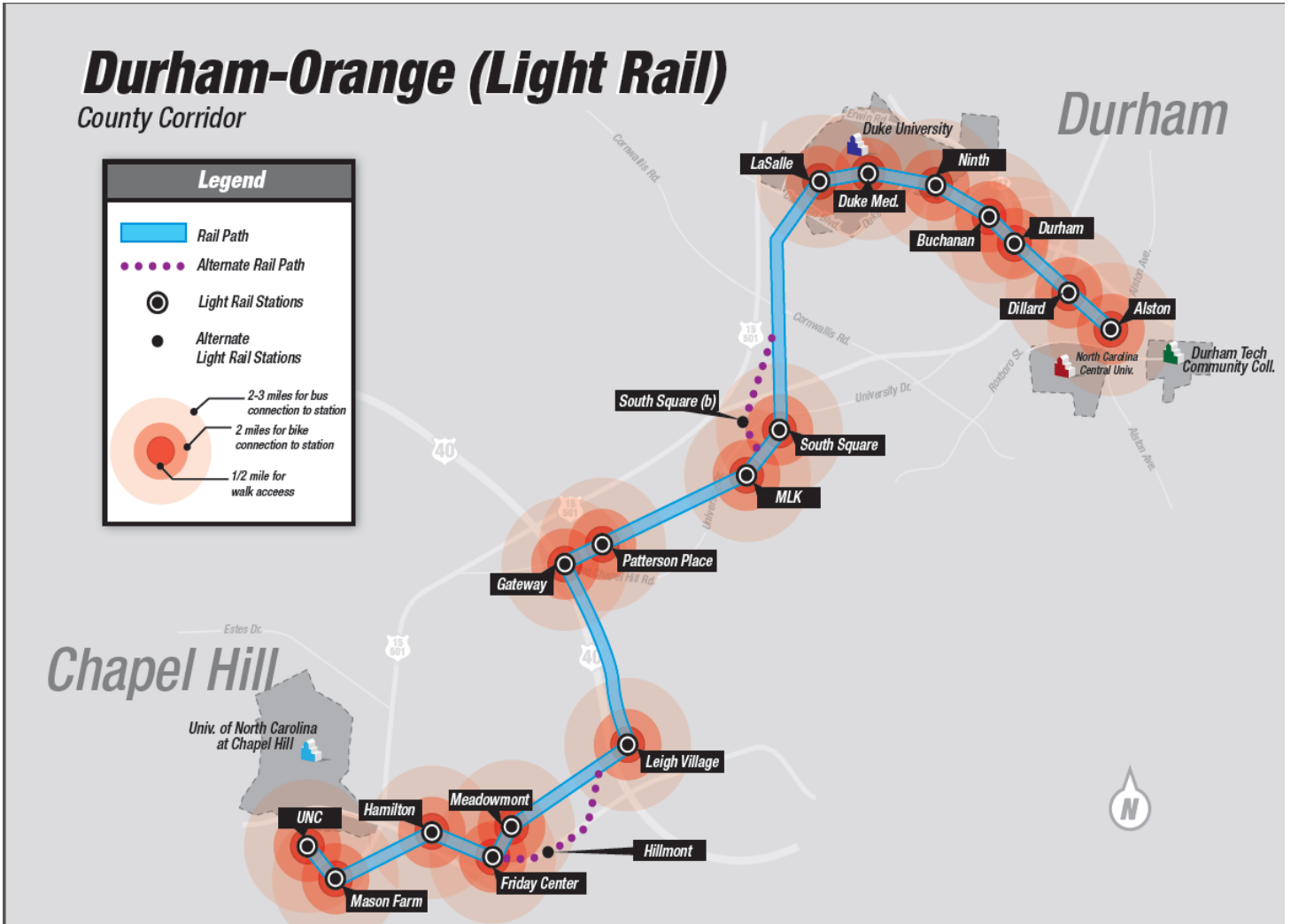
The third map (page 11) shows the Commuter Rail alignment from West Durham to Raleigh and Eastern Wake County.

DRAFT Durham County Bus Investment Plan

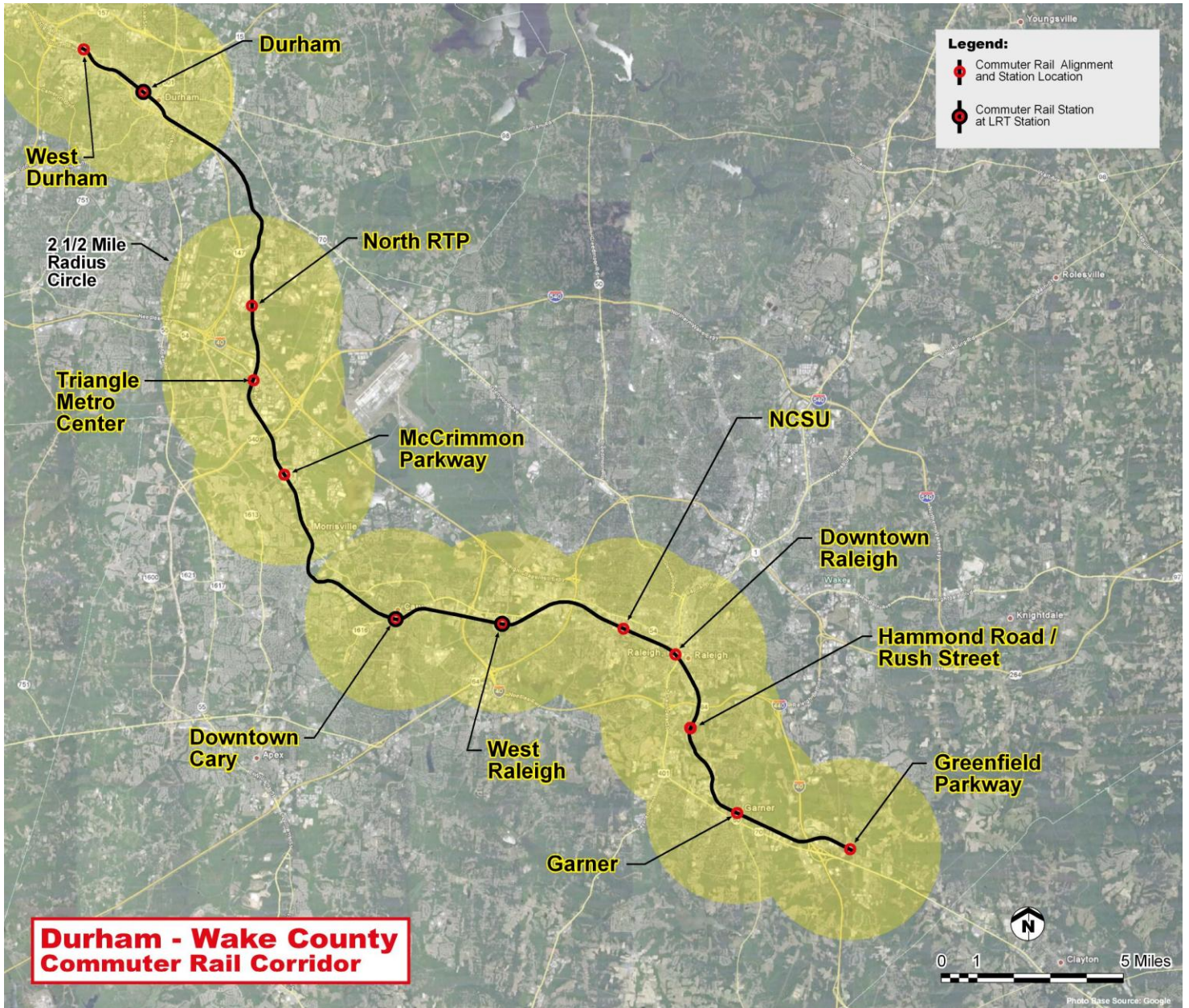
50,000 hours of bus improvements in the **first three years**



DRAFT Durham-Orange Light Rail Plan



DRAFT Durham-Wake Commuter Rail Plan



V. DURHAM COUNTY REVENUES

A variety of revenue sources provide the funding for the Durham County Bus and Rail Investment Plan. Those revenues include:

- A new one-half-cent sales tax in Durham County (referendum required)
- A new \$7 vehicle registration fee levied by Durham County
- An increase of \$3 to the existing \$5 vehicle registration fee currently levied by Triangle Transit in Durham County
- Revenue from Triangle Transit's rental car tax
- NC State Government contributions to funding
- Federal Government contributions to funding
- Passenger Revenue

Further details for each revenue source follow below.

A. Initial Proceeds Assumptions for Local Revenue

The initial annual projections for each local revenue stream for Durham County (see prior section V) in 2012 for transit are as follows:

- One-half cent sales tax: \$18.4 million
- \$7 vehicle registration fee: \$1.58 million
- \$3 vehicle registration fee increase: \$677,000
- Rental Car Tax revenue (Durham): \$1.0 million

B. Growth Rates Assumed for Each Revenue Source

- ½-cent sales tax:
 - Growth Rate from 2011 through 2014: 1.5%
 - Growth Rate from 2015 through 2035: 3.5%
- \$7 vehicle registration fee: 2.0%
- \$3 vehicle registration fee increase: 2.0%
- Rental Car Tax revenue: 4.0%

C. One-half cent sales tax in Durham County

A one-half cent sales tax in Durham County means that when individuals spend \$10.00 on certain goods and services, an additional five cents (\$0.05) is added to the transaction to

support the development of the Bus and Rail Investment Plan. Purchases of food, gasoline, medicine, health care and housing generally are excluded from the tax.

A one-half cent sales tax in Durham County is estimated to generate \$17.3 million. Over the life of the plan to 2035, the sales tax is expected to generate \$625 million in Year-Of-Expenditure (YOE) dollars. Implementation of the Plan as described above is subject to authorization of a referendum by the Durham Board of County Commissioners and approval by the voters.

D. \$7 Vehicle Registration Fee in Durham County

A seven dollar (\$7) vehicle registration fee in Durham County means that when an individual registers a new vehicle or renews the registration for an existing vehicle in Durham County, an additional \$7 per year is added to the cost above the other required registration fees for that vehicle.

The seven dollar fee in Durham County is expected to bring in \$1.58 million in 2012. Over the life of the plan to 2035, the seven dollar fee is expected to generate \$58.1 million in Year-Of-Expenditure (YOE) dollars.

E. \$3 Vehicle Registration Fee Increase in Durham County

A three dollar (\$3) vehicle registration fee increase in Durham County means that when an individual registers a new vehicle or renews the registration for an existing vehicle in Durham County, an additional \$3 per year is added to the cost above the other required registration fees for that vehicle. An existing \$5 fee for vehicle registration supports activities of Triangle Transit, including bus operations and long-term planning. This fee would increase to \$8 after the \$3 increase is implemented.

The three dollar fee in Durham County is projected to generate \$677,000 in 2012. Over the life of the plan to 2035, the three dollar fee is expected to generate \$24.9 million in Year-Of-Expenditure (YOE) dollars.

F. Revenue from Triangle Transit's Rental Car Tax

Triangle Transit operations are partially funded by a five percent (5%) tax on car rentals in Wake, Durham, and Orange Counties. Under existing policy adopted by the TTA Board, 50% of these rental revenues are dedicated to advancing long-range bus and rail transit.

Since a significant portion of all cars rented and driven in the three counties are rented at RDU International Airport, it is difficult to determine which rentals are driven primarily in one county or another. Therefore, the 50% rental revenues dedicated to long-term transit were allocated by county according to the percentage of population in the Triangle Region, which is: Wake (68%); Durham (21.5%); Orange (10.5%).

The Triangle Transit rental car tax proceeds directed to Durham County is estimated at \$1.0 million in 2012. Over the life of the plan to 2035, the rental car tax is expected to generate \$36 million in Year-Of-Expenditure (YOE) dollars for Durham County.

G. NC State Government Funding

The plan includes a 25% capital cost contribution by the NC Department of Transportation (NCDOT) for both light rail and commuter rail projects in Durham County. This level of participation was established by the State in its participation in the Charlotte Blue Line light rail project in 2003. The plan assumes that NCDOT also pays for 10% of bus capital costs (replacement buses, new buses, park and ride lots, etc) consistent with its current practices. Based on these precedents, NCDOT assumed contributions to the plan total \$465 million in YOE dollars from 2012 through 2035.

H. Federal Government Funding

The plan projects that the US Government will contribute 50% of the capital cost for both the light rail and commuter rail projects in Durham County. This was the federal level of participation in the Charlotte Blue Line light rail project and is consistent with federal funding outcomes for most rail projects in the Federal Transit Administration's New Starts program in recent years.

The plan assumes that the Federal Government also pays for 80% of bus capital costs, consistent with its current practices, and continues to provide operating appropriations consistent with present FTA operating grant formulas. Federal Government contributions to the plan are projected to be \$926 million in YOE dollars from 2012 through 2035.

VI. **DURHAM FINANCIAL PLAN DATA**

The following is a list of the total spending for each technology and category identified in the Durham County Bus and Rail Investment Plan.

- Rail Capital: \$1,669 million (\$1350 million in 2011 dollars)
- Rail Ops: \$283 million
- Bus Capital: \$47 million
- Bus Ops: \$151 million
- Debt: \$136 million

VII. **IMPLEMENTATION AGREEMENT: ANNUAL REVIEW AND CHANGES TO THE PLAN**

The Durham County Bus and Rail Investment Plan details the specific elements of local and regional bus service, LRT and commuter rail service to be added in Durham County over a twenty-three year period. Because of the long time frame for implementation of the Plan and its major capital projects, over time there will need to be changes and revisions made to the Plan. As the statutory implementation agency, Triangle Transit will

work with Durham County, the DCHC Metropolitan Planning Organization (MPO), and the City of Durham, the public transit provider in Durham County to develop and execute an Implementation agreement which details the following aspects of implementation of the Plan:

- (a) Annual review presentations of the activities and progress made in implementation of the Plan by Triangle Transit to the County and the MPO;
- (b) The process for review and vote by the County, the MPO and Triangle Transit's Board of Trustees on any significant or substantial revisions to the Plan required by changes experienced in revenues received, capital costs, operating expenses, or other substantial issues affecting the Plan;
- (c) Responsibility of Triangle Transit for direct disbursement of funds from the revenues received per Section V (above) to the public agency responsible for implementing the bus services set forth in the Plan; and
- (d) Other necessary provisions regarding implementation of this Plan as agreed to by the County, the MPO, and Triangle Transit.

VIII. CLOSING SUMMARY

The Durham County Bus and Rail Investment Plan is the result of years of collaborative work by local elected leaders, regional stakeholders, municipal and county staff and Triangle Transit. The plan consists of a balance of bus improvements and rail investment to help accommodate the intense population growth that the region is expected to experience in the next 25 years.

The proposed plan addresses the ongoing need to provide greater choice to transit riders with improved and expanded bus and rail connections. Once implemented, the residents of Durham County will be able to have greater access to jobs, shopping, and activity centers such as downtown Durham, the Universities, the Research Triangle Park, and the Raleigh-Durham International Airport.

Additionally, the plan will provide core infrastructure investment that will help support the goals and objectives of Durham's local land use plans. In particular, as evidence in communities across the country, investment in light rail has proven to be a great motivator for private companies to build transit-oriented development (TOD) at station locations along the rail corridor. This kind of more intense development generally consists of a mixed-use, walkable environment that can allow a more sustainable alternative to the suburban growth pattern that exists today, without paralyzing the suburban options.

All of the elements listed in the Draft Durham County Bus and Rail Investment Plan are fiscally constrained. At every turn, the Plan has been conservative in revenue assumptions and through added contingencies for capital and operating expenditures.

The draft plan will be shared with the general public, Durham City Council, the DCHC MPO and the Durham County Commission. The draft plan will be considered for approval by the DCHC MPO, the Triangle Transit Board of Trustees, and the Durham County

Commission. The Durham County Commission will determine when to set a referendum date. Once a voter referendum passes, work can begin on implementation of the Bus and Rail Investment Plan.

Durham County Bus Transit Plan -- Annual Operating and Maintenance Costs

Complements Express rail to TMC and Light Rail to Leigh Village

Highest Priority Recommendations

Service Type (Responsible Party)	Projects	Enhanced or New?	Total New Hours	Annual Operating Cost	Annual New Bus Hours Cumulative
YEARS 1 THROUGH 3				\$4,290,000	50,000
Local (City of Durham)	Brier Creek-Downtown (Route 15)	Enhanced	3,800	\$320,000	3,800
Local (City of Durham)	Southern High-Liberty Street-Downtown (Route 16)	Enhanced	3,000	\$260,000	6,800
Local (City of Durham)	NC 54/NC 55-Downtown (Route 12)	Enhanced	3,000	\$260,000	9,800
Regional (Triangle Transit)	Carrboro-Chapel Hill-Durham Boulevard Express (Route 405) - 15 minute service during peak hours	Enhanced	1,500	\$130,000	11,300
Local (City of Durham)	New Hope Commons-Downtown via Duke	New	3,400	\$290,000	14,700
Local (City of Durham)	Northgate Mall-Downtown (Route 1) - peak only	Enhanced	1,500	\$130,000	16,200
Local (City of Durham)	The Village-Holloway Street-Downtown (Route 3) - peak only	Enhanced	1,500	\$130,000	17,700
Regional (Triangle Transit)	Chapel Hill-Durham Express (Route 405) - extend Saturday hours to 11pm	Enhanced	200	\$20,000	17,900
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) - extend Saturday hours to 11pm	Enhanced	200	\$20,000	18,100
Regional (Triangle Transit)	Durham-Regional Transit Center-RDU (Route 700/100) - extend Saturday hours to 11pm	Enhanced	200	\$20,000	18,300
Regional (Triangle Transit)	Carrboro-Chapel Hill-Durham Express (Route 405) - Sundays	Enhanced	600	\$50,000	18,900
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) - Sundays	Enhanced	600	\$50,000	19,500
Regional (Triangle Transit)	Durham-Regional Transit Center-RDU (Route 700/100) - Sundays	Enhanced	600	\$50,000	20,100
Rural (Durham County)	Durham County Dial-A-Ride	Enhanced	1,200	\$100,000	21,300
Local (City of Durham)	Southpoint Mall-Duke/VA Medical Centers Express	New	8,000	\$680,000	29,300
Local (City of Durham)	Durham Regional-North Roxboro Street-Downtown (Route 4)	Enhanced	3,000	\$260,000	32,300
Regional Express (Triangle Transit)	Durham-Raleigh Express (Route DRX) 30 minute service during peak hours	Enhanced	800	\$70,000	33,100
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) 15 minute service during peak hours	Enhanced	1,500	\$130,000	34,600
Regional Express (Triangle Transit)	Mebane-Hillsborough-Duke/VA Medical Centers Express	New	1,600	\$140,000	36,200
Regional Express (Triangle Transit)	Rougemont-Duke/VA Medical Centers Express	New	3,300	\$280,000	39,500
Rural (Durham County)	Durham County Dial-A-Ride	Enhanced	1,200	\$100,000	40,700
Local (City of Durham)	NCCU-Fayetteville Street-Downtown (Route 5)	Enhanced	1,500	\$130,000	42,200
Local (City of Durham)	Durham Tech-Downtown (Route 8)	Enhanced	1,500	\$130,000	43,700
Local (City of Durham)	American Village-Duke-West Chapel Hill Street-Downtown (Route 6)	Enhanced	1,500	\$130,000	45,200
Local (City of Durham)	East Durham-Downtown (Route 2)	Enhanced	1,500	\$127,500	47,000
Regional (Triangle Transit)	Durham-Regional Transit Center (Route 700) 15 minute service during peak hours	Enhanced	3,300	\$280,500	50,000
BY 2035	Local and Rural Bus Service Improvements			\$4,590,000	54,000
	Regional Bus Service Improvements			\$1,955,000	23,000
	Total Bus Service Improvements			\$6,545,000	77,000

Note: Cost per hour is assumed to be \$85.

Durham County Bus Transit Plan -- Small Capital Costs (excluding buses)

Complements Express rail to TMC and Light Rail to Leigh Village

Highest Priority Recommendations

CAPITAL PROJECTS	RELATED OPERATING PROJECT	Unit Cost	Quantity	Est. Cost
Park-and-Ride lot in northern Durham County	Rougemont-Duke-Downtown Express	\$350,000 per lot	1	\$350,000
Park-and-Ride lot near Durham Regional Hospital	Rougemont-Duke-Downtown Express AND Durham Regional-Duke Medical Hospital Connector	\$350,000 per lot	2	\$700,000
Park-and-Ride lots at Patterson Place and/or South Square	Chapel Hill-Durham Express (Route 405) - peak only AND New Hope Commons-Downtown via Duke Southpoint-Duke Connector AND Chapel Hill-Regional Transit Center via Southpoint (Route 800) - peak only	\$350,000 per lot	2	\$700,000
Park-and-Ride near Southpoint Mall	Chapel Hill-Regional Transit Center via Woodcroft (Route 805)	\$350,000 per lot	1	\$350,000
Park-and-Ride near Woodcroft Shopping Center	The Village-Downtown (Route 3) - peak only	\$530,000 per mile	2	\$1,060,000
Transit Emphasis Corridor (Holloway St between The Village and Alston Ave)	Durham Regional-Downtown (Route 4)	\$530,000 per mile	3	\$1,590,000
Transit Emphasis Corridor (Roxboro Rd between I-85 and Durham Regional Hospital)	NCCU-Downtown (Route 5)	\$530,000 per mile	4	\$2,120,000
Transit Emphasis Corridor (Fayetteville St between Lakewood and Cornwallis)	Durham Regional-Downtown (Route 4)	\$220,000 per bay	3	\$660,000
Neighborhood Transit Center (Northern Durham)	The Village-Downtown (Route 3) - peak only AND Southern High-Downtown (Route 16)	\$220,000 per bay	3	\$660,000
Neighborhood Transit Center (The Village)	Southpoint-Duke Connector AND Chapel Hill-Regional Transit Center via Southpoint (Route 800)	\$220,000 per bay	3	\$660,000
Neighborhood Transit Center (Southern Durham)	Chapel Hill-Durham Express (Route 405) AND New Hope Commons-Downtown via Duke	\$220,000 per bay	2	\$440,000
Neighborhood Transit Center (I-40/US 15-501)	Top 200 Boarding Locations	\$10,000 Per stop	200	\$2,000,000
Pedestrian Accessibility / Amenities Improvements			Subtotal	\$11,300,000
Contingency		30%		\$3,400,000
			Total	\$15,000,000

The DRAFT Bus and Rail Investment Plan in Orange County

The concept of the Bus and Rail Investment Plan for Orange County was supported through resolutions approved by the Chapel Hill Town Council (Resolution # 2011-05-25/R1), the Carrboro Board of Aldermen (Resolution #129/2010-11) and via letter from the University of North Carolina at Chapel Hill.

The DRAFT document provided for public input by the DCHC has not been reviewed by the Town of Chapel Hill, the Town of Carrboro, or The University of North Carolina at Chapel Hill either individually or together as the Chapel Hill Transit Public Transit Committee. DCHC and Triangle Transit do not make representation that these bodies support this detailed document.

5/26/2011

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The Orange County Bus and Rail Investment Plan

I. INTRODUCTION

Orange County has achieved an enviable quality of life at the end of the first decade of the 21st century. Recent accolades include its ranking as the best place to live in the South by *Money* magazine, the #1 housing market in the US by the *Wall Street Journal* and one of the best places in the nation to raise children by *Business Week* magazine. The Chapel Hill-Carrboro City School System is one of the best in the nation, consistently ranking at the top of the state in student test score and boasting the lowest dropout rate in the state. The University of North Carolina at Chapel Hill consistently ranks among the great institutions of higher education in the nation, most recently honored by *US News & World Report*.

But, with these successes has come a surging growth in population and demand upon our roads and highways. Since 2004, the Triangle has moved from 46th largest metro area to 40th in the US for 2009, and our vehicle demand on freeways is up by 28% over those five years. Recently, our region was named the 3rd most sprawling urban area in the country among the 83 areas studied.

In its 2009 long-range (2035) report, the Durham-Chapel Hill-Carrboro Metropolitan Planning Organization (DCHC MPO) noted that the region's population would more than double over the 25-year period. For the last two decades, the demand on our roads has grown significantly faster than our population. Even with planned highway improvements and likely additional revenues for new roads, it is clear that Orange County and the region will see declining levels of service on major roads in the next 25 years.

The economic costs for our increasingly congested roads are significant. In its 2010 Annual Urban Mobility Report, the Texas Transportation Institute estimated that our region has "congestion costs" of almost one-half billion dollars a year. Recently, a May 10, 2011 study cited in *Forbes* magazine found that the Triangle was the urban region in the nation that is most vulnerable to rising gasoline prices. Finally, it will be difficult to impossible for many of Orange County's low to moderate income families to afford to get to new jobs and take advantage of the region's prosperity unless enhanced transportation options are created.

Orange County residents and its regional neighbors are aware of the growth in clogged roads, as well as the accompanying air quality problems, negative economic impacts and the loss of the quality of life we enjoy if these transportation challenges are not met. Local citizens and elected leaders have responded to these challenges, with some assistance from state government, as described in this investment plan.

II. TRANSIT PLANNING STEPS LEADING UP TO THIS PLAN

Beginning in 2007, a blue-ribbon group of Triangle leaders (the Special Transit Advisory Commission, or STAC) met for over a year and in 2008 unanimously recommended a regional vision for bus and rail investments. One year later, the region's two MPOs fully incorporated the STAC recommendations into their long-range (25 year) transportation plan.

In August 2009, Governor Beverly Perdue signed into law the Congestion Relief and Intermodal Transport Fund Act (HB 148), legislation that allows Orange, Durham and Wake counties to generate new revenues for public transportation. These new revenues can include a one-half cent sales tax, if approved by the public through a referendum, as well as an additional \$10 in local and regional vehicle registration fees.

Over the last 18 months, Triangle Transit staff have worked with municipal, Orange County, MPO and other regional transportation staff to develop a detailed, 25-year plan for new bus and rail investments designed to provide greater transportation options for residents and employers. These investments would positively impact traffic congestion and poor air quality, and support local land use policies. This plan is the culmination of that collaboration and purposes crucial public investments and services to maintain our quality of life and economic vitality in the next 25 years.

Extensive public engagement has occurred over the past year in the development of the bus and rail elements of this plan. Triangle Transit and local transportation staff members from municipalities, counties and MPOs conducted a series of 19 public workshops, at various locations throughout the Triangle, on the process and substance of the plan's development. A total of over 1,100 participants attended the meetings and they provided over 500 comments on the plan. The project web site, www.ourtransitfuture.com, was viewed by over 31,000 unique individuals with 1.4 million page hits. The web site houses all of the presentation materials and proposed plan elements.

