Financial Forecasting Assumptions for Plan 2040 (DRAFT)

Inflation and Long Range Cost Escalation

- For the FY 2012-2017 TIP period, ARC will use the GDOT recommended 4-percent inflation rate. This conservative inflation rate allows both GDOT and ARC to manage expectations and account for uncertainties in the current fiscal environment.
- For the long-range element of the RTP (2018 and beyond), an inflation rate of 2.39% is recommended. As shown in Table 1, prominent economists in Federal government and the Federal Reserve Board forecast the consumer price index (CPI) to increase at this average annual rate over the next 10 years. This forecasted rate takes into consideration drastically reduced inflationary pressures in the national economy due to tightening lending practices and fiscally austere policies that have been implemented by a multitude of state and local governments across the nation.

| Table 1 | Table 1: Short Range and Long Range Projections for Inflation (Annualized Percentage Points) | | | | | | | | |
|-----------------------|--|---------|----------|---------|-------------|--------------|----------|----------|--|
| | Headli | ne CPI | Core | CPI | Headlir | Headline PCE | | Core PCE | |
| | Previous | Current | Previous | Current | Previous | Current | Previous | Current | |
| Quarterly | Quarterly | | | | | | | | |
| 2010:Q2 | 1.4 | 1.4 | 1.4 | 1 | 1.2 | 1.1 | 1.3 | 1.1 | |
| Q3 | 1.8 | 1.8 | 1.5 | 1.4 | 1. <i>7</i> | 1.7 | 1.3 | 1.2 | |
| Q4 | 1.9 | 1.8 | 1.5 | 1.5 | 1.8 | 1.6 | 1.4 | 1.3 | |
| 2011:Q1 | 2.1 | 1.9 | 1.6 | 1.5 | 1.8 | 1.8 | 1.5 | 1.4 | |
| Q2 | N.A. | 2 | N.A. | 1.6 | N.A. | 1.7 | N.A. | 1.5 | |
| Q4/Q4 An | nual Average | es | | | | | | | |
| 2010 | 1.7 | 1.6 | 1.4 | 1 | 1.4 | 1.4 | 1.3 | 1.2 | |
| 2011 | 2.1 | 2 | 1.7 | 1.6 | 1.8 | 1.8 | 1.5 | 1