There have been dozens of meetings with citizens, local elected officials, staff and members of the region's MPOs, community stakeholders and business leaders, allowing extensive feedback on the proposed bus and rail elements of the plan. The financial and service elements of this plan are coordinated with the corresponding Durham County Bus and Rail Investment Plan. Additionally, this bus and rail investment plan builds on the existing transit services and therefore does not eliminate or reduce the current financial and service commitments.

III. PLAN ELEMENTS

A. Public Transit Providers

The Triangle has a number of public transit providers who have been involved in the development of this plan and will have responsibility to implement the recommendations of the plan once it is approved. Below is a brief description of the transit agencies:

Triangle Transit is a regional transit agency serving Wake, Durham and Orange counties. Triangle Transit is responsible for the provision of regional commuter express and demand response service connecting Wake, Durham and Orange counties

Chapel Hill Transit is a multijurisdictional agency formed by a partnership of the Towns of Chapel Hill, Carrboro and the University of North Carolina at Chapel Hill. Chapel Hill Transit is responsible for regular and express route and demand response service in the Chapel Hill, Carrboro, and University area. Chapel Hill Transit also provides regional express bus service, in cooperation with Triangle Transit to Hillsborough.

Orange County Public Transit is a county agency that provides demand response service in unincorporated Orange County and operates local service in Hillsborough in cooperation with the Town of Hillsborough.

B. New Bus Service

Representatives from Orange County, Chapel Hill, Carrboro, Hillsborough, The University of North Carolina at Chapel Hill, and Triangle Transit have worked collaboratively to develop a comprehensive bus service improvement plan that supports the effort to improve public transit in Orange County. The group identified a range of services that would address county-wide transit service needs. Identified services were ranked and prioritized based on a set of goals and strategies.

Goals include:

- Improve mobility in the region
- Provide geographic equity
- Support improved capital facilities
- Support transit supportive land use
- Provide positive impact on air quality.

Strategies to accomplish these goals include:

- Improve connectivity
- Increase frequency in peak hours
- Improve weekend, night services (off peak)
- Fill in gaps in existing service

- Maintain existing services.

Over the course of the plan, a new half-cent sales tax would enable delivery of a total of 50,000 additional bus hours in Orange County. By comparison, Chapel Hill Transit currently provides 190,000 annual bus hours and Orange Public Transportation provides 3,525 annual bus hours. The projects will provide benefits to all areas of the county by enhancing urban and rural transit services.

Bus improvement projects were classified by type of service:

- Local bus service - service operating within Orange County boundaries
- Regional bus service - service operating in more than one county
- Regional express service - over the road coaches operating in more than one county

First Three Years following successful sales tax referendum

An investment that equals about 44,000 bus service hours will be provided during the first three years. Improvements include:

- Improve connectivity
 - New regional express service connecting Mebane, Hillsborough and Durham.
- Increase frequency in peak hours
 - Enhanced services in the US 15/501 corridor between Durham and Chapel Hill for Chapel Hill Transit, Triangle Transit, and DATA.
 - Improvements in the NC 54 corridor transit service.
 - Increased peak hour service on the existing Triangle Transit Route 405 between Chapel Hill and Durham.
 - Increased peak hour service on the in-town Hillsborough circulator.
 - Increased peak hour service on Triangle Transit Route 800 between Research Triangle Park and Chapel Hill and Triangle Transit Route 420 between Hillsborough and Chapel Hill.
- Improve weekend, night services (off peak)
 - New Saturday service on the in-town Hillsborough circulator.
 - Expanded local Saturday service in Chapel Hill, Carrboro and UNC.
 - Expanded regional Saturday service on existing Triangle Transit Route 405 between Durham and Chapel Hill and Triangle Transit Route 800 between Chapel Hill and the Research Triangle Park.
 - New local Sunday service in Chapel Hill, Carrboro and UNC.
 - Expanded local evening service in Chapel Hill, Carrboro and UNC.
- Fill in gaps in existing service
 - Enhanced rural transit service in unincorporated Orange County.
- Maintain existing services.
 - A portion of revenues generated by the new vehicle registration fee will be used to support existing bus service.

Year four and beyond following successful sales tax referendum

A total investment that equals about 50,000 new bus service hours will be provided during year four of the plan implementation through the end of the program (year 2032).

Improvements include:

- Increase frequency in peak hours
 - Increased peak hour service on Pittsboro – Chapel Hill Express.
 - Continued increased peak hour service on the existing Triangle Transit Route 800 between Research Triangle Park and Chapel Hill.
 - Continued increased peak hour service in Chapel Hill, Carrboro and UNC.
- Fill in gaps in existing service
 - Continued enhancements to rural transit service in unincorporated Orange County.

C. New Light Rail Service

The Orange County Bus and Rail Investment plan provides funding for a fixed guideway transit system that serves Durham and Orange counties using Light Rail technology (LRT). The 17-mile alignment extends from the University of North Carolina (UNC) Hospitals to Alston Avenue in East Durham. A total of 17 stations have been proposed including a station next to the Dean Smith Center, the Friday Center, as well as a potential station at Meadowmont in Chapel Hill. Stations in Durham include Patterson Place along US 15-501, the South Square area, at Duke Medical Center, Ninth Street, and downtown Durham, with convenient access to nearby bus and Amtrak intercity rail connections. Due to the light rail vehicle's capabilities and the requirements of the activity centers and neighborhoods being served along the corridor, light rail station spacing is routinely between ¼ mile and 2 miles apart.

Light Rail vehicles are electrically powered and travel at speeds up to 59 mph. The total travel time for the 17-mile alignment is about 35 minutes, including stops. The vehicles are approximately 90 feet long, can operate in both directions, and can be coupled with additional cars as demand increases. Initial 2035 projections indicate that ridership will exceed about 12,000 boardings per day. These projections are subject to change as the model is refined and validated.

Light rail vehicles can operate in exclusive right of way, as well as along urban streets, and characteristically serve accessible low platforms (14 inches high) at each station. The operations plan for the 17-mile alignment includes train frequencies (headways) of 10 minutes during the morning and evening peak and 20 minutes during the off-peak hours and on weekends. Fifteen vehicles will be required to operate the system on the basis of an 18-hour schedule each weekday. Several potential light rail vehicle maintenance facility locations are being evaluated. Detailed alignment and station location decisions will occur in the future when final project design is addressed.

The total capital cost for the Durham and Orange Light Rail Project is approximately \$1.4 billion (2011 dollars). Orange County's share is \$330 million (2011 dollars). Operations and Maintenance costs are estimated at \$15 million/year (2011 dollars). Orange County's share of the Operations and Maintenance costs are \$3.2 million/ year (2011 dollars).

D. Martin Luther King Boulevard Bus Lanes

This investment provides for bus-only lanes on Martin Luther King (MLK) Boulevard from Interstate 40 to Estes Drive. It will make bus travel times more reliable in peak periods. Existing buses in the MLK corridor will be re-routed to take advantage of the enhanced bus lanes.

Orange County's cost for the bus lanes is anticipated to be \$20 to \$25 million. Since the bus lanes will be used by existing services, they do not generate any additional operational costs within the plan.

IV. Maps

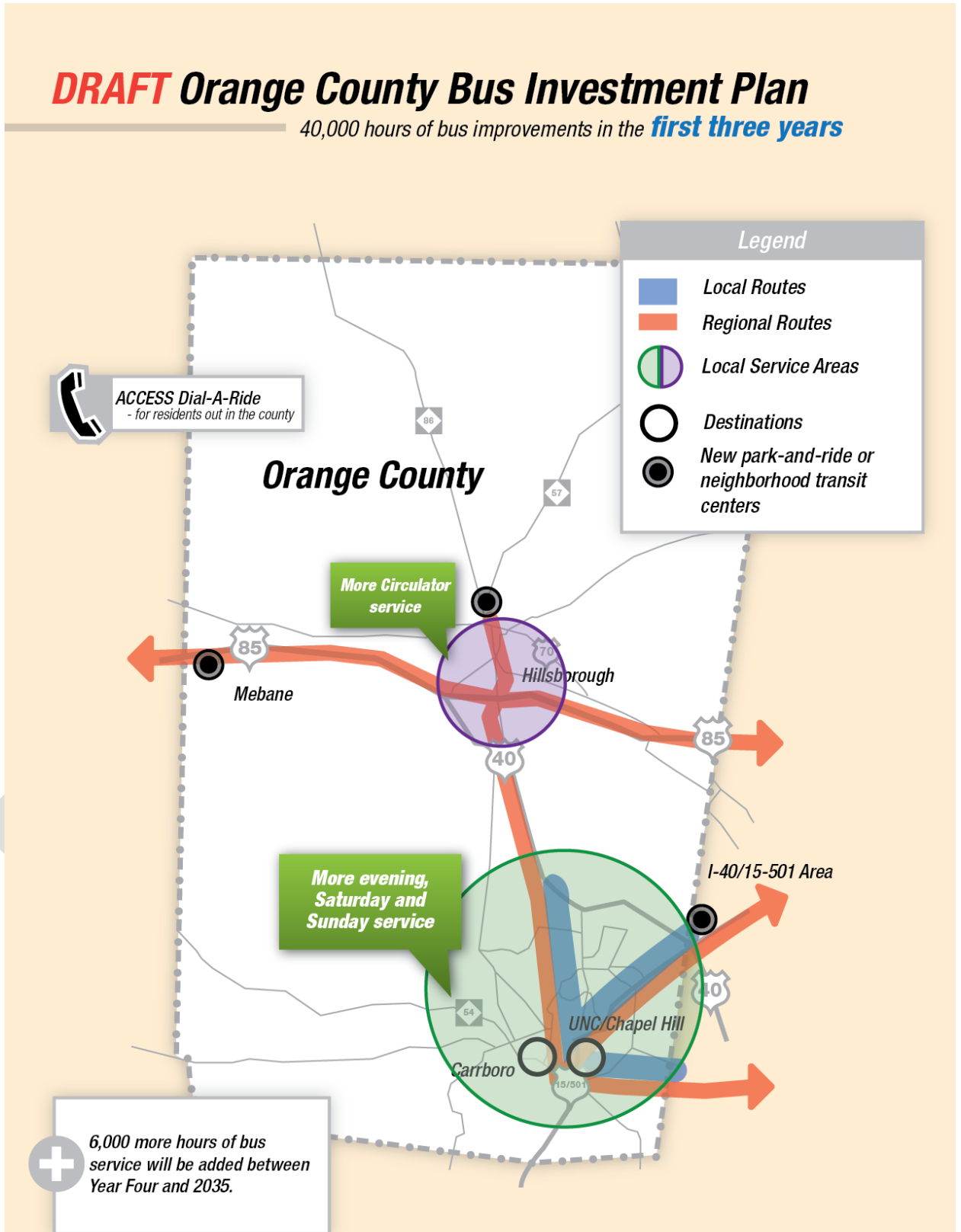
Two maps follow.

The first map (page 9) is a conceptual representation of where frequent local and regional bus service will be put into operation in the first three years following the implementation of this plan.

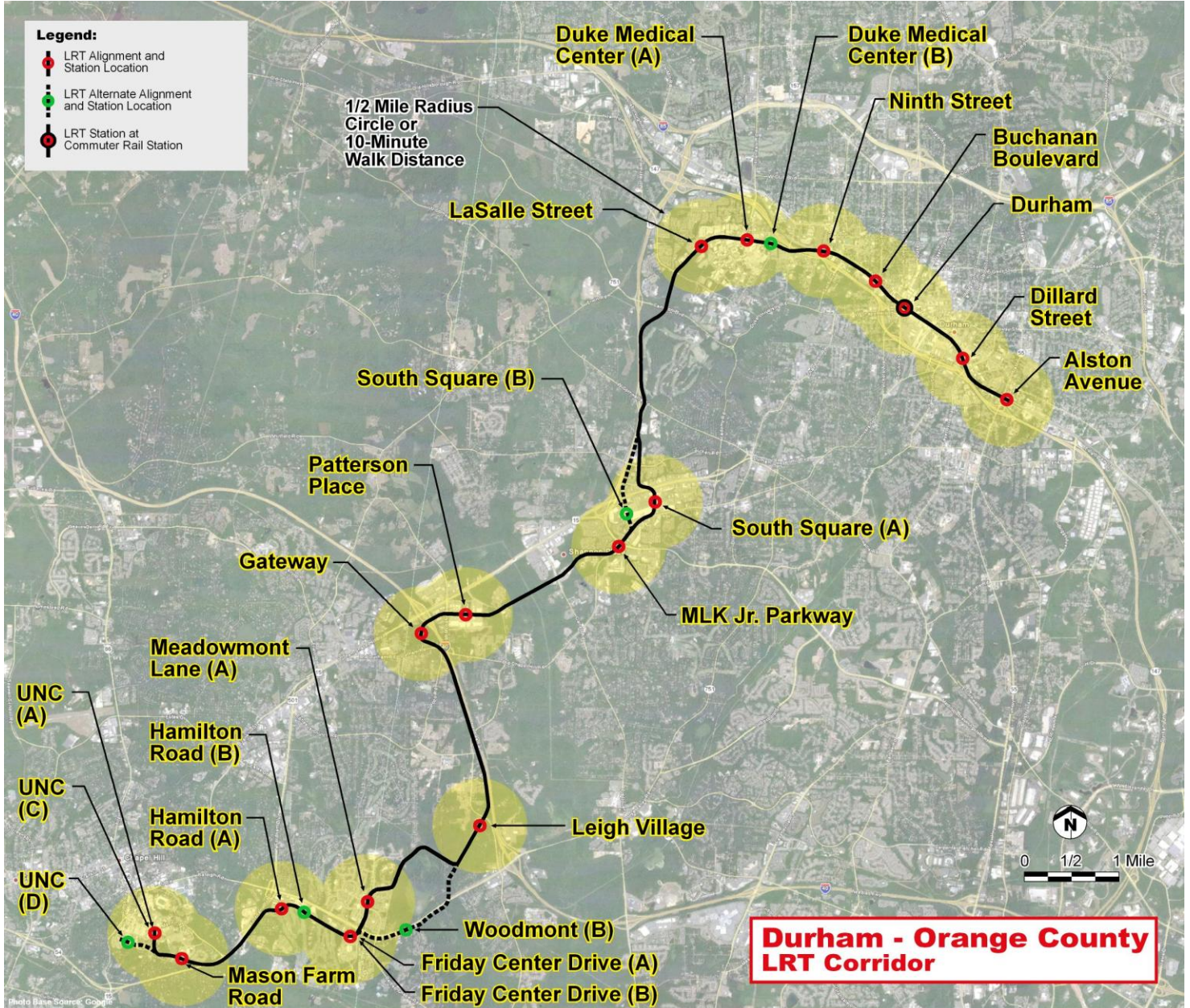
The second map (page 10) shows the Light Rail alignment from Downtown Durham to Chapel Hill.

DRAFT Orange County Bus Investment Plan

40,000 hours of bus improvements in the **first three years**



DRAFT Durham-Orange Light Rail Plan



V. ORANGE COUNTY REVENUES

A variety of revenue sources provide the funding for the Orange County Bus and Rail Investment Plan. Those revenues include:

- A new one-half-cent sales tax in Orange County
- A new \$7 vehicle registration fee levied by Orange County
- An increase of \$3 to the existing \$5 vehicle registration fee currently levied by Triangle Transit in Orange County
- Revenue from Triangle Transit's rental car tax
- NC State Government contributions to funding
- Federal Government contributions to funding

The initial proceeds for each local revenue stream for Orange County in 2012 for transit are assumed to be:

- ½-cent sales tax: \$5.1 million
- \$7 vehicle registration fee: \$770,000
- \$3 vehicle registration fee increase: \$330,000
- Rental car tax revenue: \$560,000

Growth rates assumed for each revenue source:

- ½-cent sales tax:
 - Growth rate from 2011 through 2014: 1.5%
 - Growth rate from 2015 through 2035: 3.6%
- \$7 vehicle registration fee: 2.0%
- \$3 vehicle registration fee increase: 2.0%
- Rental car tax revenue: 4.0%

\$28 million would be borrowed over the life of the plan. This borrowing would allow for the large capital expenditures necessary during a small number of the years in the plan. Any borrowing would be from capital markets through government bonds, would require approval by the NC Local Government Commission, and would have to meet debt to revenue ratios required by the capital markets for bond issuance.

Further details for each revenue source follow.

A. One-half cent sales tax in Orange County

A one half-cent sales tax in Orange County means that when individuals spend \$10.00 on certain goods and services, an additional five cents (\$0.05) is added to the transaction to support the development of the Bus and Rail Investment Plan. Purchases of food, gasoline, medicine, health care and housing generally are excluded from the tax.

A one half-cent sales tax in Orange County is estimated to generate \$5.1 million in 2012. Over the life of the plan to 2035, the sales tax is expected to generate \$180 million in Year-Of-Expenditure (YOE) dollars. All of which is subject to authorization of a referendum by the Orange Board of County Commissioners and approval by the voters.

B. \$7 Vehicle Registration Fee in Orange County

A seven dollar (\$7) vehicle registration fee in Orange County means that when an individual registers a new vehicle or renews the registration for an existing vehicle in Orange County, an additional \$7 per year is added to the cost above the other required registration fees for that vehicle.

The seven dollar fee in Orange County is expected to bring in \$770,000 in 2012. Over the life of the plan to 2035, the seven dollar fee is expected to generate \$23.8 million in Year-Of-Expenditure (YOE) dollars.

C. \$3 Vehicle Registration Fee Increase in Orange County

A three dollar (\$3) vehicle registration fee increase in Orange County means that when an individual registers a new vehicle or renews the registration for an existing vehicle in Orange County, an additional \$3 per year is added to the cost above the other required registration fees for that vehicle. An existing \$5 fee for vehicle registration supports activities of Triangle Transit, including bus operations and long-term planning. This fee would increase to \$8 after the \$3 increase is implemented.

The three dollar fee in Orange County is projected to generate \$330,000 in 2012. Over the life of the plan to 2035, the three dollar fee is expected to generate \$10.2 million in Year-Of-Expenditure (YOE) dollars.

D. Revenue from Triangle Transit's Rental Car Tax

Triangle Transit operations are partially funded by a five percent (5%) tax on car rentals in Wake, Durham, and Orange Counties. Under existing policy adopted by the TTA Board, 50% of the rental car tax revenues are dedicated to advancing long-range bus and rail transit.

Since a significant portion of all cars rented and driven in the three counties are rented at RDU International Airport, it is difficult to determine which rentals are driven primarily in one county or another. Therefore, the 50% rental revenues dedicated to long-term transit were allocated by county according to the percentage of population in the Triangle Region, which is: Wake (68%); Durham (21.5%); Orange (10.5%).

The Triangle Transit rental car tax proceeds directed to Orange County are estimated to be \$560,000 in 2012. Over the life of the plan to 2035, the rental car tax is expected to generate \$24 million in Year-Of-Expenditure (YOE) dollars for Orange County.

E. NC State Government Funding

The plan includes a 25% capital cost contribution by the NC Department of Transportation (NCDOT) for both light rail and commuter rail projects in Orange County. This level of participation was established by the State in its participation in the Charlotte Blue Line light rail project in 2003. The plan assumes that NCDOT also pays for 10% of bus capital costs (replacement buses, new buses, park and ride lots, etc) consistent with its current practices. NCDOT assumed contributions to the plan total \$132 million in YOE dollars from 2012 through 2035.

F. Federal Government Funding

The plan assumes that the Federal Government contributes 50% of the capital cost for both the light rail and commuter rail projects in Orange County. This was the federal level of participation in the Charlotte Blue Line light rail project and is consistent with federal funding outcomes for most rail projects in the Federal Transit Administration's New Starts program in recent years.

The plan assumes that the Federal Government also pays for 80% of bus capital costs, consistent with its current practices, and continues to provide operating appropriations consistent with present Federal Transit Administration operating grant formulas. Assumed Federal Government contributions to the plan total \$239 million in YOE dollars from 2012 through 2035.

G. Transit Fares

The plan assumes fares for all operating agencies remain unchanged from the existing fare structures.

H. Additional Revenue Sources

This draft Bus and Rail Investment Plan does not rely on additional municipal contributions, public or private 3rd party contributions, or value added forms of revenue.

VI. ORANGE FINANCIAL PLAN DATA

The following is a list of the total spending for each technology and category identified in the Orange County Bus and Rail Investment Plan.

- Rail Capital: \$423 million (\$330 million in 2011 dollars)
- Rail Operations: \$58 million
- Bus Capital: \$41 million (including MLK Bus Lanes)
- Bus Operations: \$127 million
- Debt: \$23 million

VII. IMPLEMENTATION AGREEMENT: ANNUAL REVIEW AND CHANGES TO THE PLAN

The Orange County Bus and Rail Investment Plan details the specific elements of local and regional bus service, and Light Rail service to be added in Orange County over a twenty-three year period. Because of the long time frame for implementation of the Plan and its major capital projects, over time there will need to be changes and revisions made to the Plan. As the statutory implementation agency, Triangle Transit will work with Orange County, the DCHC Metropolitan Planning Organization (MPO), and the towns of Chapel Hill, Carrboro, Hillsborough, the University of North Carolina at Chapel Hill and Chapel Hill Transit, the public transit provider in Orange County, to develop and execute an Implementation agreement which details the following aspects of implementation of the Plan:

- (a) Annual review presentations of the activities and progress made in implementation of the Plan by Triangle Transit to the County and the MPO;
- (b) The process for review and vote by the County, the MPO and Triangle Transit's Board of Trustees or the role of the operating agency regarding on any significant or substantial revisions to the Plan required by changes experienced in revenues received, capital costs, operating expenses, or other substantial issues affecting the Plan;
- (c) Recognizes and preserves the integrity of the operating agencies;
- (d) Responsibility of Triangle Transit for direct disbursement of funds from the revenues received per Section V (above) to the public agency responsible for implementing the bus services set forth in the Plan; and
- (d) Other necessary provisions regarding implementation of this Plan as agreed to by the County, the MPO, and Triangle Transit

VIII. CLOSING SUMMARY

The Orange County Bus and Rail Investment Plan is the result of years of collaborative work of local elected leaders, regional stakeholders, municipal and county staff and Triangle Transit. The plan consists of a balance of bus improvements and rail investment to help accommodate the intense population growth that the region is expected to experience in the next 25 years.

The proposed plan addresses the ongoing need to provide greater service options to transit riders with improved and expanded bus and rail connections. Once implemented, the residents of Orange County will be able to have greater access to jobs, shopping, and activity centers such as downtown Chapel Hill and Carrboro, the University, or the Hospital.

Additionally, the plan will provide core infrastructure investment that will help support the goals and objectives of local land use plans in Orange County and its municipalities. In particular, as evidence in communities across the country, investment in light rail has proven to be a great motivator for private companies to build transit-oriented development at station locations along the rail corridor. This kind of more intense development generally

consists of a mixed-use, walkable environment that can provide a more sustainable alternative to the suburban growth pattern that exists today.

All the elements listed in the Draft Orange County Bus and Rail Investment Plan are fiscally constrained. At every turn, the Plan is conservative in revenue assumptions and incorporated additional contingencies for capital and operating expenditures.

The draft plan will be shared with the general public, Carrboro Board of Aldermen, Chapel Hill Town Council, the Hillsborough Town Commissioners, the DCHC MPO and the Orange County Commission. The draft plan will be considered for approval by the DCHC MPO, the Triangle Transit Board of Trustees, and the Orange County Commission. The Orange County Commission will determine when to set a referendum date. Once a referendum passes, work can begin on implementation of the Bus and Rail Investment Plan.

DRAFT

DRAFT Orange County Transit Plan -- Annual Operating and Maintenance Costs

Complements Light Rail from UNC-Chapel Hill Medical Center to Leigh Village

Highest Priority Recommendations

Service Type (Responsible Party)	Projects	Enhanced or New?	Total New Hours	Annual Operating Cost	Annual New Bus Hours Cumulative
YEARS 1 THROUGH 3				\$ 2,630,000	44,000
Local (Chapel Hill Transit)	Local Chapel Hill Transit routes in the 15/501 corridor to improve connections with Triangle Transit and DATA	Enhanced	7,300	\$ 710,000	7,300
Regional Exp (Triangle Transit)	Chapel Hill-Durham Boulevard Express (Route 405) - 15 minute service during peak hours	Enhanced	3,300	\$ 630,000	10,600
Local (Chapel Hill Transit)	54 Corridor Improvements (Orange and Durham Counties)	Enhanced	4,000	\$ 390,000	14,600
Local (Chapel Hill Transit)	Support operating costs of existing services		6,000	\$ 580,000	20,600
Regional Exp (Triangle Transit)	Chapel Hill-Durham Express (Route 405) - extend Saturday hours to 11pm	Enhanced	200	\$ 40,000	20,800
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) - extend Saturday hours to 11pm	Enhanced	200	\$ 40,000	21,000
Regional Exp (Triangle Transit)	Carrboro-Chapel Hill-Durham Express (Route 405) - Sundays	New	600	\$ 120,000	21,600
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) - Sundays	New	600	\$ 120,000	22,200
Regional Exp (Triangle Transit)	Mebane-Hillsborough-Duke/VA Medical Centers Express - peak only	New	1,600	\$ 320,000	23,800
Local (Chapel Hill Transit)	Chapel Hill -Carrboro-UNC Sunday service	New	5,100	\$ 490,000	28,900
Local (Town of Hillsborough)	Hillsborough Circulator	New	2,000	\$ 190,000	30,900
Local (Chapel Hill Transit)	Chapel Hill-Carrboro-UNC Expanded Saturday service	Enhanced	3,600	\$ 350,000	34,500
Regional (Triangle Transit)	Chapel Hill-Regional Transit Center via Southpoint (Route 800) 15 minute service during peak hours	Enhanced	1,600	\$ 320,000	36,100
Local (Orange County)	Improve service in unincorporated Orange County	Enhanced	3,000	\$ 290,000	39,100
Local (Chapel Hill Transit)	Chapel Hill-Carrboro-UNC Expanded Evening service	Enhanced	4,100	\$ 400,000	43,200
Local (Town of Hillsborough)	Hillsborough Circulator expanded hours on weekdays and Saturdays	New	500	\$ 50,000	44,000
BY 2035					
Local (Orange County)	Improve service in unincorporated Orange County	Enhanced	3,000	\$ 290,000	47,000
Regional Exp	Pittsboro-Chapel Hill Express 30 minute frequency during peak hours	Enhanced	800	\$ 160,000	47,800
Local (Chapel Hill Transit)	Chapel Hill-Carrboro-UNC peak hour bus frequency improvements	Enhanced	2,200	\$ 210,000	50,000
Local and Rural Bus Service Improvements				\$ 3,485,000	41,000
Regional Bus Service Improvements				\$ 765,000	9,000
Total Bus Service Improvements				\$ 4,250,000	50,000

Note: Cost per hour is assumed to be \$85.

DRAFT Orange County Transit Plan -- Annual Operating and Maintenance Costs

Complements Light Rail from UNC-Chapel Hill Medical Center to Leigh Village

Highest Priority Recommendations

CAPITAL PROJECTS	RELATED OPERATING PROJECT	Unit Cost	Quantity	Est. Cost
Park&Ride near Mebane	Mebane-Hillsborough-Duke/VA Medical Centers Express	\$350,000 per lot	1	\$350,000
Park&Ride in northern Orange County	Northern Orange County-Hillsborough-UNC/Chapel Hill (Route 420)	\$350,000 per lot	1	\$350,000
Park&Ride near I-40 / NC 54 Interchange	Various Routes			Associated with Light Rail Project
Transit Emphasis Corridor (NC 54 between Fordham Boulevard and I-40)	54 Corridor Local Service Improvements and Regional Routes 800 and 805	\$300,000 per mile	3	\$900,000
Neighborhood Transit Center (I-40/US 15-501)	Chapel Hill-Durham Express (Route 405) AND Local Chapel Hill Transit routes in the 15/501 corridor	\$220,000 per bay	1	\$220,000
Pedestrian Accessibility / Amenities Improvements	Top 50 Boarding Locations	\$10,000 Per stop	50	\$500,000
			Subtotal	\$2,300,000
Contingency		30%		\$700,000
			Total	\$3,000,000



The DRAFT Durham County Bus and Rail Investment Plan

Triangle Transit
June 22, 2011





A lot has happened since we last met...



Development and release of the narratives



The DRAFT Durham County Bus and Rail Investment Plan

5/26/2011



The DRAFT Bus and Rail Investment Plan in Orange County

The concept of the Bus and Rail Investment Plan for Orange County was supported through resolutions approved by the Chapel Hill Town Council (Resolution # 2011-05-25/R1), the Carrboro Board of Aldermen (Resolution #129/2010-11) and via letter from the University of North Carolina at Chapel Hill.

The DRAFT document provided for public input by the DCHC has not been reviewed by the Town of Chapel Hill, the Town of Carrboro, or The University of North Carolina at Chapel Hill either individually or together as the Chapel Hill Transit Public Transit Committee. DCHC and Triangle Transit do not make representation that these bodies support this detailed document.

5/26/2011





Additional Public Outreach

MPO Public Workshops

- **June 7** – Southwest Library, 3605 Shannon Rd., Durham
- **June 8** – Holton Career and Resource Center's Senior Room, Second Floor, 401 N. Driver St., Durham
- **June 9** – Presentation to the RTP Owners and Tenants Association
- **June 14** – Chapel Hill Town Hall, 405 Martin Luther King, Jr. Blvd., Chapel Hill
- **June 15** – North Regional Library, 221 Milton Rd., Durham
- **June 16** – Orange County Library, 137 W. Margaret Ln., Hillsborough



Support for the plan

RESOLUTION #9769

Resolution of the Durham City Council in Support of the Bus and Rail Investment Plan for Durham and Orange Counties

WHEREAS, the Durham community has been recognized for its wonderful quality of life and economic vitality on many occasions over the past decade, including Durham's recent ranking as the best mid-sized city for jobs in the US by Forbes magazine, as the #1 housing market in the US by the Wall Street Journal, as one of the top places in the world to visit in 2011 by the New York Times and the #2 "green city" for lifestyle and quality of life by Country Home magazine; and

WHEREAS, the blessings of a vibrant local economy and high quality of life have brought significant transportation challenges to Durham and the region, including a surge in population growth that will add over one million new residents to our regional population of 1.5 million in the next 30 years, a 23% increase in commute times in the last decade, worsening traffic congestion on the area's major roads and streets, and difficulty in meeting air quality standards, with the most recent indication of the challenges being a study cited in Forbes magazine on May 10, 2011 which found that the Triangle region was the urban region in the US that suffered the most from rising gasoline prices; and

WHEREAS, over four years ago the region's two Transportation Advisory Committee's saw a need to strengthen mobility and transit options and named a blue ribbon group of citizens to address our transportation challenges and recommend bus and rail investments needed over the next 25 years; and

WHEREAS, that appointed citizens group (the STAC or Special Transit Advisory Commission) unanimously made recommendations that were formally adopted into the region's long-range transportation plan in 2009; and

WHEREAS, the North Carolina General Assembly enacted the Intermodal Transportation Fund Act in 2009 which allows Durham, Orange and Wake counties to hold referendums of their voters on adoption of an ½ cent sales tax for public transportation improvements; and

WHEREAS, local elected officials and their staffs in both Durham and Orange have prepared a detailed plan for needed bus and rail transportation improvements in their respective counties over the next quarter century that will provide substantial transportation, economic, environmental and quality of life benefits for their citizens.

NOW THEREFORE, BE IT RESOLVED by the Durham City Council that they have reviewed the Bus and Rail Investment Plan presented to them and by this Resolution do support and recommend its adoption to the Durham Board of County Commissioners and recommend that if the Durham

- Presentations to Durham and Orange County Commissions
- Presentations and Resolutions of Support from:
 - Durham City Council
 - Chapel Hill Town Council
 - Carrboro Town Aldermen

Durham County is keeping options open for this fall



Durham County
Bus and Rail Investment Plan

Nov. 8
2011 ?

Orange County
Bus and Rail Investment Plan

2012?

Wake County
Bus and Rail Investment Plan

2012?



DRAFT Durham Bus Investment Plan

TCC 6/20/2011 Attachment 5E

Triangle Regional Transit Program



- New bus hours by end of FIRST year– **27,000 hrs**
- New bus hours by end of THIRD year - **50,000 hrs**
- Total new bus hours by 2033 - **77,000 hrs**
- Potential Rail Dividend Bus Hours **15,000- 37,500** additional hours



DRAFT Durham County Bus Investment Plan

50,000 hours of bus improvements in the **first three years**

TCC 6/20/2011 Attachment 5E

More Connections to...

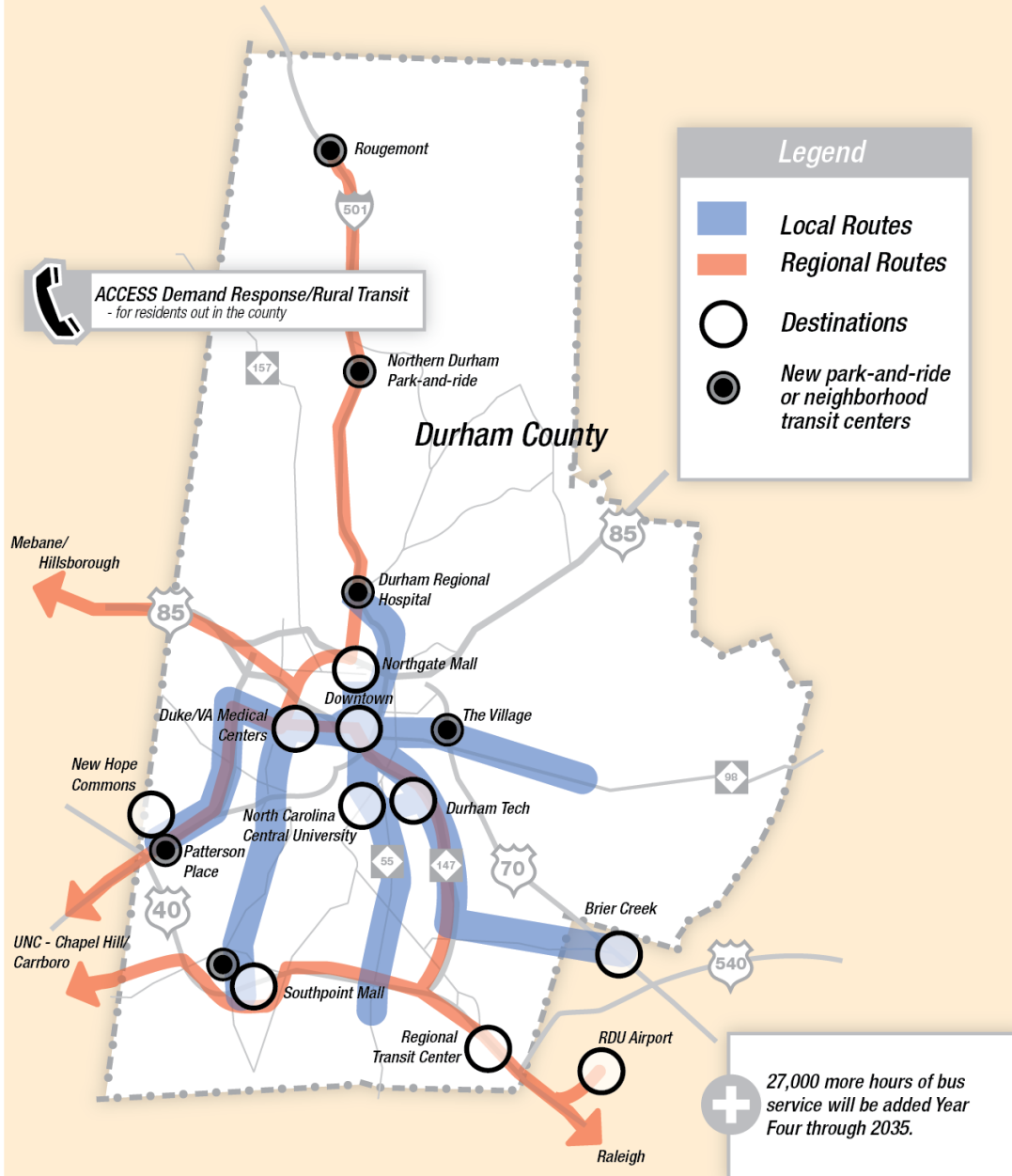
- Jobs
- Durham Tech and North Carolina Central University
- Duke Medical Center

Expanding bus capacity in corridors with HIGH currently bus ridership

- 15 minute frequency during peak hours

Better regional connections (Saturday and Sunday service)

- Raleigh, Chapel Hill, RTP
- RDU International Airport



DRAFT Durham Rail Investment Plan

TCC 6/20/2011 Attachment 5E

Triangle Regional Transit Program



Commuter Rail (CR)

- Opening year for Commuter Rail – **2018**
- CR Capital Cost - **\$300 m**
- CR Annual Operating Cost – **\$2.57 m**

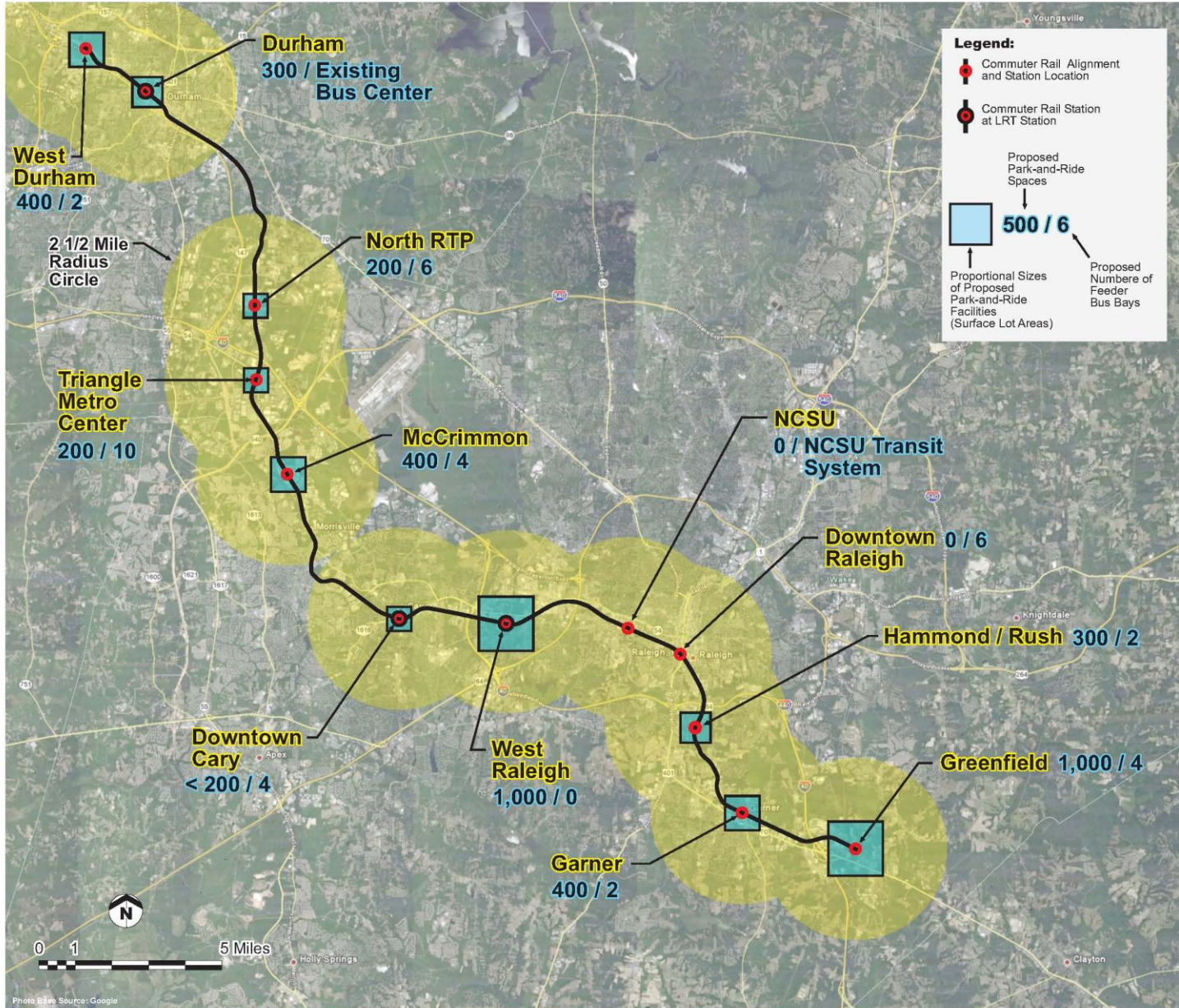


Light Rail Train (LRT)

- Opening year of Light Rail – **2025**
- LRT Capital Cost - **\$1,050 m**
- LRT Annual Operating Cost - **\$11.3 m**



Durham-Wake (Commuter Rail)



Commuter Rail Station Locations Durham-Wake County Corridor

March 5, 2011



Durham-Orange (Light Rail)

County Corridor

Legend

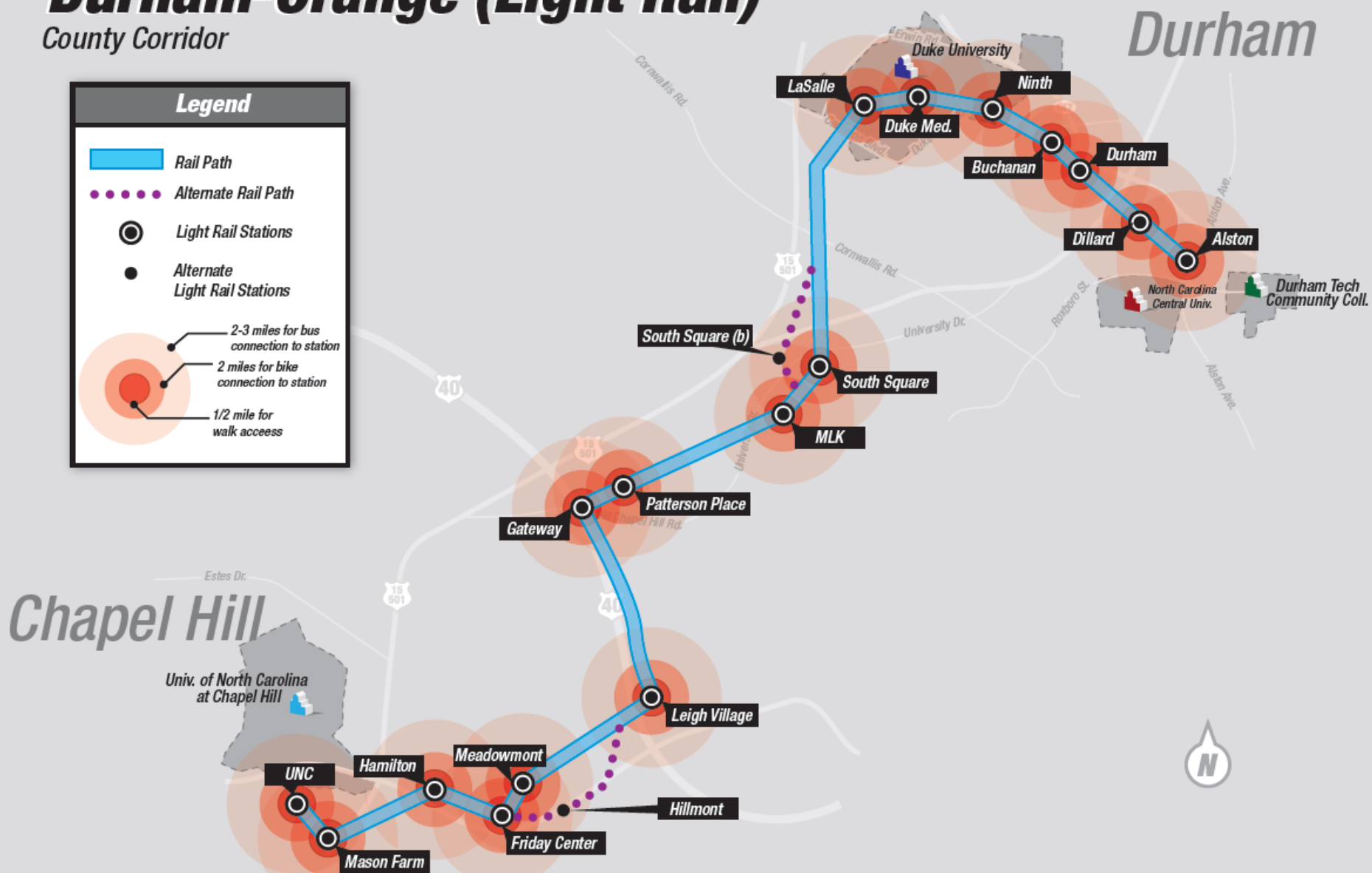
- Rail Path
- Alternate Rail Path
- Light Rail Stations
- Alternate Light Rail Stations

- 2-3 miles for bus connection to station
- 2 miles for bike connection to station
- 1/2 mile for walk access

Chapel Hill

Univ. of North Carolina at Chapel Hill

Durham



Financial Resources



- Local revenue in Bus and Rail Transit Investment Plan
 - One-half cent sales tax
 - \$7 vehicle registration fee
 - \$3 increase in Triangle Transit vehicle registration fee
 - Rental car tax revenue
- State participation - 25% assumed
- Federal participation – 50% assumed





Revenue Projections

- One-half cent sales tax:
 - Growth Rate from 2011 through 2014: 1.5%
 - Growth Rate from 2015 through 2035: 3.5%
- \$7 vehicle registration fee: 2.0%
- \$3 vehicle registration fee increase: 2.0%
- Rental Car Tax revenue: 4.0%





Exclusions from the tax

- The One-half Cent Transit Sales Tax does not apply to the following...



- Food
- Medicine
- Utilities
- Housing
- Gasoline

“... the more the base of the sales tax excludes necessities (such as food and prescription drugs) and includes luxury or nonessential goods and services, the less regressive the tax is likely to be”.

Robert D. Lee, Jr., Ronald W. Johnson and Phillip G. Joyce (2008). *Public Budgeting Systems*, 8th Edition (Boston: Jones Bartlett).



Investment in our people

➤ Investment in transit means...**JOBS, JOBS, JOBS**

- More bus service means more bus operators, mechanics, supervisors, etc.
- The Commuter Rail Project- potentially creates close to **2,000** construction and professional service jobs.
- The Light Rail Project – potentially creates over **4,400** new construction and professional service jobs





Proposed Schedule

Durham County

- DCHC TAC Bus and Rail Investment Plan review – **May 11** ✓
- Durham City Council review Bus and Rail Investment Plan- **May 19** ✓
- Triangle Transit review of D/O Bus and Rail Investment Plan – **May 25** ✓
- BOCC Worksession review Bus and Rail Investment Plan – **June 6** ✓
- BOCC Public Hearing of Bus and Rail Investment Plan – **June 13** ✓
- DCHC TAC review and consider for approval of D/O Bus and Rail Investment Plan – **June 22**
- Triangle Transit Board review and consider for approval – **June 22**
- BOCC consider for approval of Bus and Rail Investment Plan and consider authorization of referendum- **June 27**



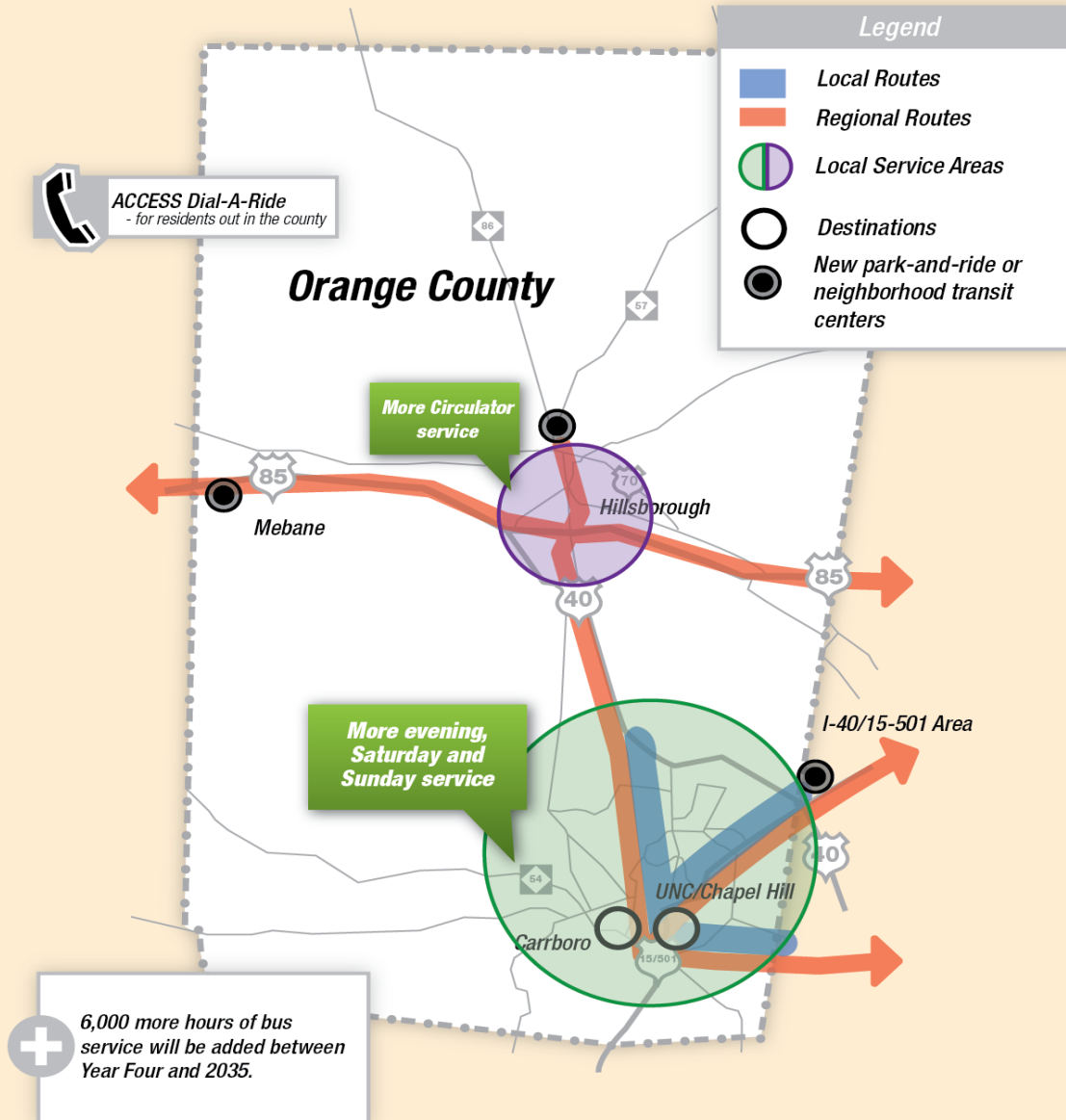


Discussion and Questions



DRAFT Orange County Bus Investment Plan

40,000 hours of bus improvements in the **first three years**



DRAFT Orange Bus and Rail Investment Plan

TCC 6/20/2011 Attachment 5E

Triangle Regional Transit Program



Bus Investment

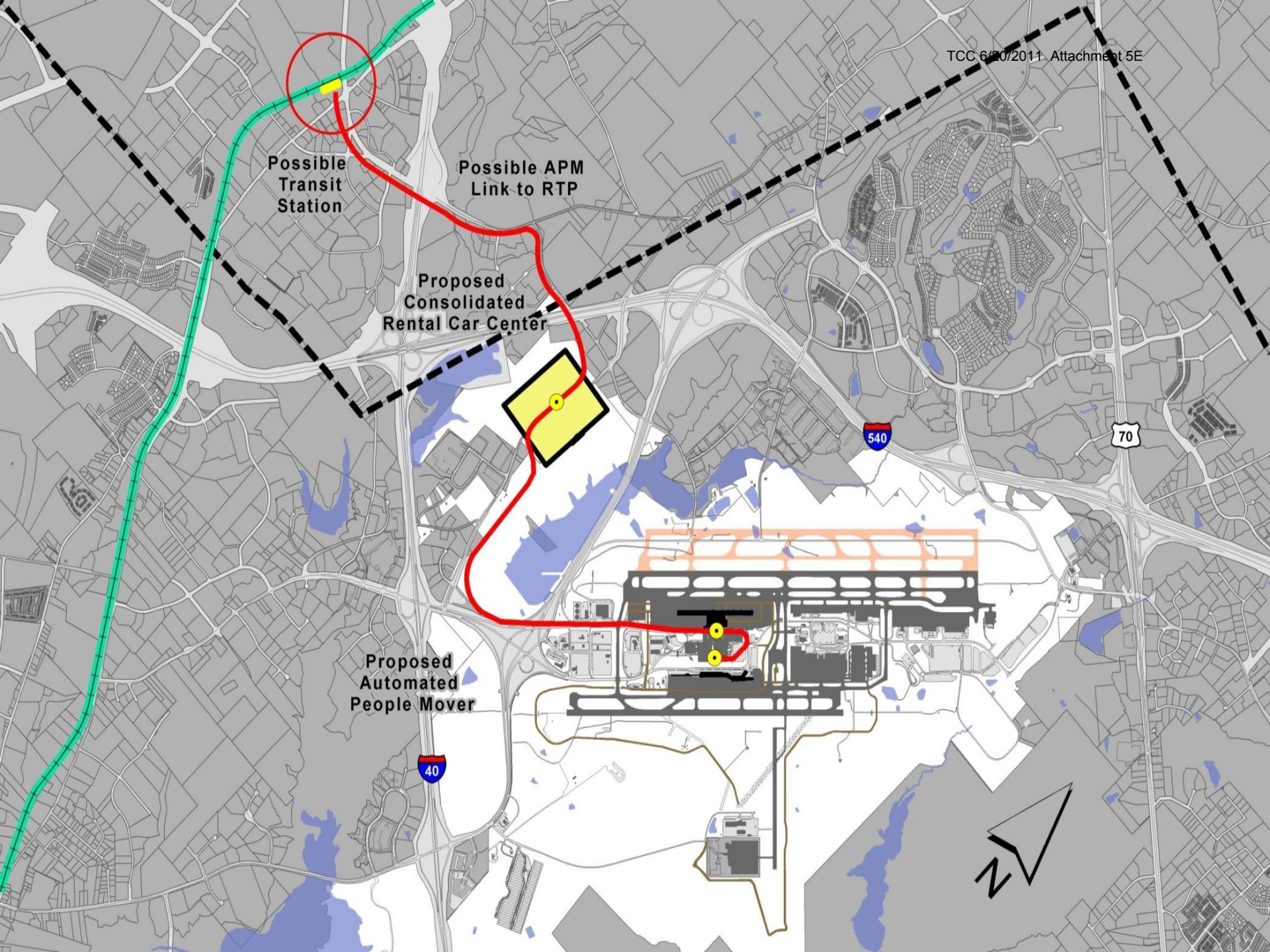
- New bus hours by end of FIRST year – **22,050 hrs**
- New bus hours by end of THIRD year - **44,100 hrs**
- Total number of new bus hours by 2035 – **50,400 hrs**
- MLK Busway Improvements completed -2017
- Potential Rail Dividend Bus Hours – **30,000 to 45,000**

Rail Investment

- Opening year of Light Rail – **2025**
- LRT Capital Cost - **\$330 m**
- LRT Annual Operating Cost – **\$3.2 m**

* *Sales Tax Growth Rate –*
3.6 %





Possible
Transit
Station

Possible APM
Link to RTP

Proposed
Consolidated
Rental Car Center

Proposed
Automated
People Mover





Who rides our DATA buses?

The typical DATA bus customer relies on DATA for their daily activity.

62% do not have a car available for use.

59% use the bus six or seven days per week.

36% are riding more than they did last year.

The typical DATA bus customer is a low-income worker or student.

42% report annual household incomes below \$10,000 and 89% report annual household incomes below \$35,000.

51% report to be currently employed and 62% reported having used DATA to go to or from work in the past month.

23% report to be current students mostly at the college and vocational school and 8% at the middle or high school level

The typical DATA bus customer is a person of color.

63% self-identify as Black

5% self-identify as Hispanic

3% self-identify as Native American

1% self-identify as Asian

4% self-identify as Other

10% self-identify as White

Bus customers (54%) are women - (46%) are men

Durham Riders (DATA) – On-Board Survey, April 2011

(2,200 respondents) - Average Daily Boardings – 17,600



Approval Process

DCHC MPO

- Considers for Approval Bus and Rail Investment Plan

Triangle Transit Board of Trustees

- Considers for Approval Bus and Rail Investment Plan

Durham County Commissions

- Considers for Approval Bus and Rail Investment Plan
- Authorizes referendum

The people will have an opportunity to vote on the Plan by way of a public referendum



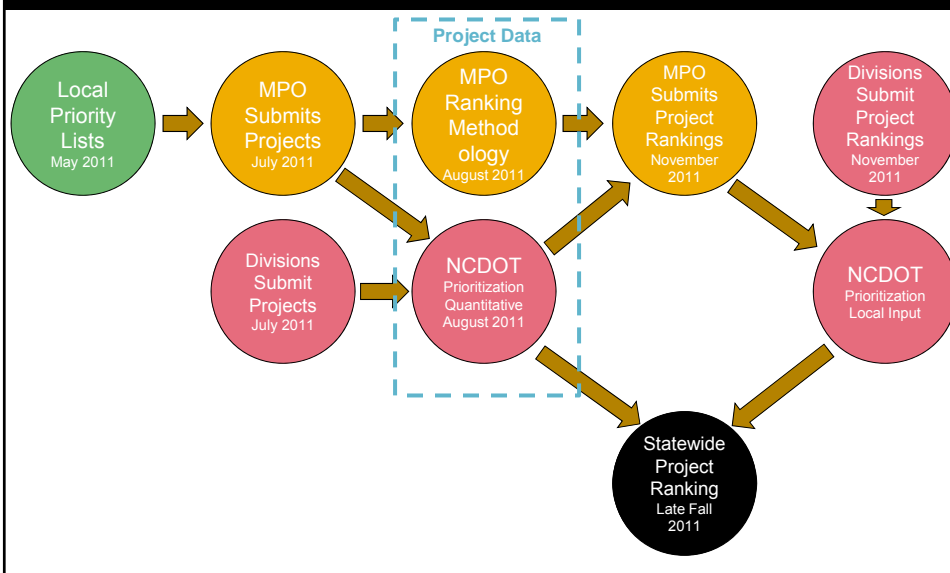
June 20, 2011

Development of the FY 2014-2020 TIP

TCC Meeting

1

TIP Prioritization Process



TAC Schedule

- June 22 TAC
 - Approval of submission of up to 15 new highway, 10 new bicycle, 10 new pedestrian, and transit projects.
 - Approval of MPO Ranking Methodology.
- October 12 TAC
 - Public Hearing on MPO Priority List.
- November 9 TAC
 - Approval of application of MPO's 1,300 highway points
 - Approval of ranking of 5 bicycle and 5 pedestrian projects.
 - Approval of ranking of transit projects.

3

2014-2020 TIP Schedule

- Spring 2012 – NCDOT releases draft 10 Year Work Program
- Spring 2013? – NCDOT approves final 10 Year Work Program

4

Project Types

- **Highway**
 - **Mobility** – capacity widening, new location
 - **Modernization** – upgrade, shoulders, on-road bicycle >\$1M, etc.
- **Bicycle** – on-road <\$1M and greenways
- **Pedestrian**
- **Transit** – capital projects in FY 2013-2015

- Other Modes: Rail, Ferry, Aviation
- Not Included in Prioritization: Highway Safety, Highway Infrastructure Health, CMAQ, STPDA, Urban Loops

5

Project Types and Tiers

	Highway Mobility	Highway Modernization	Bicycle	Pedestrian	Public Transit
Statewide	X	X	X		X
Regional	X	X	X		X
Subregional	X	X	X	X	X

- NCDOT develops project rankings for each category
- NCDOT will hold investment strategy summits to determine how much funding to provide to each category – winter 2011/2012

6

MPO Project Ranking Methodology

- Methodology for the 12-18 TIP needed to be updated to reflect new NCDOT SPOT process.
- Four modes: highway, bicycle, pedestrian, and transit
- The TCC will use the results of the MPO methodology and the results of the SPOT quantitative methodology to develop its recommendation for the MPO's final project ranking.

7

MPO Project Ranking Methodology

- TCC Subcommittee Recommendation:
 - Use our existing methodology as the basis for the new methodology.
 - Simplify data collection by using SPOT data as much as possible.
 - Retain criteria unique to our methodology.
 - Environmental Impacts
 - Community Impacts
 - Environmental Justice Impacts
 - Vary the weighting of the criteria based on type and tier.

8

Durham City and County**Adopted FY 2014-2020 Transportation Improvement Program Local Priority List****Highway**

	Project Description	Tier	Goal	Previous SPOT Rank
A	NC 147/Glover Road Interchange – Construct new interchange. Widen Glover Road from NC 147 to Angier Ave. Provide bicycle, pedestrian, and transit facilities as appropriate.	Statewide	Mobility	New Project
B	NC 54 (I-40 east to NC 55) – Widen existing two-lane facility to multi-lanes with a divided median with consideration for a bus rapid transit. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	1
C	NC 54 (I-40 to Barbee Chapel Rd.) – Widen to 6-lane divided. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	17
D	M.L. King, Jr. Pkwy./NC 55 Interchange (U-2405) – Extend Martin Luther King Jr. Pkwy from NC 55 intersection to Cornwallis Rd. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	91
E	NC 751 (Phase I, S. Roxboro Rd. to NC 54) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	107
F	NC 751 (NC 54 to Renaissance Pkwy.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	New Project
G	NC 751 (Renaissance Pkwy. To Fayetteville Rd.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	New Project
H	Fayetteville Rd. (Woodcroft Pkwy. to Riddle Rd.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	35
I	Old Oxford Highway (Phase I, N. Roxboro to Hamlin Rd.) – Expand capacity. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	212
J	Fayetteville Rd. (Renaissance Pkwy. To NC 751) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project
K	S. Roxboro Rd. (Cornwallis Rd. to MLK Pkwy.) – Part widen to 4-lane, part 4-lane on new location. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project
L	Southwest Durham Drive (US 15-501 to Mt. Moriah Rd.) – Construct 4-lane road on new location. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project
M	NC 751/Hope Valley Rd. (S. Roxboro Rd. to M.L. King Jr. Pkwy.) - On-road bicycle facilities and sidewalks	Regional	Modernization	Unranked (B/P)
N	Club Blvd. (Ambridge St. to Geer St.) – On-road bicycle facilities and sidewalks	Subregional	Modernization	70 (B/P)

	Project Description	Tier	Goal	Previous SPOT Rank
O	Dearborn Dr. (E. Club Blvd. to Old Oxford Rd.) - On-road bicycle facilities and sidewalks	Subregional	Modernization	76 (B/P)
P	Cornwallis Rd. (Erwin Rd. to Chapel Hill Rd.) - On-road bicycle facilities and sidewalks (where appropriate)	Subregional	Modernization	78 (B/P)
Q	Erwin Rd. (Orange County Line to NC 751) - On-road bicycle facilities and sidewalks (where appropriate)	Subregional	Modernization	42
R	Barbee Chapel Rd./Farrington Rd. (NC 54 to Stagecoach Rd.) - On-road bicycle facilities and sidewalks (where appropriate)	Subregional	Modernization	Unranked (B/P)
S	Ephesus Church Rd./Pope Rd. (Orange County Line to Old Durham-Chapel Hill Rd.) - On-road bicycle facilities and sidewalks	Subregional	Modernization	38
T	Sedwick Rd. (Grandale Dr. to Alston Ave.) - On-road bicycle facilities and sidewalks	Subregional	Modernization	Unranked (B/P)

Bicycle

Rank	Project Description
B1	W. Ellerbe Creek Trail (existing trail to Stadium Drive) – Shared Use Path
B2	Scott King Road (Fayetteville Rd. to Grandale Rd.) – On-road bicycle facilities
B3	Rocky Creek Trail (NC 55 to Kelly Bryant Bridge) – Shared Use Path
B4	Duke Beltline Trail – Shared Use Path
B5	NC 751 (Erwin Rd. roundabout to Hillsborough Rd./US 70) – On-road bicycle facilities
B6	Cole Mill Road (Rose of Sharon Rd. to Orange County line) – On-road bicycle facilities

Pedestrian

Rank	Project Description
P1	NC 54 (NC 55 to RTP) – Sidewalks
P2	Roxboro Road (Pacific Ave. to Murray Ave.) – Sidewalks
P3	Cook Road (Fayetteville Rd. near Hillside High to Martin Luther King, Jr. Parkway) – Sidewalks
P4	Duke Street (Murray Ave. to Roxboro Rd.) – Sidewalks
P5	Horton Road (Guess Rd. to Roxboro Rd.) – Sidewalks
P6	Holloway Street (Junction Rd. to Chandler Rd.) – Sidewalks

Transit

Project Description	Year Needed	Cost
14 40' Hybrid Replacement Buses @\$650,000/bus	2013	\$9.1 million
14 40' Hybrid Replacement Buses @ \$700,000/bus	2014	\$9.8 million
15 ADA Replacement Vans @ \$45,000/van	2013	\$675,000
6 Replacement Service Vehicles @ \$30,000/vehicle	2013	\$180,000
4 Replacement Service Vehicles @ \$35,000/vehicle	2014	\$140,000
Passenger Amenities (shelters, benches, trashcans, solar lights)	2013	\$500,000
Passenger Amenities (shelters, benches, trashcans, solar lights)	2015	\$750,000
8 40' Hybrid Expansion Buses @\$650,000/bus <ul style="list-style-type: none"> • 15 minutes headways to Duke • Direct route from downtown to Southpoint • Direct route from downtown to Riverside HS • Direct route from Duke to Southpoint 	2013	\$5.2 million
18 40' Hybrid Expansion Buses @\$700,000/bus <ul style="list-style-type: none"> • 15 minutes headways on routes 1, 3, 4, 6, 7, and 10 • 30 minutes headways on route 15 • Cross-town routes 	2014	\$12.6 million
4 40' Hybrid Expansion Buses @\$750,000/bus <ul style="list-style-type: none"> • 15 minutes headways on routes 12 and 16 	2015	\$3.0 million
4 40' Hybrid Expansion Buses @ \$750,000/bus <ul style="list-style-type: none"> • New Route on MLK Pkwy, NC 55 to South Square • New route from Downtown to Butner 	2015	\$3.0 million
Land Acquisition and Construction of 2 Park -n-ride Lots @ \$1.1 million/lot <ul style="list-style-type: none"> • North Durham/Treyburn area • US 70 east or Parkwood area 	2015	\$2.2 million
Regional Rail Service – Durham to Chapel Hill – Light Rail Transit or Bus Rapid Transit - planning and engineering phase *Description and cost will be determined by Triangle Regional Transit Program	2013-2015	*
Regional Rail Service – Durham to Raleigh – Commuter Rail – planning and engineering phase *Description and cost will be determined by Triangle Regional Transit Program	2013-2015	*

Town of Carrboro
Transportation Improvement Program 2014-2020
Local Priority List: approved May 18, 2011

Highway

<i>Priority #</i>	<i>Description</i>
1	Estes Dr. – Add bike lanes and transit accommodations on both sides of the road, and a sidewalk on the south side of the road, from Greensboro St. to Town limits.
2	Homestead Rd. – Add bike lanes, sidewalks, and transit accommodations on both sides of the road from Seawell School Rd. to Old NC 86.
3	Old NC 86 – Add bike lanes and transit accommodations on both sides of the road, and a sidewalk on the east side of the road, from Hillsborough Rd. to Homestead Rd.
4	Old NC 86 – Add bike lanes and transit accommodations on both sides of the road, and a sidewalk on the east side of the road, from Homestead Rd. to Eubanks Rd.
5	Eubanks Rd. – Add bike lanes, sidewalks, and transit accommodations on both sides of the road from Old NC 86 to Rogers Rd.
6	Franklin/Main/Merritt Mill/Brewer intersection improvements – Make changes to improve operation and safety for motorists, pedestrians, bicyclists, and transit.

Bicycle

<i>Priority #</i>	<i>Description</i>
1	Broad St. to Seawell School Rd. – Construct a multi-use path between Broad St. and Village Dr. and between Village Dr. and Seawell School Rd.; install on-street bicycle facilities on Village Dr.
2	Morgan Creek Greenway – Construct a multi-use path from University Lake to the western terminus of the first phases of the greenway and a multi-use path spur to BPW Club Rd.
3	NC 54 from James St. to Anderson Park – Construct a side path on the north side of the road to accommodate two-direction bicycle transportation.

Pedestrian

<i>Priority #</i>	<i>Description</i>
1	W. Main St. – Install improved pedestrian crossings and sidewalks from Hillsborough Rd. to Jones Ferry Rd.
2	S. Greensboro St. – Add sidewalks on the west side of the road from the northern end of Old Pittsboro Rd. to Merritt Mill Rd.
3	N. Greensboro St. corridor from Weaver St. to Shelton St. – pedestrian improvements
4	Estes Dr. – Construct a sidewalk on the south side of the road from N. Greensboro St. to the Town limits.
5	Old NC 86 – Construct a sidewalk on the east side of the road from Homestead Rd. to Eubanks Rd.

A RESOLUTION APPROVING FY2014-2020 CHAPEL HILL TRANSPORTATION PRIORITY PROJECTS (2011-05-23/R-4)

WHEREAS, the Durham-Chapel Hill-Carrboro Transportation Advisory Committee has begun the process to develop the 2014-2020 Metropolitan Transportation Improvement Program; and

WHEREAS, the Transportation Advisory Committee will develop a Regional Transportation Priority List for use in developing the Metropolitan Transportation Improvement Program; and

WHEREAS, the Transportation Advisory Committee has requested local governments develop transportation priority lists for use in preparing the Regional Priority List; and

WHEREAS, the council received comments from the public on the 2014-2020 transportation priorities;

NOW, THEREFORE, BE IT RESOLVED, by the Council of the Town of Chapel Hill that the Council adopts the following list as the 2014-2020 Transportation Priority List for submission to the Durham-Chapel Hill-Carrboro Transportation Advisory Committee:

FY2014-2020 Transportation Priority List

New	<u>Eubanks Road</u> : Martin Luther King Jr. Boulevard to Roger's Road, construct bicycle lanes, sidewalks, safety, and intersection improvements.
New	<u>Merritt Mill Road</u> : Franklin Street to Fordham Boulevard, construct bicycle lanes and sidewalks.
New	<u>Carmichael Street</u> : Fordham Boulevard to Northern terminus, repave road surface and provide bicycle accommodations
New	<u>Mt. Carmel Church Road/Bennett Road Intersection</u> : Installation of roundabout and related safety improvements
New	<u>Campus to Campus Connector</u> : Broad Street to Estes Drive Extension
New	<u>Horace Williams Greenway</u> : Chapel Hill Watch Village to Homestead Road
New	<u>Dry Creek Trail</u> : Phase 1 Perry Creek Road to Erwin Road

This the 23rd day of May, 2011.

Chatham County Projects for SPOT 2.0

Presented to and endorsed by the Board of County Commissioners on May 16, 2011

Highway Project

US 15-501 Bike Lanes (Orange County line to 400' south of Mann's Chapel Rd)

Description: Widen US 15-501, from the Orange County line to 400 feet south of Mann's Chapel Rd, by three to six feet on each side to create either 15' wide outside lanes or six-foot bike lanes.

Needs Statement: This section of US 15-501 is a four-lane divided highway, with typical 12' wide travel lanes, a 2.5' curb-and-gutter, a 45 mph speed limit and AADT of 21,000. There is no safe space for a bicycle to operate in this section, aside from potentially using the newly constructed four-foot wide sidewalk on the east side of the roadway. In contrast, US 15-501 just south of this section has six-foot wide shoulders, and north into Orange County the roadway has 13' wide outside lanes that transition to 6.5' wide shoulders.

Project Length: 1.3 miles

Planning-Level Cost Estimate: \$2,340,000

Pedestrian Project

US 15-501 at Mann's Chapel Rd Pedestrian Crossing

Description: Improve the pedestrian crossing at US 15-501 and Mann's Chapel Rd by installing a "pork chop island" in each quadrant, pedestrian-actuated crossing signals and crosswalk striping; relocate or remove existing wheelchair ramps.

Needs Statement: The intersection of US 15-501 and Mann's Chapel Rd is a large signalized intersection – 4 to 6 lanes per crossing, made even wider by large turning radii – and currently has no pedestrian facilities. A new sidewalk terminates in the northeast quadrant of this intersection and there are retail establishments on each corner. This intersection also has a high incidence of vehicle crashes based on anecdotal evidence.

Project Length: N/A

Planning-Level Cost Estimate: \$300,000



Hillsborough TIP Priority List 2014-2020

1. **Improvements along South Churton Street (project R-2825):** Develop congestion management, limited access, aesthetic and capacity improvements between US 70 Business and Interstate 40 consistent with the recommendations in the 2006 Churton Street Corridor Plan. The feasibility study completed in February 2002 recommended a 4-lane divided with 16-foot median, curb and gutter cross section for the entire corridor from I-40 to the Eno River bridge.
2. **Orange Grove Road (SR 1006) extension to US 70 Business:** Construct road extension of Orange Grove Road east to cross (over or under to be determined) NCRR to intersect with US 70 Business. Traffic projections should determine road capacity. Improvements for bicycles and pedestrians are included with this request.
3. **U-3436, SR 1148 (Eno Mountain Road) and SR 1192 (Mayo Street) at SR 1006 (Orange Grove Road):** Realign intersection and make safety improvements. Both the EDD Transportation Work Group Recommendations and the Access Management and Awareness Project and Report for Orange Grove Road recommend this project for improved traffic flow and safety.
4. **Train station/multi-modal center:** Construct a train station in Hillsborough and request AMTRAK service to Orange County. The train station can also serve future commuter rail operations and anchor a multimodal transportation hub in Hillsborough. A revenue and ridership study conducted by the North Carolina Department of Transportation Rail Division and AMTRAK has indicated that there is enough potential ridership to make a stop in Hillsborough financially feasible.
5. **NC 86, Bicycle Lanes:** Construct bicycle lanes (4-foot paved shoulders) from Chapel Hill (Whitfield Road) to Hillsborough (US 70 Business). This route is listed as priority 1 of the primary bicycle routes proposed in the Orange County Bicycle Transportation Plan adopted April 6, 1999.
6. **SR 1006, Orange Grove Road, at Interstate 40:** Construct a pedestrian bridge over I-40. Two schools are within walking and cycling distance from residential areas north of I-40. Bicyclists and pedestrian must share the roadway with motor vehicles crossing the narrow two-lane bridge that carries Orange Grove Road over Interstate 40.
7. **US 70 Bypass widening:** Widen US 70 Bypass to a four-lane divided section with bike and pedestrian improvements. This project should be phased to address the traffic counts and existing congestion and the western portion will conform with the recommendations in the 2007 US 70/Cornelius Street Plan.
8. **Western Bypass (project R-3438)** Construct proposed 2-lane facility connecting US 70 with NC 86 North using a portion of Coleman Loop Road (SR 1332) right of way.

ORANGE COUNTY TRANSPORTATION PRIORITY LIST
2014 – 2020 DURHAM-CHAPEL HILL-CARRBORO
METROPOLITAN TRANSPORTATION IMPROVEMENT PROGRAM

1. TIP Project No. EB-4980, SR 1006 (Orange Grove Road) at Interstate 40: Construct a pedestrian bridge over I-40; construct sidewalk along the north side of Orange Grove Road from the bridge to Timbers Drive. This pedestrian bridge is the central element in the Safe Routes to School plan for Grady A. Brown Elementary School and for Cedar Ridge High School. Without the bridge, the SRTS plan cannot move forward. Construction of 0.14 mile (approx.) sidewalk on the north side of the bridge extending from the bridge to Timbers Avenue will provide connectivity from the bridge to three high-density neighborhoods: Patriot's Point, Colonial Estates, and the Timbers. To improve the pedestrian access to the south of the bridge, the Orange County School System has committed to constructing a safe and comfortable path from the pedestrian bridge to the Cedar Ridge entrance.

Interstate 40 separates two schools, Grady Brown Elementary and Cedar Ridge High School, from residential areas north of the interstate. The Orange County school system estimates that over 262 students live within one mile of the schools. Most of these students live in the high-density Timbers, Patriot's Pointe, and Colonial Estates neighborhoods.

The "Access Management and Awareness Project and Report for Orange Grove Road" recommends this project.

2. TIP Project No. R-2825, SR 1009 (South Churton Street) Improvements: Develop congestion management, limited access, aesthetic and capacity improvements including bicycle and pedestrian improvements between US 70 Business and Interstate 40. The portion between Interstates 40 and 85 will conform to the design criteria of the Economic Development District Design Manual (4-lane divided section with bike and pedestrian improvements). The feasibility study completed by NCDOT in February 2002 recommends a 4-lane divided curb and gutter cross section, with 16-foot median, for the entire corridor from I-40 to the Eno River. Orange County stresses the need to study improvements within the current right-of-way for the segment north of Interstate 85. Improved capacity through widening is not the County's first choice because of significant constraints between Interstate 85 and US 70 Business and the proximity of the historic district north of the project limits. Orange County requests that, where conditions do not prevent the addition of frontage roads, the feasibility study include the addition of frontage roads with limited access from the corridor.
3. Hillsborough Train Station: Construct a train station in Hillsborough as designated in Hillsborough's *Rail Station Small Area Plan*, and implement AMTRAK service to Orange County. The train station can also serve future commuter rail operations and anchor a multimodal transportation hub in Hillsborough. A revenue and ridership study conducted by the North Carolina Department of Transportation Rail Division and AMTRAK has indicated that there is enough potential ridership to make a stop in Hillsborough financially feasible.

ORANGE COUNTY TRANSPORTATION PRIORITY LIST
2014 – 2020 DURHAM-CHAPEL HILL-CARRBORO
METROPOLITAN TRANSPORTATION IMPROVEMENT PROGRAM

4. Park and Ride Lot in the Buckhorn Economic Development District: Orange County requests funding for a park and ride facility (from the adopted Orange County Economic Development District Design Manual) to be located in the I-85/Buckhorn Road Economic Development District. This project would provide an opportunity for coordination of public transportation efforts between two growing regions in North Carolina, the Triad and Triangle.
5. US 70 East-Interstate 85 Connector: Modify the I-85 Connector interchange at US 70 to provide access from all directions. This project would enable traffic from northwest Orange County to access Interstate 85 more easily without risking the many points of traffic conflict through Efland. The Interstate 85/US 70 Connector just east of Efland is not accessible to traffic on eastbound US 70 and there is no access to westbound US 70 from the connector.

Traffic has increased through northwestern Orange County on Efland Cedar Grove Road as an alternative to NC 86. Much of that traffic “dog-legs” through Efland via Forrest Avenue to Mt. Willing Road to access Interstate 85. Mt. Willing Road provides an at grade crossing of the North Carolina Railroad corridor, the only access across the railroad tracks between Hillsborough and Buckhorn Road.

6. SR 1009 (Old NC 86) Bicycle Facilities: Construct bicycle facilities on Old NC 86 from Hillsborough Road in Carrboro to I-40 in Hillsborough. This route along Old NC 86, from Carrboro’s Transition Area just north of Eubanks Road (SR 1727) to Rippy Lane (SR 1224), is priority 6 of the primary bicycle routes listed in the Orange County Bicycle Transportation Plan. This project would extend bicycle accommodations requested in TIP Project R-2825 (South Churton Street bicycle lanes from Interstate 40 to the Eno River) to Hillsborough Road in Carrboro and provide a connection between proposed bicycle facilities in Carrboro along Old Fayetteville Road, Homestead Road and Eubanks Road.
7. SR 1006 (Orange Grove Road) Extension: Extend Orange Grove Road from the east side of Churton Street (SR 1009) to US 70 business. This project is scheduled for reprioritization. The “EDD Transportation Work Group Recommendations” and the “Access Management and Awareness Project and Report for Orange Grove Road” recommend this project as an alternative access to the US 70 Business/NC 86 corridor to alleviate congestion on Churton Street. This project could also provide access to a potential site for Orange County’s priority rail project, AMTRAK service and train station in Hillsborough, although the site for such rail station has not been determined.
8. Tip Project No. U-3436, SR 1148 (Eno Mountain Road) and SR 1192 (Mayo Street) at SR 1006 (Orange Grove Road): realign intersection and make safety improvements. This project is not included in the Draft 2012 – 2018 TIP, and is scheduled for reprioritization. The Hillsborough Town Board and Orange County Board of Commissioners have endorsed this project in two joint studies that included commissioners from both jurisdictions. The “EDD Transportation Work Group Recommendations” and the “Access Management and Awareness Project and Report for Orange Grove Road” recommend this project for improved traffic flow and safety.

ORANGE COUNTY TRANSPORTATION PRIORITY LIST
2014 – 2020 DURHAM-CHAPEL HILL-CARRBORO
METROPOLITAN TRANSPORTATION IMPROVEMENT PROGRAM

9. U-2805, SR 1777 (Homestead Road) Improvements: Improve Homestead Road from Old NC 86 (SR 1009) to NC 86 to include bicycle lanes and sidewalks in sections of the corridor where those facilities do not exist. This project is not included in the Draft 2012-2020 TIP, and is scheduled for reprioritization. There are three schools in the vicinity of Homestead Road: Chapel Hill High School, Smith Middle School and Seawell Elementary School. Many students live within walking distance and cycling distance to Chapel Hill High School and must walk or cycle along Homestead Road, and cross the road daily. Provision of sidewalks is of utmost importance for the safety of students and other pedestrians who use this corridor. Provision of bicycle facilities is, likewise, necessary for the safety of students and others
10. SR 1727 (Eubanks Road) bicycle lanes: Construct bicycle lanes on Eubanks Road from Old NC 86 (SR 1009) to Rogers Road (SR 1729). The project would provide bicycle access to the new Morris Grove Elementary School off Eubanks Road. Increased traffic on Eubanks from the solid waste convenience center and Chapel Hill Public Works Facility and Transportation Facility on Millhouse Road off of Eubanks presents conflicts with bicycle transportation on the facility.
11. Dairyland Road bicycle facilities: Construct 4-foot paved shoulders on Dairyland Road (SR 1112, SR 1113, SR 1177) from Union Grove Church Road (SR 1111) to Orange Grove Road (SR 1006). This project is one segment of a route providing connection from Carrboro to the Efland/Mebane area via Orange Grove Road and Buckhorn Road (SR 1114) to West Ten Road (SR 1144). The complete route would extend bicycle facilities proposed with highway improvements on Buckhorn Road in the Buckhorn Road Economic Development District.

This project was submitted for the 2011-2017 TIP through the Triangle Rural (TARPO) Planning Organization. The Dairyland segment ranked #3 in the Strategic Planning Office of Transportation (SPOT) ranking of bicycle projects in the TARPO.

12. NC 86 (North of Hillsborough) Improvements: Widen NC 86 from US 70 bypass to north of NC 57 to four lanes with intersection improvements at US 70 bypass and NC 57. Improvements at the NC 86/US 70 intersection should include extending the queuing lane for traffic turning east onto US 70 Bypass from northbound Churton Street/NC 86. Improvements at the NC 86/NC 57 intersection should include a crosswalk and provide a safe crossing for pedestrians with sidewalk connecting the intersection of NC 86 and NC 57 to Rencher Street. Improvements at the NC 86/NC 57 intersection are identified in the developing Safe Routes to School Action Plan for Stanford Middle School as a major need to provide a safe access for students living north of US 70 and west of NC 86 to walk or bike to school. NC 86 is the major north-south route through Orange County and is designated in North Carolina's Long-Range Statewide Multimodal Transportation Plan as a Strategic Highway Corridor. NC 57 converges into US 86 just north of US 70 Bypass. The segment of NC 86 between NC 57 and US 70 is congested, rendering a high accident location at the intersection of US 70 Bypass at NC 86.

OTHER PROJECTS

Orange County has submitted several priority projects for previous updates to the Transportation Improvement Program that the County has omitted from this priority list for the following reasons:

1. The projects are bicycle projects with estimated costs greater than \$1,000,000, and will be prioritized as new highway modernization projects and Orange County complies with the Metropolitan Planning Organization's request to limit requests to 3 new highway projects; or
2. The projects are highway projects that are not included in the 2035 DCHC Long Range Transportation Plan.

These projects will be important for future mobility. Orange County requests the following projects be considered for funding in future updates to transportation plans and programs as traffic and congestion conditions warrant:

- SR 1114 (Buckhorn Road) Widening: Widen Buckhorn Road from US 70 to West Ten Road (SR 1144) to a multi-lanes with bicycle and pedestrian facilities. This stretch of roadway borders the western boundary of the I-85/Buckhorn Road Economic Development District EDD). Orange County has extended water and sewer to this area to serve the Gravelly Hill Middle School on West Ten Road and to increase the attractiveness of the Economic Development District. Improvements to the transportation system to support plans for that district will be necessary to efficiently and safely accommodate anticipated traffic. The Gravelly Hill Middle School and soccer fields on the north side of West Ten Road also increase traffic on this segment of Buckhorn Road.
- SR 1008 (Mt. Carmel Church Road) bicycle lanes: Construct bicycle lanes on Mt. Carmel Church Road from US 15-501 to the Orange/Chatham County line. This project is a segment of the Mountains to Seas Bicycle Route. Mt. Carmel Church Road, from Chapel Hill's extraterritorial planning jurisdiction (ETJ) to the Orange/Chatham County line is priority 8 of the primary priority bicycle routes on the Orange County Bicycle Transportation Plan. Increased traffic on Mt. Carmel Church has worsened travel conditions in this corridor that has many blind curves, making this popular bicycle route unsafe for bicycling.
- US 70 Bypass Widening: Widen US 70 Bypass, from the Orange/Durham County line to the I-85-US 70 Connector east of Efland, to a four-lane divided section with bike and pedestrian improvements. This project should be phased to address traffic counts and existing congestion. Two segments of this corridor are of particular interest. The first segment is the one through northern Hillsborough because of the economic development potential of this segment (as referenced in the US 70/Cornelius Street Corridor Strategic Plan) and proximity to C.W. Stanford Middle School and Orange High School. The second segment is the segment through the Eno Economic Development District that includes the interchange of Interstate 85 and US 70, and should be contemporaneous with TIP Project I-0305, Interstate 85 widening from I-40 to the Orange/Durham County line.

- NC 86, Bicycle Facilities: Construct bicycle facilities (4-foot paved shoulders) from Chapel Hill (Whitfield Road, SR 1730, SR 1731) to Hillsborough (US 70 Business). This project will extend bicycle facilities on Martin Luther King, Jr. Boulevard (NC86) in Chapel Hill to US 70 Business in Hillsborough. NC 86 from Chapel Hill to Hillsborough is experiencing increasing numbers of bicyclists using this route and there are also two schools along this route, A.L. Stanback Middle School and New Hope Elementary School (just off NC 86 on New Hope Church Road, SR 1723). This route is listed as priority I of the primary bicycle routes proposed in the Orange County Bicycle Transportation Plan.

Highway Projects on Local Priority Lists that are already in the SPOT database

Local Rank	Project Description	Tier	Goal	Previous SPOT Rank	Submitted by	Notes	Cost
not provided	NC 54 (I-40 east to NC 55) – Widen existing two-lane facility to multi-lanes with a divided median with consideration for a bus rapid transit. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	1	Durham, Durham County		\$ 91,500,000
not provided	NC 54 (I-40 to Barbee Chapel Rd.) – Widen to 6-lane divided. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	17	Durham, Durham County		\$ 39,100,000
not provided	Fayetteville Rd. (Woodcroft Pkwy. to Riddle Rd.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	35	Durham, Durham County		\$ 21,100,000
not provided	Ephesus Church Rd./Pope Rd. (Orange County Line to Old Durham-Chapel Hill Rd.) - On-road bicycle facilities and sidewalks	Subregional	Modernization	38	Durham, Durham County		\$ 600,000
not provided	Erwin Rd. (US 15-501 to NC 751) - On-road bicycle facilities and sidewalks (where appropriate)	Subregional	Modernization	42	Durham, Durham County		\$ 5,527,000
1, 1	Churton Street (SR 1009) I-40 to Eno River. Widen to Multi-Lanes with landscaped median, bicycle lanes, and sidewalks, widen Bridge No. 240 over Southern Railroad.	Subregional	Mobility	87	Hillsborough, Orange County		\$ 19,260,000
not provided	M.L. King, Jr. Pkwy./NC 55 Interchange (U-2405) – Extend Martin Luther King Jr. Pkwy from NC 55 intersection to Cornwallis Rd. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	91	Durham, Durham County		\$ 30,000,000
not provided	NC 751 (Phase I, S. Roxboro Rd. to NC 54) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	107	Durham, Durham County		\$ 7,200,000
1	SR 1780/Estes Dr. (SR 1772 (Greensboro Street) to NC 86). Widen to add bike lanes, sidewalks, and transit accommodations.	Subregional	Modernization	109	Carrboro		\$ 2,197,000
not provided	SR 1114 (Buckhorn Road) Widening: Widen Buckhorn Road from US 70 to West Ten Road (SR 1144) to a multi-lanes with bicycle and pedestrian facilities.	Subregional	Mobility	120	Orange County	Project now in MPO MAB, Not in 2035 LRTP	?
6	Franklin/Main/Merritt Mill/Brewer intersection improvements – Make changes to improve operation and safety for motorists, pedestrians, bicyclists, and transit.	Subregional	Mobility	131	Carrboro		\$ 1,000,000
2, 4	Orange Grove Road Extension (Orange Grove Road to US 70) with sidewalks and bicycle lanes	Subregional	Mobility	136	Hillsborough, Orange County		\$ 30,000,000
3, 5	SR 1148 (Eno Mountain Road) and SR 1192 (Mayo Street) at SR 1006 (Orange Grove Road). Realign Intersection and Make Safety Improvements. include bicycle lanes and sidewalks.	Subregional	Modernization	180	Hillsborough, Orange County		\$ 2,350,000
not provided	Old Oxford Highway (Phase I, N. Roxboro to Hamlin Rd.) – Expand capacity. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	212	Durham, Durham County		\$ 38,100,000
2, 6	Homestead Rd. - SR 1009 (Old NC 86) to NC 86. Widen to include bicycle lanes, sidewalks, transit accommodations, and safety improvements (design may vary along length).	Subregional	Modernization	237	Carrboro, Orange County		\$ 5,505,000
2	US 70 East-Interstate 85 Connector: Modify the I-85 Connector interchange at US 70 to provide access from all directions.	Regional	Mobility	250	Orange County	Project now in MPO MAB, Not in 2035 LRTP	?
not provided	Club Blvd. (Ambridge St. to Geer St.) – On-road bicycle facilities and sidewalks	Subregional	Modernization	70 (B/P)	Durham, Durham County		\$ 2,978,000
not provided	Dearborn Dr. (E. Club Blvd. to Old Oxford Rd.) - On-road bicycle facilities and sidewalks	Subregional	Modernization	76 (B/P)	Durham, Durham County		\$ 2,389,000
not provided	Cornwallis Rd. (Erwin Rd. to Chapel Hill Rd.) - On-road bicycle facilities and sidewalks (where appropriate)	Subregional	Modernization	78 (B/P)	Durham, Durham County		\$ 3,024,000
not provided	NC 751 (HOPE VALLEY RD) (SR 1146 (S ROXBORO RD) TO Martin Luther King Pkwy BIKE LANES AND SIDEWALKS.	Regional	Modernization	Unranked (B/P)	Durham, Durham County	Needs to be reclassified by SPOT	\$ 4,916,000
4, not provided	NC 86 (US 70A TO Whitfield Rd.) WIDE OUTSIDE LANES.	Regional	Modernization	Unranked (B/P)	Hillsborough, Orange County	Needs to be reclassified by SPOT	\$ 933,340
not provided	SR 1110 (BARBEE CHAPEL RD/Farrington Rd.) (NC 54 TO SR 1107 (STAGECOACH RD)) (DESIGN MAY VARY ALONG LENGTH) BIKE LANES AND SIDEWALKS.	Subregional	Modernization	Unranked (B/P)	Durham, Durham County	Needs to be reclassified by SPOT	\$ 1,759,000
not provided	SR 1102/SR1977 (SEDWICK RD) (SR 1100 (GRANDALE DR) TO SR 1945 (S ALSTON AVE)) BIKE LANES AND SIDEWALKS.	Subregional	Modernization	Unranked (B/P)	Durham, Durham County	Needs to be reclassified by SPOT	\$ 2,187,000
3, 3	SR 1009 (OLD NC 86) (SR 1009 (HILLSBOROUGH RD) TO SR 1777 (HOMESTEAD RD))(DESIGN MAY VARY ALONG LENGTH) SIDEWALKS AND BICYCLE LANES and transit accommodations.	Subregional	Modernization	Unranked (B/P)	Carrboro, Orange County	Needs to be reclassified by SPOT	\$ 1,320,000

Local Rank	Project Description	Tier	Goal	Previous SPOT Rank	Submitted by	Notes	Cost
4.3	SR 1009 (OLD NC 86) (SR 1777 (HOMESTEAD RD) TO SR 1727 (EUBANKS RD)) (DESIGN MAY VARY ALONG LENGTH) SIDEWALKS AND BICYCLE LANES and transit accommodations.	Subregional	Modernization	Unranked (B/P)	Carrboro, Orange County	Needs to be reclassified by SPOT	\$ 4,233,000
5, 7	SR 1727 (EUBANKS RD) (SR 1009 (OLD NC 86) TO ROGERS RD) (DESIGN MAY VARY ALONG LENGTH) SIDEWALKS, BICYCLE LANES, and transit improvements.	Subregional	Modernization	Unranked (B/P)	Carrboro, Orange County	Needs to be reclassified by SPOT	\$ 1,992,000
3	SR 1009 (OLD NC 86) (I-40 TO SR 1727 (EUBANKS RD.)) WIDE OUTSIDE LANES.	Subregional	Modernization	Unranked (B/P)	Orange County	Needs to be reclassified by SPOT	\$ 1,598,000
not provided	SR 1008 (MOUNT CARMEL CHURCH RD) (US 15-501 TO CHATHAM COUNTY LINE) BICYCLE LANES.	Subregional	Modernization	Unranked (B/P)	Orange County	Needs to be reclassified by SPOT	\$ 1,215,000

Highway Projects on Local Priority Lists that are not in the SPOT database - MPO can submit up to 15 new projects

Local Rank	Project Description	Tier	Goal	Previous SPOT Rank	Submitted by	Notes	Cost
not provided	NC 147/Glover Road Interchange – Construct new interchange. Widen Glover Road from NC 147 to Angier Ave. Provide bicycle, pedestrian, and transit facilities as appropriate.	Statewide	Mobility	New Project	Durham, Durham County		?
8	Dairyland Road bicycle facilities: Construct 4-foot paved shoulders on Dairyland Road (SR 1112, SR 1113, SR 1177) from Union Grove Church Road (SR 1111) to Orange Grove Road (SR 1006)	Subregional	Modernization	New Project	Orange County		\$ 4,217,000
9	NC 86 (North of Hillsborough) Improvements: Widen NC 86 from US 70 bypass to north of NC 57 to four lanes with intersection improvements at US 70 bypass and NC 57.	Statewide	Mobility	New Project	Orange County		?
not provided	NC 751 (NC 54 to Renaissance Pkwy.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	New Project	Durham, Durham County		?
not provided	NC 751 (Renaissance Pkwy. To Fayetteville Rd.) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Regional	Mobility	New Project	Durham, Durham County		?
not provided	Fayetteville Rd. (Renaissance Pkwy. To NC 751) – Widen to 4-lane. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project	Durham, Durham County		?
not provided	S. Roxboro Rd. (Cornwallis Rd. to MLK Pkwy.) – Part widen to 4-lane, part 4-lane on new location. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project	Durham, Durham County		?
not provided	Southwest Durham Drive (US 15-501 to Mt. Moriah Rd.) – Construct 4-lane road on new location. Provide bicycle, pedestrian, and transit facilities as appropriate.	Subregional	Mobility	New Project	Durham, Durham County		?
1	US 15-501 (Orange County Line to 400' south of Mann's Chapel Rd.) - Add either 15' wide outside lanes or 6' bike lanes	Statewide	Modernization	New Project	Chatham County		\$ 2,340,000
not provided	Eubanks Rd. (Rogers Rd. to NC 86) construct bicycle lanes, sidewalks, safety, and intersection improvements.	Subregional	Modernization	New Project	Chapel Hill		?
not provided	Merritt Mill Road (Franklin St. to Fordham Blvd.) construct bicycle lanes and sidewalks.	Subregional	Modernization	New Project	Chapel Hill		?
not provided	Carmichael St. (Fordham Blvd. to Northern terminus) repave road surface and provide bicycle accom	Subregional	Modernization	New Project	Chapel Hill		?
not provided	Mt. Carmel Church Road/Bennett Road Intersection: Installation of roundabout and related safety imp	Subregional	Modernization	New Project	Chapel Hill		?

Highway Projects on Local Priority Lists that do not pass the MPO's screening criteria

Local Rank	Project Description	Tier	Goal	Previous SPOT Rank	Submitted by	Notes	Cost
5, not provided	US 70 Bypass widening from the Orange/Durham County line to the I-85-US 70 Connector east of Efland: Widen US 70 Bypass to a four-lane divided section with bike and pedestrian improvements.	Subregional	Mobility	New Project	Hillsborough, Orange County	Not in 2035 LRTP	?
6	Hillsborough Western Bypass - US 70 to NC 57. Two Lanes on New Location.	Subregional	Mobility	New Project	Hillsborough	Not in 2035 LRTP	?

Projects not on Local Priority Lists that are already in the SPOT database

Project Classification					Project Location						
SPOTID	Tier	Goal	Improvement Type	TIP #	Route	Route Name	From / Cross Street	To	Description	First Division	First MPO/RPO Name
42688	Statewide	Mobility	Capacity	I-0305A	I-085		SR 1006 near Hillsborough	East of SR 1709	I-40 at Hillsborough to Durham County Line. Widen to Six Lanes and Reconstruct Interchanges and Structures. Section A: SR 1006 near Hillsborough to East of SR 1709.	07	Durham-Chapel Hill-Carrboro MPO
42689	Statewide	Mobility	Capacity	I-0305B	I-085		East of SR 1709	Durham County Line	I-40 at Hillsborough to Durham County Line. Widen to Six Lanes and Reconstruct Interchanges and Structures. Section B: East of SR 1709 to Durham County Line.	07	Durham-Chapel Hill-Carrboro MPO
42714	Statewide	Mobility	Capacity	I-3306A	I-040		I-85	US 15/501	I-85 in Orange County to NC 147 (Buck Dean Freeway) in Durham County. Add Additional Lanes. Section A: I-85 to US 15/501.	07	Durham-Chapel Hill-Carrboro MPO
43506	Statewide	Mobility	Capacity	U-2807	US015, US501		I-40	US 15/501	I-40 to US 15/501 Bypass in Durham. Major Corridor Upgrade.	05	Durham-Chapel Hill-Carrboro MPO
43514	Subregional	Mobility	Capacity	U-2831B		New Route - Briggs Avenue Extension	Riddle Road	SR 1951 (So-Hi Drive)	Riddle Road to SR 1951 (So-Hi Drive). Two Lanes on Multi-Lane Right of Way.	05	Durham-Chapel Hill-Carrboro MPO
43623	Regional	Mobility	Capacity	U-4010	NC098	Holloway Street	East of US 70	East of Junction Road	East of US 70 to East of Junction Road. Widen For Center Turn Lane.	05	Durham-Chapel Hill-Carrboro MPO
43673	Subregional	Mobility	Capacity	U-4716B	SR1980	New Route - SR 1980 (Church Street) Extension	NC 54	SR 1978 (Hopson Road)	Extend Church Street north, including sidewalks and bicycle lanes, to Hopson Road and close Church St. at-grade crossing	05	Durham-Chapel Hill-Carrboro MPO
45383	Subregional	Mobility	Capacity	U-4716D	SR1978	Hopson Street	SR 1999 (Davis Drive)	NC 54 (Miami Blvd)	Widen to multi-lanes.	05	Durham-Chapel Hill-Carrboro MPO
44257	Statewide	Health	Modernization	U-5304	US015, US501		NC 86 (Columbia Street)	SR 1742 (Ephesus Church Road)	(US 15/501) Fordham Boulevard (NC 86 (Columbia Street)/US 15/501 South to SR 1742 (Ephesus Church Road)) sidewalks, wide-outside lanes, and transit accommodations.	07	Durham-Chapel Hill-Carrboro MPO
44250	Subregional	Health	Modernization		SR1717	Jack Bennett Road	US 15/501	SR 1721 (Lystra Rd)	Jack Bennett Rd (SR 1717) (US 15/501 to Lystra Rd (SR 1721) safety improvements.	08	Durham-Chapel Hill-Carrboro MPO
44262	Subregional	Health	Modernization		SR1780	Estes Drive	NC 86	Caswell Road	Estes Drive (NC 86 to Caswell Road) widen existing roadway to include two 12-foot travel lanes, four-foot bicycle lanes and sidewalks.	07	Durham-Chapel Hill-Carrboro MPO
44273	Subregional	Health	Modernization		SR1762	Jeremiah Drive	SR 1721 (Lystra Road)	End of Road	Elevate road for flood control.	08	Durham-Chapel Hill-Carrboro MPO
44277	Subregional	Health	Modernization		SR1721	Lystra Road	US 15/501	SR 1008 (Farrington Point Road)	Safety improvements.	08	Durham-Chapel Hill-Carrboro MPO
44279	Subregional	Mobility	Interchange/Inter section		SR1780	Estes Drive	SR 1772 (Greensboro Street)		SR 1780 (Estes Drive)/SR 1772 (Greensboro Street) construct roundabout.	07	Durham-Chapel Hill-Carrboro MPO
44308	Regional	Health	Modernization		NC086	Martin Luther King, Jr. Boulevard	I-40	North Street	Construct Bicycle Lanes and Sidewalks	07	Durham-Chapel Hill-Carrboro MPO
44311	Regional	Health	Modernization		NC054		US 15/501	SR 1110 (Barbee Chapel Road)	Construct Bicycle Lanes and Sidewalks	07	Durham-Chapel Hill-Carrboro MPO
44892	Subregional	Health	Modernization		SR1843	Seawell School Road	SR 1780 (Estes)	SR 1777 (Homestead)	Seawell School Road (Homestead to Estes) bicycle lanes, sidewalks, transit accommodations, and Intersection safety improvements (design may vary along length)	07	Durham-Chapel Hill-Carrboro MPO
46022	Statewide	Mobility	Interchange/Inter section		US015, US501		SR 1742 (Ephesus Church Road)		Intersection Improvements	07	Durham-Chapel Hill-Carrboro MPO
44327	Subregional	Health	Modernization		SR1900	Old Mason Farm Road/Finley Golf Course Road	NC 54	NC 54/US 15-501 (Fordham Blvd.)	Construct bike lanes and sidewalks.	07	Durham-Chapel Hill-Carrboro MPO

Bicycle Projects on Local Priority Lists - MPO can submit up to 10 new projects

Local Rank	Project Description	Submitted by
1, 1	W. Ellerbe Creek Trail (existing trail to Stadium Drive) – Shared Use Path	Durham, Durham County
2, 2	Scott King Road (Fayetteville Rd. to Grandale Rd.) – On-road bicycle facilities	Durham, Durham County
3, 3	Rocky Creek Trail (NC 55 to Kelly Bryant Bridge) – Shared Use Path	Durham, Durham County
4, 4	Duke Beltline Trail – Shared Use Path	Durham, Durham County
5, 5	NC 751 (Erwin Rd. roundabout to Hillsborough Rd./US 70) – On-road bicycle facilities	Durham, Durham County
6, 6	Cole Mill Road (Rose of Sharon Rd. to Orange County line) – On-road bicycle facilities	Durham, Durham County
1, not provided	Campus to Campus Connector (Broad St. to Seawell School Rd.) – Construct a multi-use path between Broad St. and Village Dr. and between Village Dr. and Seawell School Rd.; install on-street bicycle facilities on Village Dr.	Carrboro, Chapel Hill
not provided	Horace Williams Greenway: Chapel Hill Watch Village to Homestead Road	Chapel Hill
not provided	Dry Creek Trail: Phase 1 Perry Creek Road to Erwin Road	Chapel Hill

Bicycle Projects that are already in the SPOT Database

3	NC 54 from James St. to Anderson Park – Construct a side path on the north side of the road to accommodate two-direction bicycle transportation.	Carrboro
2	Morgan Creek Phase II (from the end of Phase I to Carrboro Town line) - Construct a multi-use path from University Lake to the western terminus of the first phases of the greenway and a multi-use path spur to BPW Club Rd.	Carrboro
	SR 1727 (Eubanks Rd) (Rogers Rd to NC 86) bicycle lanes.	
	Horace Williams Trail (Homestead Rd and Carolina North to the Town Operations Center, adjacent to the Norfolk Southern rail line (formerly Southern Railroad Greenway)).	
	NC 86 (US 70A to I-40) wide outside lanes.	
	US 15-501 (Fordham Blvd) pedestrian and bicycle overpass/underpass across Fordham Blvd between SR 1902 (Manning Dr) and Old Mason Farm Rd.	
	Bolin Creek Phase IV (Umstead Park to Carolina North, follow Umstead Dr to Estes Dr, then along Estes Dr to Carolina North) multi-use path.	
	Bolin Creek/Little Creek Greenway (Chapel Hill Community Center to Pinehurst Dr) multi-use path.	

Pedestrian Projects on Local Priority Lists - MPO can submit up to 10 new projects

Local Rank	Project Description	Submitted by
1, 1	NC 54 (NC 55 to RTP) – Sidewalks	Durham, Durham County
2, 2	Roxboro Road (Pacific Ave. to Murray Ave.) – Sidewalks	Durham, Durham County
3, 3	Cook Road (Fayetteville Rd. near Hillside High to Martin Luther King, Jr. Parkway) – Sidewalks	Durham, Durham County
4, 4	Duke Street (Murray Ave. to Roxboro Rd.) – Sidewalks	Durham, Durham County
5, 5	Horton Road (Guess Rd. to Roxboro Rd.) – Sidewalks	Durham, Durham County
1	W. Main St. – Install improved pedestrian crossings and sidewalks from Hillsborough Rd. to Jones Ferry Rd.	Carrboro
4	Estes Dr. – Construct a sidewalk on the south side of the road from N. Greensboro St. to the Town limits.	Carrboro
5	Old NC 86 – Construct a sidewalk on the east side of the road from Homestead Rd. to Eubanks Rd.	Carrboro
1, 1	SR 1006, Orange Grove Road, at Interstate 40: Construct a pedestrian bridge over I-40. Include sidewalk from I-40 to Timbers Drive	Hillsborough, Orange County
1	US 15-501 at Mann's Chapel Rd. - Add pedestrian refuge islands, signals, crosswalks	Chatham County

Pedestrian Projects on Local Priority Lists that are already in the SPOT Database

6, 6	Holloway Street (Junction Rd. to Chandler Rd.) – Sidewalks	Durham, Durham County
2	S. Greensboro St. – Add sidewalks on the west side of the road from the northern end of Old Pittsboro Rd. to Merritt Mill Rd.	Carrboro
3	N. Greensboro St. corridor from Weaver St. to Shelton St. – pedestrian improvements	Carrboro
	SR 1118 (Fayetteville St) (SR 1158 (W Cornwallis Rd) to NC 147) sidewalks.	
	W Chapel Hill Street (Kent St to Buchanan Blvd) sidewalks.	
	SR 1800 (Cheek Rd) (SR 1670 (E Geer St) to Hardee St) sidewalks.	
	E Main St (Hood St to NC SS (Alston Ave)) sidewalks.	
	SR 1926 (Angier Ave) and S Driver St intersection sidewalks.	

Pedestrian

	US 15-501 Business (N Mangum St)-Corporation St intersection sidewalks.	
	E Main St (Gary St to S Driver St) sidewalks.	
	US 15-501 (Fordham Boulevard) (SR 1742 (Ephesus Church Rd) to Elliott Rd) sidewalks.	
	SR 1994 (Culbreth Rd) (Adam Way to SR 1919 (Smith Level)) sidewalks.	
	SR 1919 (S Greensboro St) (Old Pittsboro Rd to SR 1771 (Merritt Mill Rd)) sidewalk on the west side.	
	Cleland Dr/Burning Tree Dr (Cleland Dr and Burning Tree Dr) sidewalks.	

Bicycle and Pedestrian Projects already in the SPOT database

Local Rank	Project Description	Submitted by	Notes
	SR 1118 (Fayetteville Rd) (SR 1158 (W Cornwallis Rd) to Nelson St) bike lanes and sidewalks.		Funded with SRTS
	NC 55 (Avondale Dr) (US 501 Bus (Roxboro Rd) to SR 1670 (E Geer St)) bike lanes and sidewalks.		Funded with STPDA
	NC 98 (Holloway St) (US 70 Bus (S Miami Blvd) to US 70) sidewalk and wide outside lanes.		To be constructed as part of the East End Connector
	NC 98 (Holloway St) (SR 1838 (Junction Rd) to SR 1919 (Lynn Rd)) sidewalk and wide outside lanes.		
	SR 1008 (Mount Carmel Church Rd) (US 15-501 to Bennett Rd) sidewalks and bicycle lanes.		
	18 Chapel Hill Intersections-bicycle and pedestrian improvements.		

Transit Projects on Local Priority Lists - MPO can submit unlimited number of projects

Project Description	Year Needed	Cost	Submitted By
14 40' Hybrid Replacement Buses @\$650,000/bus	2013	\$9.1 million	Durham, Durham County
14 40' Hybrid Replacement Buses @ \$700,000/bus	2014	\$9.8 million	Durham, Durham County
15 ADA Replacement Vans @ \$45,000/van	2013	\$675,000	Durham, Durham County
6 Replacement Service Vehicles @ \$30,000/vehicle	2013	\$180,000	Durham, Durham County
4 Replacement Service Vehicles @ \$35,000/vehicle	2014	\$140,000	Durham, Durham County
Passenger Amenities (shelters, benches, trashcans, solar lights)	2013	\$500,000	Durham, Durham County
Passenger Amenities (shelters, benches, trashcans, solar lights)	2015	\$750,000	Durham, Durham County
8 40' Hybrid Expansion Buses @\$650,000/bus <ul style="list-style-type: none"> • 15 minutes headways to Duke • Direct route from downtown to Southpoint • Direct route from downtown to Riverside HS • Direct route from Duke to Southpoint 	2013	\$5.2 million	Durham, Durham County
18 40' Hybrid Expansion Buses @\$700,000/bus <ul style="list-style-type: none"> • 15 minutes headways on routes 1, 3, 4, 6, 7, and 10 • 30 minutes headways on route 15 • Cross-town routes 	2014	\$12.6 million	Durham, Durham County
4 40' Hybrid Expansion Buses @\$750,000/bus <ul style="list-style-type: none"> • 15 minutes headways on routes 12 and 16 	2015	\$3.0 million	Durham, Durham County
4 40' Hybrid Expansion Buses @ \$750,000/bus <ul style="list-style-type: none"> • New Route on MLK Pkwy, NC 55 to South Square • New route from Downtown to Butner 	2015	\$3.0 million	Durham, Durham County
Land Acquisition and Construction of 2 Park –n-ride Lots @ \$1.1 million/lot <ul style="list-style-type: none"> • North Durham/Treyburn area • US 70 east or Parkwood area 	2015	\$2.2 million	Durham, Durham County
Regional Rail Service – Durham to Chapel Hill – Light Rail Transit or Bus Rapid Transit - planning and engineering phase *Description and cost will be determined by Triangle Regional Transit Program	2013-2015	*	Durham, Durham County
Regional Rail Service – Durham to Raleigh – Commuter Rail – planning and engineering phase *Description and cost will be determined by Triangle Regional Transit Program	2013-2015	*	Durham, Durham County
Park and Ride Lot in the Buckhorn Economic Development District:			Orange County

Rail Projects on Local Priority Lists - Projects to be submitted directly to the Rail Division

Project	Submitted by
Train station/multi-modal center: Construct a train station in Hillsborough and request AMTRAK service to Orange County. The train station can also serve future commuter rail operations and anchor a multimodal transportation hub in Hillsborough. A revenue and ridership study conducted by the North Carolina Department of Transportation Rail Division and AMTRAK has indicated that there is enough potential ridership to make a stop in Hillsborough financially feasible.	Hillsborough, Orange County

NCDOT SPOT Prioritization 2.0			DCHC MPO Current Project Ranking Methodology			Subcommittee Recommendation					
						Bicycle			Pedestrian		
Criteria	Metric	% of Score	Criteria	Metric	% of Score	Criteria	Metric	% of Score	Criteria	Metric	% of Score
Right-of-Way Acquired	Amount of right-of-way acquired	18%	Right-of-Way Availability	Amount of right-of-way acquired	10%	Right-of-Way Acquired	Amount of right-of-way available	10%	Right-of-Way Acquired	Amount of right-of-way available	10%
Connectivity	Access to transit, schools, CBD, high density residential or commercial, parks, other bike/ped facilities	15%	Local Connectivity	Number of connections to existing sidewalks, greenways, and bicycle facilities	10%	Connectivity	Access to transit, schools, CBD, high density residential or commercial, parks, other bike/ped facilities	20%	Connectivity	Access to transit, schools, CBD, high density residential or commercial, parks, other bike/ped facilities	20%
			Travel Demand from Local Land Uses	Number of schools, colleges, parks, major retail centers, major employment centers, and transit routes within 0.5 miles of ped facility or 2 miles of bike facility	10%						
Inclusion in an Adopted Plan	In adopted plan	18%	not included			Do not include. All DCHC MPO jurisdictions have plans.					
Bicycle or Pedestrian Crashes	3 or more bike/ped crashes within last 5 years	2%	Safety	Number of bike/ped crashes within last 3 years	10%	Bicycle or Pedestrian Crashes	3 or more bike/ped crashes within last 5 years, variable points if greater than 3	15%	Bicycle or Pedestrian Crashes	3 or more bike/ped crashes within last 5 years, variable points if greater than 3	15%
Demand/Density	Population density within 0.5 miles of ped facility or 1.5 miles of bicycle facility	12%	Community Impacts	GIS analysis of population density, schools, and parks	10%	Demand/Density	Population density within 1.5 miles of bicycle facility	15%	Demand/Density	Population density within 0.5 miles of ped facility	15%
not included			Traffic volume	AADT on roadway	10%	Congestion	v/c on roadway	15%	Traffic volume	AADT on roadway	15%
not included			Regional Connectivity	Part of regional bicycle route or pedestrian connection to Triangle Transit regional route, future rail, or local bus route	10%	Regional Connectivity	Part of regional bicycle route or pedestrian connection to Triangle Transit regional route, future rail, or local bus route	15%	Regional Connectivity	Part of regional bicycle route or pedestrian connection to Triangle Transit regional route, future rail, or local bus route	15%
not included			Environmental Impacts	GIS analysis of impact to wetlands, streams, species habitat, and water supply watersheds	10%	Do not include. Negative environmental impact of construction of bicycle facilities, sidewalks, and greenways is minimal.					
not included			Environmental Justice	GIS analysis of benefit to minority and low-income population	10%	Environmental Justice	GIS analysis of benefit to minority and low-income population	10%	Environmental Justice	GIS analysis of benefit to minority and low-income population	10%
not included			Funding Status	percent of funding in current TIP	10%	Do not include. Unfunded/post-year projects are no longer listed in the TIP.					
MPO Rank	35%										
Total	100%		100%			100%			100%		

NCDOT SPOT Prioritization 2.0									DCHC MPO Current Project Ranking Methodology			Subcommittee Recommendation		
Criteria	Metric	Statewide Tier	Regional Tier			Subregional Tier			Criteria	Metric	% of Score	All Tiers and Types		
		All % of Score	Mobility % of Score	Infrastructure Health % of Score	Safety & Security % of Score	Mobility % of Score	Infrastructure Health % of Score	Safety & Security % of Score				Criteria	Metric	% of Score
Availability	One point for every percent increase in system-wide service hours; maximum 12 points	18%	6%	2%	6%	2%	2%	6%	not included			Availability	One point for every percent increase in system-wide service hours	15%
Connectivity	One point for connection to taxi stand, bicycle facility, sidewalk facility; demand response transit, high density housing within 1/2 mile, mixed use development; two points for connection to fixed route with 1 hour all day headway; three points for connection to fixed route with 30 minute peak headway; maximum 10 points	15%	5%	2%	5%	2%	2%	5%	Connectivity	Number of connections to fixed route transit systems	14.3%	Connectivity	One point for connection to taxi stand, bicycle facility, sidewalk facility; demand response transit, high density housing within 1/2 mile, mixed use development; two points for connection to fixed route with 1 hour all day headway; three points for connection to fixed route with 30 minute peak headway	15%
Technology	One point for every percent increase in funding spend on information technology; maximum 8 points	12%	4%	2%	4%	2%	2%	4%	not included			Technology	One point for every percent increase in funding spend on information technology	5%
Age/Modernization	One point for every percent decrease in average age of fleet; Facilities: age of old facility/expected life of new facility + one-tenth of one point for every percent increase in surface area of space; maximum 20 points	30%	10%	4%	10%	4%	4%	10%	not included			State of Good Repair	One point for every percent decrease in average age of fleet; Facilities: one-tenth of one point for every percent increase in surface area of space	50%
	not included								Service Type	Replacement/O&M, Expansion/LRT/BRT/PnR, Enhancements/Amenities/ITS	14.3%	Do not include. The high weighting of the State of Good Repair criterion should result in a high ranking of replacement vehicles.		
	not included								Ridership	Estimated number of new or benefitted riders per year	14.3%	Do not include. This criteria is difficult to consistently apply to all project types.		
	not included								Environmental Impacts	Based on project type, vehicle type, GIS analysis	14.3%	Environmental Impacts	Based on project type, vehicle type, GIS analysis	5%
	not included								Community Impacts	Based on density, schools, parks served	14.3%	Community Impacts	Based on density, schools, parks served	5%
	not included								Environmental Justice	GIS analysis of benefit to low-income and minority areas	14.3%	Environmental Justice	GIS analysis of benefit to low-income and minority areas	5%
	not included								Funding Status in TIP	percent of funding in current TIP	14.3%	Do not include.		
MPO Rank		25%	75%	90%	75%	90%	90%	75%						
Total		100%	100%	100%	100%	100%	100%	100%			100%			100%

**DURHAM-CHAPEL HILL-CARRBORO MPO
METHODOLOGY FOR RANKING
METROPOLITAN TRANSPORTATION IMPROVEMENT PROGRAM
PRIORITY PROJECT REQUESTS (FY 2014-2020)**

INTRODUCTION

The purpose of the Regional Priority List is to facilitate determination of the region's project priorities to be used in development of a fiscally constrained Transportation Improvement Program (TIP). SAFETEA-LU calls for a TIP development process that documents a methodology for ranking project requests, reflects local and metropolitan goals, and addresses mobility, environmental and air quality goals.

OBJECTIVE

The methodology outlined below is designed to address multi-modal transportation needs and to ensure regional balance through the use of specific technical criteria. The Technical Coordinating Committee (TCC) will use the methodology to develop a draft Regional Priority List. This draft Priority List is to be used as a starting point or a reference base by the Transportation Advisory Committee (TAC) for the approval of a final Regional Priority List.

The TAC may reorder projects at its discretion to promote jurisdictional and geographical balance, or based upon the TAC members' knowledge of the urban area and the policies of their communities. The TCC will make its technical recommendation on a draft Priority List based on the methodology described in this document, and the TAC will then be afforded the opportunity to make any changes it deems appropriate.

METHODOLOGY GOALS

- Produce a program of projects (or project priorities) which satisfies MPO, local and state goals, and addresses SAFETEA-LU policies of system preservation, operational efficiency in the movement of people and goods, multi/inter-modalism, and air quality mandates.
- Be simple enough for project-level analysis without requiring unnecessary data collection.
- Be understandable by the general public.

PROCEDURE FOR RANKING PROJECTS

1) Goal Setting For Regional Priority List

Since the Regional Priority List should be a subset of the DCHC MPO Long Range Transportation Plan (LRTP), the goals for the regional priority list are the same as the DCHC MPO goals and objectives in the 2035 LRTP.

2) Submission of Local Priority Lists

All MPO member jurisdictions and Triangle Transit will submit a local priority list to the MPO. The

DCHC MPO requests that the local jurisdictions apply screening criteria during the development of these lists. The screening criteria are:

- a) Regional Goals - How well does the project meet the adopted regional goals? Is the project an element of the current long-range plan? Does it implement community objectives (for the intrastate system, does it meet NCDOT mobility objectives)? Does the project have a broad base of local support?
- b) Cost Effectiveness - How much benefit does the project offer compared to the estimated cost?
- c) Timing Factor – Is the project needed within the TIP funding cycle? Is timing a critical element for the project (one-time opportunity)? Will the opportunity to do the project be lost if it is not in the current priority cycle?

Local jurisdictions may also elect to use the ranking methodology to create their local priority lists but are not required to do so. The TCC will review local priority lists for adherence to these screening criteria before applying the ranking methodology.

Local jurisdictions shall provide the DCHC MPO a list of projects. The list should be grouped by mode (highway, transit, bicycle, and pedestrian). The local jurisdictions shall provide a short description of the project, including the project limits, name, mileage, and cost. The description should note any essential elements of the project such as bike lanes, sidewalks, transit accommodations, vehicle types, etc.

3) Submission of Projects for the Regional Priority List

For the 2014-2020 TIP, the DCHC MPO will submit projects to NCDOT's Strategic Planning Office of Transportation by July 2011 for the application of the NCDOT's quantitative ranking methodology. The MPO is limited to fifteen new highway projects, ten new bicycle projects, ten new pedestrian projects, and an unlimited number of transit projects. Highway, bicycle, and pedestrian projects that were submitted for the 2012-2018 TIP do not need to be resubmitted.

DCHC MPO will combine the local priority lists into a list that the MPO will submit to NCDOT. In the event that more projects are submitted to the MPO than the MPO is allowed submit to NCDOT, the TCC will select projects based on the screening criteria, the air quality horizon year in the LRTP, regional significance, geographic distribution, and local priority.

4) Application of the Ranking Methodology

The NCDOT will apply a quantitative ranking methodology to the MPO's projects and provide the MPO project scores and data. DCHC MPO staff in coordination with local staff will use the project data and collect additional data to apply the MPO ranking methodology. The list of projects will then be presented to the TCC as the draft regional priority list.

The TCC first examines the consistency in which local jurisdictions and MPO staff have responded to the screening criteria and applied the methodology. If the methodology is not applied consistently, the TCC can agree to change some responses for consistency among all projects. The draft Regional Priority List is then forwarded to the TAC, as the TCC's recommended project priorities for the urban area. The TCC will also recommend a distribution of highway ranking points among projects.

5) Approval of Project Rankings and Points

The TAC will release the draft list for public comment and hold a public hearing at a TAC meeting. The TAC may reorder projects at its discretion to promote jurisdictional and geographical balance, or based upon the TAC members' knowledge of the urban area and the policies of their communities. After review and public comment, the TAC will approve the final Regional Priority List including the distribution of highway ranking points.

APPLICATION OF THE METHODOLOGY

1. There are four separate ranking methodologies based on the primary mode of transportation: 1) highway; 2) bicycle; 3) pedestrian; and 4) transit. The four ranking methodologies are independent of each other. Points for different modes are on different scales and are not comparable.
2. Points are weighted and totaled for each project using the four modal ranking methodologies outlined on the last pages of this document.

MODAL RANKING METHODOLOGIES IN DETAIL

Highway

There are nine criteria. All criteria are not applied to all project types and tiers, and the criteria are weighted differently based on the project type and tier.

1. *Congestion* - This category awards points to projects based on the level of congestion and travel demand. For road projects, congestion is measured by the volume to capacity (V/C) ratio and the annual average daily traffic (AADT). For new road facilities in which traffic counts are not available, volumes on a parallel existing facility may be used.

Data will be collected and provided by NCDOT's SPOT.

2. *Safety* - Safety points are awarded to projects based on the critical crash rate, crash density, and severity.

Data will be collected and provided by NCDOT's SPOT.

3. *Economic Competitiveness* – Points are awarded based on the output from the TREDIS model.

Data will be collected and provided by NCDOT's SPOT.

4. *Lane Width* – Points are awarded based on the existing width of the lane versus the standard width

Data will be collected and provided by NCDOT's SPOT.

5. *Shoulder Width* – Points are awarded based on the existing width of the shoulder versus the standard width.

Data will be collected and provided by NCDOT's SPOT.

6. *Multi-modal Benefits*– Points are awarded to projects based on if they include multi-modal options (BRT, LRT, BOSS, HOV/HOT), connections (airport, rail depot, transit terminal), or design features (sidewalks, pedestrian crossings, bicycle lanes, wide outside shoulders, bus pullouts, transit prioritization, bus shelters).

Local jurisdictions are asked to describe the benefits. Data will be collected and provided by NCDOT's SPOT.

7. *Environmental Impacts* - Points are awarded based on the impact on wetlands, streams, water supply watersheds, wildlife habitat, parks, and air quality.

The MPO will provide local jurisdictions a base map of environmental areas. Local jurisdictions are asked to use the environmental impacts worksheet to assess the impact of projects based on a GIS analysis.

8. *Community Impacts* – Points are awarded based on the impact on neighborhoods, communities, schools, parks, recreation facilities, historic resources, and cemeteries.

The MPO will provide local jurisdictions a base map of community resources and 2010 population density. Local jurisdictions are asked to use the community impacts worksheet to assess the impact of projects based on a GIS analysis.

9. *Environmental Justice*- Points are awarded based on the impact on low-income and minority populations. This item is designed to penalize projects that may have negative impacts on low income areas or federally recognized disadvantaged groups.

The MPO will provide local jurisdictions a base map that indicates which Traffic Analysis Zones have a high percentage of minority and low income populations. Local jurisdictions are asked to use the environmental justice worksheet to assess the impact of projects based on a GIS analysis.

Bicycle and Pedestrian

There are seven criteria that are weighted differently. All project types and tiers are subject to the same criteria.

1. *Right-of-Way Availability* – This category awards points to projects based on the right-of-way available for the project. Right-of-way should be estimated based on the local jurisdiction's best knowledge of the area and the NCDOT right-of-way database. Extensive research into property deeds is not required.

Data will be collected and provided by NCDOT's SPOT.

2. *Connectivity* – This category awards points to projects based on the proximity to transit, schools, central business districts, high density residential or commercial areas, parks, and other bicycle and pedestrian facilities.

Data will be collected and provided by NCDOT's SPOT.

3. *Bicycle or Pedestrian Crashes* - Points are awarded based on if there have been three or more bicycle or pedestrian crashes within the last five years.

Data will be collected and provided by NCDOT's SPOT.

4. *Demand/Density* – Points are awarded based on the population density within 1.5 miles of a bicycle facility or 0.5 miles of a pedestrian facility.

Data will be collected and provided by NCDOT's SPOT.

5. *Congestion/Traffic Volume* - This category awards points to projects based on the amount of vehicular congestion as measured by volume/capacity ratios for bicycle projects, and traffic volumes for pedestrian projects. Off-road greenways are based on the parallel or alternate roadways. More points are provided for more congested or higher volume facilities to reflect the safety hazard for bicyclists and pedestrians on larger busier roadways. The volume/capacity ratio will be provided by the MPO model. The traffic counts should be taken from the latest Annual Average Daily Traffic (AADT) maps on the NCDOT website.

Congestion data will be provided by the MPO. Traffic volume data will be collected and provided by NCDOT's SPOT.

6. *Regional Connectivity* – Points are awarded to bicycle based on if the project is a part of the regional routes recognized in the 2035 LRTP. Projects part of a regional bicycle route that partially exists receive three points. Projects part of a regional bicycle route that does not currently exist receive two points. Projects not part of a regional bicycle route that connect to a regional bicycle route receive one points. Projects that are not part of a regional bicycle route and do not connect to a regional bicycle route receive zero points.

Points are awarded to pedestrian only projects based on if the project provides a pedestrian connection to regional and local buses. Project limits that include a bus stop for an existing Triangle Transit regional route receive three points. Project limits that include a station area for a future regional rail receive two points. Project limits that include a bus stop for a local bus route receive one point. Project limits that do not include a bus stop for a transit route receive zero points.

7. *Environmental Justice* - Points are awarded based on the impact on low-income and minority populations. Since bicycle and pedestrian facilities are perceived as amenities and usually require little right-of-way acquisition, projects that serve low income and minority areas will receive more points.

The MPO will provide local jurisdictions a base map that indicates which Traffic Analysis Zones have a high percentage of minority and low income populations. Local jurisdictions are asked to use the environmental justice worksheet to assess the impact of projects based on a GIS analysis.

Transit

There are seven criteria for transit projects that are weighted differently. All project types and tiers are subject to the same criteria.

1. *State of Good Repair* – This category is designed to award points to projects that are essential to maintaining the current transit service. Projects will receive more points for every percentage

decrease in average age of fleet. Facilities receive more points for every percentage increase in surface area of space.

Data will be collected and provided by NCDOT's SPOT.

2. *Availability* – This category awards points based on the percentage increase in system-wide service hours.

Data will be collected and provided by NCDOT's SPOT.

3. *Connectivity* – Projects receive points based on connections to taxi stands, bicycle facilities, sidewalk facilities, demand response transit, high density housing within 0.5 miles, mixed use development, and fixed route services.

Data will be collected and provided by NCDOT's SPOT.

4. *Technology* – Projects receive points based on the percentage increase in funding on information technology.

Data will be collected and provided by NCDOT's SPOT.

5. *Environmental Impacts* - Points are awarded based on the impact on the natural environment. Since most transit projects use existing roadway facilities and thus do not require construction, projects are assessed based on their relative positive air quality impacts. Transit projects that require construction such as fixed guideway, BRT, and park and ride lots should have points deducted if significant environmental impacts may occur due to construction, including impacts on wetlands, streams, water supply watersheds, and rare species habitats.

The MPO will provide local jurisdictions a base map of environmental areas. Local jurisdictions are asked to use the environmental impacts worksheet to assess the impact of projects based on project type and a GIS analysis for construction projects.

6. *Community Impacts* – Points are awarded based on the impact on neighborhoods, communities, schools, parks, and recreation facilities. Since transit projects are community amenities and usually require little right-of-way acquisition, projects that serve more dense neighborhoods and community facilities receive more points.

The MPO will provide local jurisdictions a base map of community resources and 2010 population density. Local jurisdictions are asked to use the community impacts worksheet to assess the impact of projects based on a GIS analysis.

7. *Environmental Justice* - Points are awarded based on the impact on low-income and minority populations. Since transit projects are community amenities and usually require little right-of-way acquisition, projects that serve low income and minority areas will receive more points.

The MPO will provide local jurisdictions a base map that indicates which Traffic Analysis Zones have a high percentage of minority and low income populations. Local jurisdictions are asked to use the environmental justice worksheet to assess the impact of projects based on a GIS analysis.

OBSERVATIONS

The order of transit priorities could vary significantly from year to year if anticipated funding sources are reduced or eliminated by Congress.

- Mandates (e.g., the American's with Disabilities Act) may take precedence when programming projects from the Regional Priority List in the TIP.
- The fiscal constraints of programming projects in the TIP may result in the programming of less expensive, lower ranked projects.
- Some lower ranking projects may be implemented earlier than a higher ranked, large project due to the time constraints associated with a more complex project (i.e., major investment studies, preparing environmental documents, designing the project, right-of way acquisition, etc.).
- The utility of ranking more than 25 projects is minimal due to the availability of project funds.

Criteria	Metric	Mobility			Modernization		
		% of Score - Statewide Tier	% of Score - Regional Tier	% of Score - Subregional Tier	% of Score - Statewide Tier	% of Score - Regional Tier	% of Score - Subregional Tier
Congestion	current volume/capacity + AADT	30%	30%	30%	5%	5%	no SPOT data
Safety	critical crash rates, crash density, severity	20%	20%	25%	15%	15%	20%
Economic Competitiveness	use TREDIS model, input change in VHT, output economic value added based on % change in Division	20%	20%	no SPOT data	no SPOT data	no SPOT data	no SPOT data
Lane Width	existing width vs. standard width	no SPOT data	no SPOT data	no SPOT data	25%	25%	25%
Shoulder Width	existing width vs. standard width	no SPOT data	no SPOT data	no SPOT data	25%	25%	25%
Multi-modal	options, connection, or design features	Bonus Points: 8 for HOV/HOT, BRT, Rail, BOSS; 5 for connection to terminal; 3 for sidewalks, bike lanes, transit facilities, etc.					
Environmental Impacts	Air quality impacts and GIS analysis of wetlands, streams, species habitat, parks, and water supply watershed	10%	10%	15%	10%	10%	10%
Community Impacts	GIS analysis of population density, schools, parks, historic resources, and cemeteries	10%	10%	15%	10%	10%	10%
Environmental Justice	GIS analysis of low-income and minority areas	10%	10%	15%	10%	10%	10%

100% 100% 100% 100% 100% 100%

Criteria	Metric	% of Score
Right-of-Way Acquired	Amount of right-of-way available	10%
Connectivity	Access to transit, schools, CBD, high density residential or commercial, parks, other bike/ped facilities	20%
Bicycle or Pedestrian Crashes	3 or more bike/ped crashes within last 5 years, variable points if greater than 3	15%
Demand/Density	Population density within 1.5 miles of bicycle facility	15%
Congestion	v/c on roadway	15%
Regional Connectivity	Part of regional bicycle route or pedestrian connection to Triangle Transit regional route, future rail, or local bus route	15%
Environmental Justice	GIS analysis of benefit to minority and low-income population	10%

100%

Criteria	Metric	% of Score
Right-of-Way Acquired	Amount of right-of-way available	10%
Connectivity	Access to transit, schools, CBD, high density residential or commercial, parks, other bike/ped facilities	20%
Bicycle or Pedestrian Crashes	3 or more bike/ped crashes within last 5 years, variable points if greater than 3	15%
Demand/Density	Population density within 0.5 miles of ped facility	15%
Traffic volume	AADT on roadway	15%
Regional Connectivity	Part of regional bicycle route or pedestrian connection to Triangle Transit regional route, future rail, or local bus route	15%
Environmental Justice	GIS analysis of benefit to minority and low-income population	10%

100%

All Tiers and Types		
Criteria	Metric	% of Score
Availability	One point for every percent increase in system-wide service hours	15%
Connectivity	One point for connection to taxi stand, bicycle facility, sidewalk facility; demand response transit, high density housing within 1/2 mile, mixed use development; two points for connection to fixed route with 1 hour all day headway; three points for connection to fixed route with 30 minute peak headway	15%
Technology	One point for every percent increase in funding spend on information technology	5%
State of Good Repair	One point for every percent decrease in average age of fleet; Facilities: one-tenth of one point for every percent increase in surface area of space	50%
Environmental Impacts	Based on project type, vehicle type, GIS analysis	5%
Community Impacts	Based on density, schools, parks served	5%
Environmental Justice	GIS analysis of benefit to low-income and minority areas	5%

100%

Ramp Metering Study

Background

The population of North Carolina and especially the Triangle region is growing. As the population grows so, too, does the demand on the transportation system. This demand is seen throughout the state every day during the peak periods as commute times to and from work continue to increase. Historically, as highways near capacity, the most frequent response by NCDOT and other public agencies has been to add additional lane miles. Today, as development increases, it is becoming increasingly difficult to add additional lanes without expensive right-of-way acquisitions and construction cost and excess natural and environmental impacts. In order for the MPO, State and local governments to respond to growing demands for maintaining and improving our mobility needs, these agencies must cost-effectively manage existing facilities. Ramp management and other ITS strategies have evolved over the last decade and can be implemented at relatively low cost to balance freeway demand and capacity, to reduce incidents that produce traffic delays, to improve safety on the adjacent freeway or surface street, or to give special treatment to a specific class of vehicles.

Objective

This project will prepare a feasibility study for ramp metering deployment along segments of interstate and other selected freeway facilities in Durham and Wake Counties. This study will support and will complement the goals and strategies outlined in both the DCHC – Congestion Management Process Procedures and Responsibilities and the CAMPO – Congestion Management Process and will use the Triangle Regional ITS Deployment plan as a guideline.

The intent of the study is to provide recommendations for any revised and/or new legislation needed to implement and manage ramp metering; to develop a framework for a marketing/outreach plan to stakeholders; to develop typical installation criteria including detection on the mainline, ramps, and adjacent streets; to develop criteria to rank potential ramp metering projects/segments by county (including costs, mobility improvement, and diversion impact); and to develop performance measures to show the effectiveness of ramp metering.

Desired End-Product

This study will provide an overall implementation plan for ramp metering and will include strategies for immediate, interim and long-term recommendations that include performance criteria. The study will provide specific information on the benefits of each project/segment. Specific benefits include but will not be limited to reducing crash rates at and upstream of merge areas; improving mobility by increasing freeway speeds and volumes; and improving air quality by reducing emissions. Also, the study will provide specific suggestions to mitigate the potential impacts of traffic diversion; queue spillback; equity among urban and suburban motorists; increased emissions on ramps; and other public opposition based on misconceptions about delay or inconveniences. The goal is to use this plan to select and to support for funding one or more ramp metering projects in the area.

Funding

The estimated cost of the feasibility study is \$400,000. NCDOT plans to fund \$350,000 and requests that CAMPO and DCHC-MPO split the other \$50,000. The recommended split is 70% CAMPO and 30% DCHC.

MEMORANDUM

TO: Technical Coordinating Committee
DCHC MPO

FROM: Maricia Brown, DCHC MPO Lead Planning Agency

DATE: June 20, 2011

SUBJECT: FFY 2011 (FY 2012) Section 5307/5340 Apportionment for Durham NC UZA

The Urbanized Area Formula Funding program (49 U.S.C. 5307) makes Federal resources available to urbanized areas and to Governors for transit capital and operating assistance in urbanized areas and for transportation related planning. An urbanized area is an incorporated area with a population of 50,000 or more that is designated as such by the U.S. Department of Commerce, Bureau of the Census.

Funding is made available to designated recipients that must be public bodies with the legal authority to receive and dispense Federal funds. Governors, responsible local officials and publicly owned operators of transit services are to designate a recipient to apply for, receive, and dispense funds for transportation management areas pursuant to 49USCA5307(a)(2). Generally, a transportation management area is an urbanized area with a population of 200,000 or over. The Governor or Governor's designee is the designated recipient for urbanized areas between 50,000 and 200,000.

For urbanized areas with 200,000 in population and over, funds are apportioned and flow directly to a designated recipient selected locally to apply for and receive Federal funds. Eligible activities include planning, engineering design and evaluation of transit projects and other technical transportation-related studies; capital investments in bus and bus-related activities such as replacement of buses, overhaul of buses, rebuilding of buses, crime prevention and security equipment and construction of maintenance and passenger facilities; and capital investments in new and existing fixed guideway systems including rolling stock, overhaul and rebuilding of vehicles, track, signals, communications, and computer hardware and software. All preventive maintenance and some Americans with Disabilities Act complementary paratransit service costs are considered capital costs.

The DCHC- MPO has received its FFY2011 Apportionment and have submitted a recommended split by agency. Funding is apportioned on the basis of legislative formulas. For areas with populations of 200,000 and more, the formula is based on a combination of bus revenue vehicle miles, bus passenger miles, fixed guideway revenue vehicle miles, and fixed guideway route miles as well as population and population density.

Attachment B and C are letters of recommended split by the MPO. Pursuant to DCHC MPO's Policy #2, both DATA and TTA are out of compliance, with the required Section 5307 quarterly oversight reporting. If this report becomes compliant before the June 22, 2011 TAC meeting we can move forward with the attached letter A. If not, the letter B is the alternative recommendation by the MPO. Upon resolution of this compliance issue, the MPO will bring forwarded a second letter of recommendation for TAC approval in August 2011.

Member Organizations

Town of Carrboro ▪ Town of Chapel Hill ▪ County of Chatham ▪ City of Durham ▪ Durham County ▪ Town of Hillsborough
NC Department of Transportation ▪ Orange County

June 15, 2011

Regional Administrator
Federal Transit Administration
Atlanta Federal Center
230 Peachtree Street, NW, Suite 800
Atlanta, GA 30303-8917

Attn: Marie Lopez, Transportation Program Specialist

Subject: FFY 2011 (FY2012) Section 5307/5340 Apportionment for Durham NC
UZA

Dear Regional Administrator:

We have been advised that the FFY 2011 apportionment for the Durham-Chapel Hill-Carrboro Urbanized Area includes both 5307 and 5340 funds and is \$6,694,989. Distribution of the FFY 2011 5307/5340 Durham UZA apportionment in the table below includes an allocation to all three transit operators within the DCHC MPO. The Transit Enhancement and Safety and Security apportionments are also calculated in the table below.

Transit System	FFY 2011 Full Apportionment	Transit Enhancement 1%	Safety and Security 1%	Net Available for Transit Expenditures
Chapel Hill Transit	\$1,965,794	\$19,658	\$19,658	\$1,926,478
Durham (DATA)	\$3,629,558	\$36,296	\$36,296	\$3,556,967
Triangle Transit	\$1,099,637	\$10,996	\$10,996	\$1,077,644
Totals	\$6,694,989	\$66,950	\$66,950	\$6,561,089

The Durham-Chapel Hill-Carrboro (DCHC) Metropolitan Planning Organization (MPO), as the Designated Recipient for the Durham UZA, request that the Federal Transit Administration approve each operator's FFY 2011 FTA Section 5307/5340 grant application in accordance with the amounts apportioned.

Please copy the North Carolina Department of Transportation, Public Transportation Division with your confirmation letter stating that the approved distribution has been completed. Should you have any questions regarding this request, please contact Felix Nwoko (Felix.Nwoko@Durhamnc.gov) or Maricia Brown, (Maricia.brown@Durhamnc.gov).

Sincerely,

Lydia Lavelle, Chair
Transportation Advisory Committee

cc: Marie Lopez, Transportation Program Specialist - FTA
Tom Bonfield, Durham City Manager
Roger Stancil, Chapel Hill Town Manager
David D. King, TTA General Manager
Felix Nwoko, MPO Lead Planning Agency
Harmon Crutchfield, DATA Transit Administrator
Stephen Spade, Chapel Hill Transit Administrator
Bill Barlow, NCDOT PTD
Miriam Perry, NCDOT PTD

DRAFT

Member Organizations

Town of Carrboro ▪ Town of Chapel Hill ▪ County of Chatham ▪ City of Durham ▪ Durham County ▪ Town of Hillsborough
NC Department of Transportation ▪ Orange County

June 15, 2011

Regional Administrator
Federal Transit Administration
Atlanta Federal Center
230 Peachtree Street, NW, Suite 800
Atlanta, GA 30303-8917

Attn: Marie Lopez, Transportation Program Specialist

Subject: FFY 2011 (FY2012) Section 5307/5340 Apportionment for Durham NC
UZA

Dear Regional Administrator:

We have been advised that the FFY 2011 apportionment for the Durham-Chapel Hill-Carrboro Urbanized Area includes both 5307 and 5340 funds and is \$6,694,989. Distribution of the FFY 2011 5307/5340 Durham UZA apportionment in the table below includes an allocation to all three transit operators within the DCHC MPO. The Transit Enhancement and Safety and Security apportionments are also calculated in the table below.

Transit System	FFY 2011 Full Apportionment	Transit Enhancement 1%	Safety and Security 1%	Net Available for Transit Expenditures
Chapel Hill Transit	\$1,965,794	\$19,658	\$19,658	\$1,926,478

The Durham-Chapel Hill-Carrboro (DCHC) Metropolitan Planning Organization (MPO), as the Designated Recipient for the Durham UZA, request that the Federal Transit Administration approve each operator's FFY 2011 FTA Section 5307/5340 grant application in accordance with the amounts apportioned.

Please copy the North Carolina Department of Transportation, Public Transportation Division with your confirmation letter stating that the approved distribution has been completed. Should you have any questions regarding this request, please contact Felix

Page 2 of 2
June 15, 2011

Nwoko (Felix.Nwoko@Durhamnc.gov) or Maricia Brown,
(Maricia.brown@Durhamnc.gov).

Sincerely,

Lydia Lavelle, Chair
Transportation Advisory Committee

cc: Marie Lopez, Transportation Program Specialist - FTA
Tom Bonfield, Durham City Manager
Roger Stancil, Chapel Hill Town Manager
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Felix Nwoko, MPO Lead Planning Agency
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Stephen Spade, Chapel Hill Transit Administrator
Bill Barlow, NCDOT PTD
Miriam Perry, NCDOT PTD

DRAFT

MEMORANDUM

TO: Transportation Advisory Committee
DCHC MPO

FROM: DCHC MPO Lead Planning Agency

DATE: May 14, 2008

SUBJECT: STP-DA Call for Projects – Background

Overview and Background Information

The Federal Highway Administration (FHWA) provides Surface Transportation Program-Direct Attributable (STP-DA) funds to urbanized areas over 200,000 in population. These funds are provided to the DCHC MPO based on the population of the urbanized area. The DCHC MPO currently receives about \$4 million each year. The MPO receives these funds directly and has the authority to allocate these funds to projects as needed. The MPO's allocation of STP-DA funds is programmed in the TIP. The DCHC MPO has traditionally used STP-DA funds on non-highway capacity projects. STP-DA funds require a 20% local match.

In 2007, the TAC requested that the LPA and TCC work to develop a STP-DA funding proposal for the 2008-2015 TIP. In summer/fall 2007, the DCHC MPO requested potential STP-DA projects for FY 2009 through 2015 from its member governments. The MPO received many project requests from several different categories including:

- LPA staff
- LPA planning activities – both routine planning and special emphasis projects
- Local government planning activities
- Local bicycle and pedestrian construction projects
- Regional bicycle and pedestrian construction projects
- Expansion and replacement transit vehicles
- Transit service improvements and passenger amenities

The following table summarizes the new project requests received by the MPO from its member jurisdictions and agencies:

Agency	Total Federal Requests (80%) 2009-2015
TJCOG	1,419,109
TTA	3,407,200
Durham	25,937,828
Chapel Hill	15,485,917
Carrboro	959,984

Hillsborough	512,000
LPA	5,334,950
Total	53,056,988
Funds Available	28,581,000
Difference	(24,475,988)

Assuming that the DCHC MPO continues to receive approximately \$4 million per year in STP-DA funds, the MPO only has about \$28 million to allocate leaving a shortfall of \$24 million. Furthermore, a portion of the \$28 million has already been allocated by the TAC to specific projects. As a result, all of the project requests will not be able to be filled.

For the past several months, the TCC and LPA staff have worked to develop a recommendation for STP-DA funding. At the March TAC meeting, the TAC provided feedback on STP-DA funding priorities. At the April TAC meeting, the TAC approved STP-DA funding for LPA staff and planning activities. The TCC has developed recommendations for the remaining categories displayed in the highlighted entries in the tables in Attachment 6B. All STP-DA funding will be included in the final FY 2009-2015 MTIP and incorporated into the STIP through amendments as needed.

STP-DA Funding Policy

The TAC adopted a STP-DA policy in 2003 that states:

“Funding will give priority to projects in the adopted DCHC Long Range Transportation Plan in the following categories and not for roadway projects:

- Public Transit
- Bicycle and Pedestrian Facilities
- Transportation System Management/ Transportation Demand Management/ Intelligent Transportation Systems
- Scenic and Environmental Enhancements
- Planning Studies that support the implementation or development of the adopted DCHC Long Range Transportation Plan
- Air Quality Programs

When projects are being considered, equity and funding in jurisdictions over time will be considered.”

STP-DA Funding Requests

In order to develop a proposal for STP-DA funding, the TCC and LPA grouped the submitted projects into seven project types:

1. Small projects, includes:
 - a. LPA and local government planning activities under \$200,000 (federal)
 - b. Bicycle, pedestrian and transit projects under \$200,000 (federal)
 - c. Cost over-runs and additions to existing projects

- d. These are projects that require less advance planning and can be completed quickly.
 - e. Note, many small projects needed between 2009 and 2015 are not currently identified. New projects will likely be added to this category as new needs are identified.
2. LPA staff requests and LPA and local government routine planning activities, includes:
 - a. New and existing LPA staff positions
 - b. Activities that are required to be completed such as air quality planning, congestion mitigation plan, modeling, etc.
 3. LPA and local government extra planning activities, includes:
 - a. LPA and local government planning activities over \$200,000 (federal)
 - b. Optional activities such as special emphasis projects
 - c. The TAC has already approved \$676,000 for special emphasis projects in FY 2009. All of these projects were approved as part of past years' UPWPs and are either on-going projects or are projects that have been postponed. They have all been de-obligated in the FY 2007-2008 UPWP by Amendment #2 approved on February 13, 2008.
 4. Transit projects over \$200,000 (federal)
 5. Regional bicycle and pedestrian projects
 - a. At the November TAC meeting, the TAC requested that staff develop a prioritized set of regional bicycle routes and identify funding for these projects. This has not yet been completed. For illustrative purposes, LPA staff identified some of the submitted STP-DA projects as regional routes. However, LPA staff intends to formally identify routes including soliciting input from the public and local transportation boards. A recommendation will be brought to a future TCC and TAC meeting.
 - b. The TAC has already approved \$3,923,000 of STP-DA funds for two projects in FY 2009-2015:
 - i. Old Durham Chapel Hill Road Bicycle and Pedestrian \$2,742,000
 - ii. American Tobacco Trail Phase E \$1,181,000
 6. Other local projects over \$200,000 (federal), includes:
 - a. Large bicycle and pedestrian projects
 - b. Scenic and environmental enhancements
 - c. The TAC has already approved \$2,392,000 of STP-DA funds for two projects in FY 2009-2015:
 - i. Cornwallis Road Bicycle and Pedestrian \$1,816,000
 - ii. Upper Booker Creek Greenway \$576,000
 7. Travel demand management

If the submitted projects are assigned to these project categories, the distribution of requests is as shown in this table:

Project Type	Total	Number of Projects	Average Cost
Small Projects	\$1,518,409	23	\$66,018
Staff and Planning	\$4,679,720	3	\$1,559,907
Extra Planning	\$1,093,403	4	\$273,351
Transit	\$18,476,000	11	\$1,679,636
Regional Bike & Ped	\$8,764,662	5	\$1,752,932
Other Local	\$17,299,088	23	\$752,134
Regional TDM	\$1,225,706	1	\$1,225,706
Total	\$53,056,988	70	\$757,957

The TCC recommends dedicating some STP-DA funds for each of these project types with the exception of TDM. Funding for the MPO's share of TDM for FY 2009 through 2012 will be provided using CMAQ funding. TDM offers very high air quality benefits and competes very favorably for this funding. As a result, the TCC recommends funding TDM for FY 2013 through 2015 with future CMAQ funds.

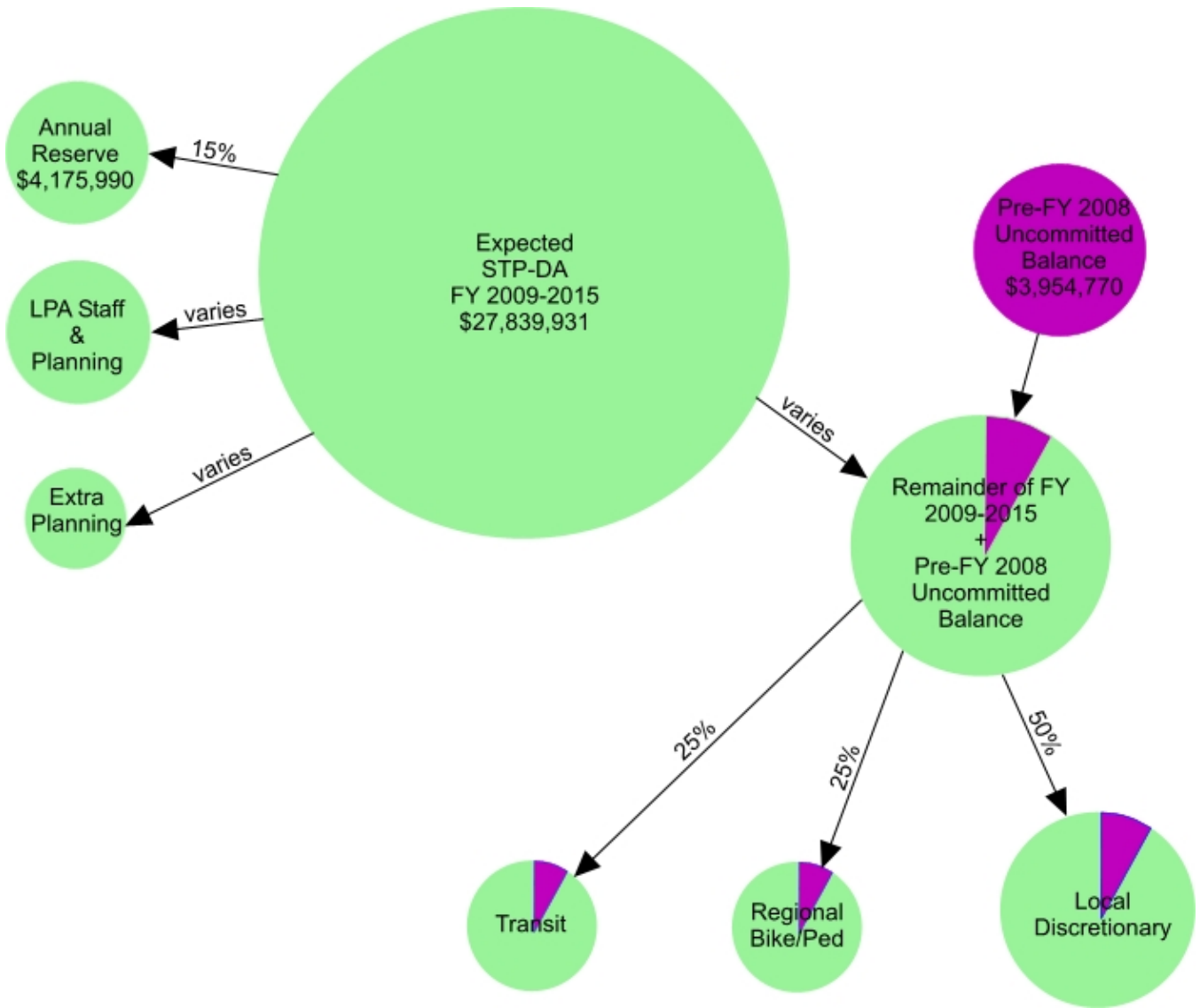
STP-DA Funding Proposal

The TCC and LPA followed three steps to complete the STP-DA funding proposal. The TAC provided guidance on steps 1 and 2 in March. Funding for planning and staff activities was approved by the TAC in April. The TCC has recommended a funding proposal that completes step 3 in the highlighted entries in the tables in Attachment 6B. Attachment 6B includes a series of linked spreadsheets for each funding category. There is a summary table and a table for pre-FY 2008 at the beginning. Attachment 6A is a memo that provides more detail on the TCC recommendation.

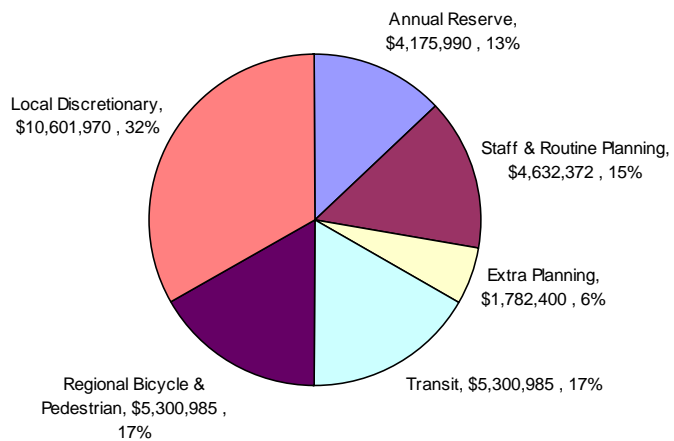
Step 1 – Distribution of STP-DA funding across the six categories:

The TAC approved the local discretionary emphasis. This scenario emphasizes local projects. Local projects can include any project type (transit, bike/ped, enhancements, planning) so this scenario offers municipalities flexibility in funding projects that reflect their own priorities. In general, local bicycle and pedestrian projects would be funded from this category.

The diagram below displays the distribution method approved by the TAC in March. The TAC approved providing an annual reserve for small projects equal to 15% of the STP-DA expected each year FY 2009-2015. The exact percentages for remaining categories were preliminary, dependent upon TCC recommendations for the staff and routine planning and extra planning categories. By approving the local discretionary emphasis, the TAC approved providing twice as much funding for the local discretionary category as for the transit and regional bicycle and pedestrian categories.



Applying the TAC approved method to the TCC's recommendation for LPA staff and planning and extra planning, results in this distribution of funding (also shown on the pie chart on the page 1 of Attachment 7A). The percentages in this chart are very similar to what was presented to the TAC in March.



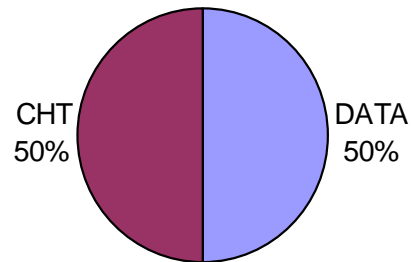
Step 2 – Distribution of STP-DA funding within the six categories

Annual Reserve (Small Projects) – This category is intended to be used for short-term immediate needs and small projects. No guidelines have been proposed for distribution by jurisdiction so that the MPO has flexibility in responding to immediate needs that may vary significantly from year to year.

Staff and Routine Planning – This category is for LPA staff and routine planning activities either performed by the LPA or by other agencies (TJ COG or the Model Service Bureau) on behalf of the LPA. There is no need for guidelines for the distribution of funding within this category because all funding is for MPO-wide activities – no funding is allocated to individual jurisdictions.

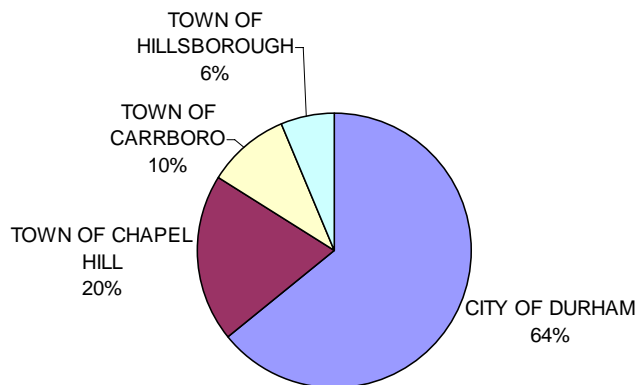
Extra Planning – This category is for special emphasis projects either performed by the LPA or member jurisdictions. This category is for larger, more expensive planning projects that will enhance transportation planning in the MPO but are not required. No guidelines have been proposed for distribution by jurisdiction. All of the projects that have been approved are for MPO-wide activities.

Transit - The TAC approved an even distribution of STP-DA funds within the transit category between Chapel Hill Transit and DATA



Regional Bicycle and Pedestrian – There is no distribution formula for funding within this category. Most projects in this category will span across multiple jurisdictions or otherwise provide regional benefits through increased connectivity.

Local Discretionary – For the local discretionary category, the TAC approved a guaranteed \$500,000 minimum for each municipality and then distribution of the remainder proportionate to municipal population.



Step 3 – Allocate STP-DA funds to specific projects within each category

All funding of specific projects within each category must be presented to the TAC for approval. There is no sub-allocation of funding directly to member governments.

Annual Reserve (Small Projects) – The TAC approved three LPA planning projects at the April TAC meeting. This was also incorporated into the final FY 2008-2009 UPWP. The TCC developed a recommendation for the remainder of the Annual Reserve as described in Attachment 6A and shown in the top table in Attachment 6B.

Staff and Routine Planning – The TAC approved LPA staff and planning projects at the April TAC meeting. This was also incorporated into the final FY 2008-2009 UPWP.

Extra Planning – The TAC approved extra planning projects at the April TAC meeting. This was also incorporated into the final FY 2008-2009 UPWP.

Transit - The TCC developed a recommendation for the transit category as described in Attachment 6A and shown in the table on page 6 on Attachment 6B.

Regional Bicycle and Pedestrian – Two projects have already been approved that fall into this category. The TCC will develop a recommendation for the remainder based on regional priority corridors. LPA staff intends to formally identify regional connections including soliciting input from the public and local transportation boards. This will be done as part of the 2035 LRTP. A recommendation for this category will be brought to the TAC later this year. The Town of Chapel Hill has proposed a new project for this category – the Morgan Creek Greenway. The TCC recommends considering this project during the process to develop regional priority corridors.

Local Discretionary – The TCC developed a recommendation for the local discretionary category as described in Attachment 6A and shown in Attachment 6B.

MEMORANDUM

To: Transportation Advisory Committee (TAC)
DCHC MPO

From: DCHC MPO Lead Planning Agency

Date: June 22, 2011

Subject: **Lead Planning Agency (LPA) Staff Report**

This memorandum provides a summary status of tasks for projects in the FY 2010-2011 Unified Planning Work Program.

- Indicates that task is ongoing and not complete.
- ✓ Indicates that task is complete.

FY 2011/FY 2012 Unified Planning Work Program (UPWP) – Projects

Town of Carrboro Transportation Study/Main Street Road Diet

- ✓ Consultant selected
- Scope development/contract negotiation underway

Town of Hillsborough Downtown Transportation Study

- ✓ Consultant selected
- Scope development/contract negotiation underway

2040 Long Range Transportation Plan LRTP

- LRTP Schedule/Timeline TAC Approval – August 2011
- Socio-economic and demographic data analysis completed
- LRTP Public Involvement plan – Nov/December 2011
- LRTP Goals and Objectives – January 2012
- Approval of LRTP Targets January/February 2012
- Deficiency Analysis – April 2012
- Socio-economic Forecasts – January 2012
- Land use Scenario – January 2012
- Alternative Analysis – May –July 2010
- Draft LRTP Recommendation September 2012
- Air Quality analysis and Conformity Adopted -October 2012 - February 2013
- Approval of LRTP and Conformity determination April/may 2013
- Technical report and implementation

Comprehensive Transportation Plan (CTP)

- Draft CTP – November 2011 – Depends on NCDOT Schedule
- Public Input
- Recommended CTP
- Adopted CTP - March 2012

- Technical report and implementation

NC 54/I-40 Corridor/Sub-Area Study

- ✓ Staff study initiation meeting
- ✓ Draft scope of services
- ✓ Agency review of scope and time
- ✓ Request for Proposal notice – October 2008
- ✓ Proposal due January 2009
- ✓ Consultant selected
- ✓ Contract negotiation underway
- ✓ Council contract approval May 18, 2009
- ✓ Notice to Proceed – June 2009
- ✓ Kickoff Meeting – July 2009
- ✓ Public Outreach Plan – August 2009
- ✓ Prepare Corridor / Subarea Community Profile – Dec 2009
 - ✓ Public Workshop #1 – Fall 2009
- ✓ Development and Evaluation of Scenarios – Apr 2010
 - ✓ Public Workshop #2 – Feb 25, 2010
- ✓ Transportation/Land Use Master Plan – June 2010
 - ✓ Public Workshop #3 – May 11, 2010
- ✓ Documentation and Final Presentation – June 2010
- Local agency review – ongoing
- Additional study to address issues raised during public comment
- Phase 2 - ongoing
- Study completion – June 2012

GIS/Data Integration and Automation

- ✓ Phase I completed. Internal review and implementation in progress
- ✓ Phase I deployment
- Database development – ongoing.
- Phase 2 – underway

Land-use Model Development

- ✓ Multi-year project in progress
- ✓ Phase 1 completed
- ✓ Sensitivity analysis and testing in progress
- ✓ Data development in on-going
- Phase 2- Parcel level model for DCHC – To commence in July 2011
 - Initial database – TBD
 - Initial model estimation – TBD
 - Initial calibration – TBD

MPO Parking Survey and Study (postponed)

- Parking model specification
- Regional Coordination and planning
- Draft scope of services
- Request for Proposal notice
- Consultant selection
- Council contract approval
- Project commences

MPO Community Viz. Scenarios Planning and Visualization

- ✓ Project kick- off in November 2010 – completed
- ✓ Data collection – completed
- ✓ Build Scenario Planning Tool
- ✓ Develop and approve Place Typology – Place Type Palette – completed
- ✓ Focus Group Meetings – completed
- Trend Forecasts
- Partnering Strategy
- Build Development Strategy
- Rationalize Scenarios
- Land use and Transportation MOEs
- Documentation/Protocol Report

MPO Congestion Management Process CMP

- ✓ CMP Procedure Plan approval – completed
- FHWA Approval of CMP procedure plan – August 2011
- CMP data requirement collection plan –Fall of 2011
- CMP Data collection and monitoring – ongoing
- CMP implementation – ongoing
- State- of Systems Report – December 2010
- Evaluation of effective of CMP projects and funded projects - ongoing

MPO Safety and Security Plan

- Action Plan and schedule under development

Update of the MPO Public Involvement consistent with Federal Certification Review

- Action Plan and schedule under development

MPO Title VI/Environmental Justice (EJ)/Limited English Proficiency (LEP)y Plan

- Action Plan and schedule under development

MPO Climate Change (Sustainability Adaptation) Plan/ Update of Greenhouse Emissions Plan

- Action Plan and schedule under development

MPO Freight Plan and Integration

- Action Plan and schedule under development

Contract Number: C201487 Physical Division: 5 Administrative Division: 5 Length: 1.769 miles Resident Engineer: Chad D. Hinnant Location Description: BRIDGES OVER SANDY CRK & TRIBUTARY & APPROACHES ON SR-1116, SR-1126 NEAR US-15/501 & SR-1116, US-15/501 AT MT MORIAH RD. Type of Work: GRADING, DRAINAGE, PAVING, SIGNALS, AND STRUCTURES. Contractor Name: DLB, INC DBA DLB INC (OF VA) Contract Amount: \$18,810,912.36 Availability Date: 10/1/2007 Completion Date: 8/1/2010 Revised Completion Date: 12/15/2010 Last Estimate Thru: 4/21/2011 Last Estimate Paid: 4/26/2011	Route: US-15 County: Durham TIP Number: B-3450, U-4009, U-4012 Federal Aid Number: BRSTP-1116(6) RE Phone Number: (919)220-4680 Cost Overrun/Underrun: 0.4% Letting Date: 8/21/2007 Work Began: 10/1/2007 Estimated Completion: 4/30/2011 Scheduled Progress: 100% Actual Progress: 99.99%
Contract Number: C201994 Physical Division: 5 Administrative Division: 15 Length: 4.2 miles Resident Engineer: D. Brian Harrington, PE Location Description: TRIANGLE PARKWAY FROM NC-540 IN WAKE CO TO I-40 IN DURHAM CO Type of Work: GRADING, DRAINAGE, PAVING, SIGNALS, TOLL FACILITIES & STRS. Contractor Name: S. T. WOOTEN CORPORATION Contract Amount: \$137,446,000.00 Availability Date: 9/19/2008 Completion Date: 7/1/2011 Revised Completion Date: Last Estimate Thru: Last Estimate Paid:	Route: NC-147 County: Durham TIP Number: U-4763B Federal Aid Number: TIFIA-540(2) RE Phone Number: (919)836-4873 Cost Overrun/Underrun: Letting Date: 8/5/2008 Work Began: 8/3/2009 Estimated Completion: Scheduled Progress: Actual Progress:
Contract Number: C202064 Physical Division: 5 Administrative Division: 5 Length: 1.165 miles Resident Engineer: Cadmus Capehart, PE Location Description: SR-2028 (TW ALEXANDER DR) FROM CORNWALLIS RD TO EAST OF NC-147 IN DURHAM. Type of Work: WIDENING, GRADING, DRAINAGE, PAVING & SIGNALS. Contractor Name: THOMPSON CONTRACTING GRADING PAVING & UTILITIES INC Contract Amount: \$6,502,648.68 Availability Date: 2/1/2010 Completion Date: 8/15/2011 Revised Completion Date: Last Estimate Thru: 4/30/2011 Last Estimate Paid: 5/10/2011	Route: SR-2028 County: Durham TIP Number: U-3309A Federal Aid Number: STP-2028(4) RE Phone Number: (919)840-0914 Cost Overrun/Underrun: 3.15% Letting Date: 12/15/2009 Work Began: 2/8/2010 Estimated Completion: 12/31/2011 Scheduled Progress: 82.5% Actual Progress: 40.27%
Contract Number: C202340 Physical Division: 5 Administrative Division: 5 Length: 1.07 miles Resident Engineer: Chad D. Hinnant Location Description: SR-1321 (HILLANDALE RD) FROM I-85 TO NORTH OF SR-1407 (CARVER AVE). Type of Work: GRADING, DRAINAGE, PAVING, AND SIGNAL. Contractor Name: REA CONTRACTING A DIVISION OF THE LANE CONSTRUCTION CORPORAT Contract Amount: \$4,222,625.78 Availability Date: 8/30/2010 Completion Date: 6/15/2012 Revised Completion Date: Last Estimate Thru: 5/7/2011 Last Estimate Paid: 5/17/2011	Route: SR-1321 County: Durham TIP Number: U-3804 Federal Aid Number: STM-0505(50) RE Phone Number: (919)220-4680 Cost Overrun/Underrun: 0% Letting Date: 7/20/2010 Work Began: 9/30/2010 Estimated Completion: 6/15/2012 Scheduled Progress: 22.5% Actual Progress: 19.68%
Contract Number: C202493 Physical Division: 5 Administrative Division: 5 Length: 9.6 miles Resident Engineer: Cadmus Capehart, PE Location Description: 1 SECTION OF I-85, 1 SECTION OF US-15/501, AND 1 SECTION OF NC-147.	Route: I-85 County: Durham TIP Number: R-5164A Federal Aid Number: STM-085-4(114)171 RE Phone Number: (919)840-0914

<p>Type of Work: MILLING, RESURFACING & MILLED RUMBLE STRIPS. Contractor Name: REA CONTRACTING A DIVISION OF THE LANE CONSTRUCTION CORPORAT Contract Amount: \$6,088,736.11 Cost Overrun/Underrun: -8.96% Availability Date: 3/15/2010 Letting Date: 1/19/2010 Completion Date: 12/16/2010 Work Began: 8/4/2010 Revised Completion Date: Estimated Completion: 4/30/2011 Last Estimate Thru: 2/7/2011 Scheduled Progress: 100% Last Estimate Paid: 2/17/2011 Actual Progress: 97.58%</p>	
<p>Contract Number: C202507 Route: - Physical Division: 5 County: Durham Administrative Division: 15 TIP Number: R-2635, U-4763B Length: 18.8 miles Federal Aid Number: TIFIA-540(2) Resident Engineer: Jason R. Peterson, PE RE Phone Number: (919)571-3000 Location Description: NC-540 FROM NC-55 NEAR APEX TO NC-54 NEAR RTP AND NC-147 FROM I-40 TO NC-540. Type of Work: DESIGN-BUILD LANDSCAPING. Contractor Name: SOUTHERN GARDEN, INC. Contract Amount: \$4,800,000.00 Cost Overrun/Underrun: Availability Date: 8/15/2011 Letting Date: 4/21/2011 Completion Date: 7/1/2015 Work Began: Revised Completion Date: Estimated Completion: Last Estimate Thru: Scheduled Progress: Last Estimate Paid: Actual Progress:</p>	
<p>Contract Number: C202538 Route: NC-55, NC-751, SR-1118 SR-1357, SR-1404, SR-1615 SR-1641, SR-1646, SR-1656 SR-1670, SR-1671, SR-1901 SR-1954, SR-1955, SR-1981 US-70 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: Length: 22.96 miles Federal Aid Number: Resident Engineer: Cadmus Capehart, PE RE Phone Number: (919)840-0914 Location Description: 1 SECTION OF US-70, 1 SECTION OF NC-55, 1 SECTION OF NC-751 & 13 SECTIONS OF SECONDARY ROADS. Type of Work: MILLING, RESURFACING & SHOULDER RECONSTRUCTION. Contractor Name: TRIANGLE GRADING & PAVING, INC Contract Amount: \$4,474,348.51 Cost Overrun/Underrun: 0.56% Availability Date: 3/15/2010 Letting Date: 1/19/2010 Completion Date: 12/16/2010 Work Began: 4/5/2010 Revised Completion Date: Estimated Completion: 6/30/2011 Last Estimate Thru: 5/22/2011 Scheduled Progress: 100% Last Estimate Paid: 5/25/2011 Actual Progress: 95.56%</p>	
<p>Contract Number: C202610 Route: NC-147 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: R-5164D Length: 6.8 miles Federal Aid Number: STM-0147(3) Resident Engineer: Cadmus Capehart, PE RE Phone Number: (919)840-0914 Location Description: NC-147 FROM NORTH OF SR-1322 (BROAD ST) TO NORTH OF SR-2028 (TW ALEXANDER BLVD). Type of Work: DIAMOND GRINDING, CONC PVT SLAB REMOVAL & SHOULDER RECONST. Contractor Name: FSC II LLC DBA FRED SMITH COMPANY Contract Amount: \$4,274,880.20 Cost Overrun/Underrun: 1.19% Availability Date: 3/15/2011 Letting Date: 9/21/2010 Completion Date: 11/1/2011 Work Began: 3/15/2011 Revised Completion Date: Estimated Completion: 11/1/2011 Last Estimate Thru: 5/7/2011 Scheduled Progress: 24% Last Estimate Paid: 5/12/2011 Actual Progress: 32.86%</p>	
<p>Contract Number: C202613 Route: US-15501 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: R-5164E Length: 7.59 miles Federal Aid Number: STM-0070(140) Resident Engineer: Chad D. Hinnant RE Phone Number: (919)220-4680 Location Description: 1 SECTION OF US-70 BUS, 13 SECTIONS OF US-15/501 BUS, 1 SECTION OF NC-751 AND 4 SECTIONS OF SECONDARY ROADS.</p>	

<p>Type of Work: MILLING, RESURFACING & SHOULDER RECONSTRUCTION. Contractor Name: FSC II LLC DBA FRED SMITH COMPANY Contract Amount: \$1,844,694.96 Cost Overrun/Underrun: 0% Availability Date: 3/15/2011 Letting Date: 9/21/2010 Completion Date: 9/2/2011 Work Began: 4/1/2011 Revised Completion Date: Estimated Completion: 9/2/2011 Last Estimate Thru: 5/7/2011 Scheduled Progress: 31.87% Last Estimate Paid: 5/13/2011 Actual Progress: 6.79%</p>	
<p>Contract Number: C202620 Route: I-85 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: I-5145 Length: 12.6 miles Federal Aid Number: IMS-085-4(118)178 Resident Engineer: Cadmus Capehart, PE RE Phone Number: (919)840-0914 Location Description: I-85 FROM NORTH OF US-70 IN DURHAM COUNTY TO NORTH OF NC-56 IN GRANVILLE COUNTY. Type of Work: PAVEMENT REHABILITATION AND BRIDGE REPAIR OVERLAYS. Contractor Name: FSC II LLC DBA FRED SMITH COMPANY Contract Amount: \$8,098,211.15 Cost Overrun/Underrun: Letting Date: 4/19/2011 Availability Date: 6/1/2011 Work Began: Estimated Completion: Scheduled Progress: Actual Progress: Revised Completion Date: Estimated Completion: Scheduled Progress: Actual Progress: Last Estimate Thru: Scheduled Progress: Actual Progress: Last Estimate Paid: Actual Progress:</p>	
<p>Contract Number: C202712 Route: NC-751, SR-1811, SR-1903 SR-1905, SR-1919, SR-1921 SR-1959 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: Federal Aid Number: RE Phone Number: (919)840-0914 Length: 13.04 miles Federal Aid Number: RE Phone Number: (919)840-0914 Resident Engineer: Cadmus Capehart, PE Location Description: NC-751 FROM 3 LANE SECTION TO THE CHATHAM COUNTY LINE & 6 SECTIONS OF SECONDARY ROADS. Type of Work: WIDENING, RESURFACING & SHOULDER RECONSTRUCTION. Contractor Name: REA CONTRACTING A DIVISION OF THE LANE CONSTRUCTION CORPORAT Contract Amount: \$2,700,860.68 Cost Overrun/Underrun: 0% Availability Date: 4/4/2011 Letting Date: 2/15/2011 Completion Date: 9/30/2011 Work Began: 5/5/2011 Revised Completion Date: Estimated Completion: 9/30/2011 Scheduled Progress: 10% Last Estimate Thru: 5/31/2011 Scheduled Progress: 10% Last Estimate Paid: Actual Progress: 23.51%</p>	
<p>Contract Number: C202713 Route: NC-157 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: Federal Aid Number: RE Phone Number: (919)220-4680 Length: 14.99 miles Federal Aid Number: RE Phone Number: (919)220-4680 Resident Engineer: Chad D. Hinnant Location Description: US-15/501 FROM MT MORIAH RD TO ORANGE CO LINE, NC-157 FROM BEG 2 LANE TO ORANGE CO LINE & 7 SECTIONS OF SECONDARY RDS. Type of Work: WIDENING, RESURFACING & SHOULDER RECONSTRUCTION. Contractor Name: REA CONTRACTING A DIVISION OF THE LANE CONSTRUCTION CORPORAT Contract Amount: \$3,152,859.31 Cost Overrun/Underrun: 0% Availability Date: 4/4/2011 Letting Date: 2/15/2011 Completion Date: 8/26/2011 Work Began: 4/4/2011 Revised Completion Date: Estimated Completion: 8/26/2011 Scheduled Progress: 17% Last Estimate Thru: 4/30/2011 Scheduled Progress: 17% Last Estimate Paid: 5/10/2011 Actual Progress: 21.18%</p>	
<p>Contract Number: DO00069 Route: NC-147 Physical Division: 5 County: Durham Administrative Division: 5 TIP Number: BK-5102G Length: 0 miles Federal Aid Number: BRNHS-0147(4) Resident Engineer: Cadmus Capehart, PE RE Phone Number: (919)840-0914 Location Description: BRIDGES #12, 71, 137, 154, 156, AND 169 ON NC-147. Type of Work: BRIDGE PAINTING. Contractor Name: S & D INDUSTRIAL PAINTING, INC. Contract Amount: \$922,562.15 Cost Overrun/Underrun: Letting Date: 8/19/2010 Availability Date: Letting Date: 8/19/2010</p>	

Completion Date: Revised Completion Date: Last Estimate Thru: Last Estimate Paid:	Work Began: Estimated Completion: Scheduled Progress: Actual Progress:
Contract Number: DO00070 Physical Division: 5 Administrative Division: 5 Length: 0 miles Resident Engineer: Cadmus Capehart, PE Location Description: BRIDGES #194 ON SR-1940, #202 ON SR-2080, #206 ON SR-1121, AND #212 ON NC-147. Type of Work: BRIDGE PAINTING. Contractor Name: ASTRON GENERAL CONTRACTING COMPANY INC Contract Amount: \$1,079,557.80 Availability Date: Completion Date: Revised Completion Date: Last Estimate Thru: Last Estimate Paid:	Route: NC-147 County: Durham TIP Number: BK-5102E Federal Aid Number: BRZ-1940(2) RE Phone Number: (919)840-0914 Cost Overrun/Underrun: Letting Date: 8/19/2010 Work Began: Estimated Completion: Scheduled Progress: Actual Progress:
Contract Number: DO00076 Physical Division: 5 Administrative Division: 5 Length: 0 miles Resident Engineer: Jeffrey D. Allen, PE Location Description: BRIDGES #228 ON SR-1959, #224 ON SR-1999, AND #100 ON SR-2028. Type of Work: BRIDGE PAINTING. Contractor Name: SAFFO CONTRACTORS INC Contract Amount: \$1,138,000.00 Availability Date: Completion Date: Revised Completion Date: Last Estimate Thru: Last Estimate Paid:	Route: - County: Durham TIP Number: BK-5102F Federal Aid Number: BRSTP-1959(5) RE Phone Number: (919)733-9499 Cost Overrun/Underrun: Letting Date: 9/2/2010 Work Began: Estimated Completion: Scheduled Progress: Actual Progress:

County	TIP/WBS #	Description	Let Date	Completion Date	Status	Cost	Comments
Orange	EL-4601	Morgan Creek Greenway	11/9/2009	5/31/2011	95% complete	\$987,488	ARRA
Orange	ER-5100 GE	Landscape planting on US 15-501@ SR 1734 (Erwin Rd./Europa Dr.)	11/24/2009	4/30/2012	on schedule	\$65,000	ARRA
Orange	U-3306 34913.3.ST1 STM-1733 (16)	Grading, drainage, paving, signals, curb and gutter, and retaining wall on SR 1733 (Weaver Dairy Rd.) from NC 86 to Old Sterling Road	7/20/2010	6/15/2013	ahead of schedule	\$13.4 million	ARRA
Orange	U-4704	Computerized Traffic Signal System for Chapel Hill-Carrboro	9/15/2009	8/1/2012	behind schedule	\$5.175 million	ARRA
Orange	U-4726 GA	Twin Creeks Park Greenway	11/19/2009	6/30/2011	100% complete	\$429,457.00	ARRA
Orange	U-4726 JA	Construct sidewalks in Hillsborough	11/19/2009	9/17/2011	ahead of schedule	\$1,034,110.00	ARRA, STP-DA & Contingency; M.A. w/ City
NCDOT PROJECTS CURRENTLY IN 12 MONTH LETTING LIST							
County	TIP #	Description	Let Date	Completion Date	Status	Cost	Comments

County	TIP/WBS #	Description	Let Date	Completion Date	Status	Cost	Comments
Orange	36945	Upgrade traffic signal with mast arm and install pedestrian signal heads on SR 1010 (Franklin St.) @ Mallette St.	11/4/2010	6/1/2011	behind schedule	\$140,000.00	Small Construction
Orange	42502	Replace deteriorated curb and gutter at several locations on both sides of SR 1010 (Franklin St.) between Hillsborough St. and Plant Rd.	TBD	TBD	Awaiting execution of M.A. by Town	\$30,000	Small Construction
Orange	43030	Safety improvements near railroad crossing #736157R on SR 1843 (Seawell School Rd.)(signing, tree removal, grading for visibility, paved shoulders, wedging, short overlay & snow-plowable pavement markers)	N/A	8/30/2011	F.A. construction	\$45,000	Small Construction
Orange	43114	Install a pedestrian countdown signal and crosswalk on SR 1005 (Jones Ferry Road) at SR 1937 (Old Fayetteville Road)	N/A	8/30/2011	F.A. construction	\$20,000	Small Construction
Orange	C-4932 A	Construct a Transit Shelter at the Park and Ride Lot for DTCC in Hillsborough and install bike racks on Orange Public Transportation buses	5/17/2011	TBD	Administered by County	\$20,275	CMAQ
Orange	EB-4409 34025.1.1	Installation of Orange County Bike Route Signs	4/5/2011	7/22/2011	on schedule	\$34,564.50	STP
Orange	I-5142	Mill, resurface and install pavement markers and rumble strips on I-85/I-40 from west of SR 1114(Buckhorn Road) to the I-85/I-40 interchange	3/16/2010	7/15/2011	behind schedule	\$8.60 million	TIP (IM)
Orange	SR-5000 S 40922.1.18 PE	Education, encouragement, evaluation, and neighborhood outreach for Carrboro Elementary School	N/A	N/A	Municipal Agreement with Town	\$12,865	Safe Routes to Schools
Orange	SR-5001 AE	Construct 870 linear feet of 5' sidewalk from existing sidewalk near Weaver Street to Shelton Street in Carrboro	TBD	4/21/2012	PS&E review underway	\$300,000.00	SRTS
Orange	SR-5001 AR	Construct 320' of 5' sidewalk between Cobbleridge Rd. and Rossburn Rd. in Chapel Hill	TBD	7/22/2012	Construction authorization pending completion of PS&E review	\$50,000 \$108,000	SRTS/STP-DA
Orange	SS-4907 G 43190.3.1	Widen radii and install 4-way stop on US 70 Bus./Alt. and SR 1709(Lawrence Rd.)	N/A	8/30/2011	F.A. construction	\$24,000.00	Spot Safety

Orange	SS-4907 T 42204.2 42204.1 42170	Construct a right turn lane on SR 1710 and install a traffic signal @ NC 86	10/20/2010	9/1/2011	behind schedule	\$215,000	Spot Safety-State
Orange	SS-4907 U 42205.2 42205.1 42171	Improve sight distance on SR 1710 by lowering the crest vertical curve on the westbound approach to the intersection of SR 1710 (Old NC 10) @ SR 1713 (Mt. Herman Church Road)	TBD	TBD	hydro design required prior to utility relocation meeting	\$320,000	Spot Safety-State
Orange	SS -4907 V 42423.3 42423.1	Realign intersection of SR 1005 (Old Greensboro Rd.) @ SR 1951 (White Cross Rd.)	TBD	TBD	Design pending scope revision	\$198,000	Spot Safety-State
Orange	SS-4907 AG 07-09-1320	Widen radii and install 4-way stop on US 70 Bus./Alt. and SR 1709 (Lawrence Road)	N/A	8/30/2011	F.A. construction	\$1000 R/W/U \$24,000 C	Spot Safety-State
Orange	W-5207 E 45337.1.5 PE	Installation of a roundabout on SR 1734 (Erwin Rd.) and SR 1791 (Mt. Moriah Rd.) near Chapel Hill	6/1/2012	12/31/2012	To replace SS-4907 AC	\$450,000	High Hazard Safety
Orange							
NCDOT PROJ	TIP #	Location Description	Est. Let Date	Completion Date	Status	Cost	Comments
County	EB-4707	Bicycle improvements(Bikeway and signals) on Durham/Chapel Hill (SR 1838/SR 2220)from SR 1116 (Garrett Road) in Durham County to US 15-501 inOrange County	Apr. 17, 2012			\$4.0 million	
Durham/ Orange	U-0624	Corridor upgrade on NC 86 (S. Columbia St.)including Bicycle lanes from SR 1906 (Purefoy Rd.) to SR 1902 (Manning Dr.)	Nov. 15, 2011			\$4.85 million	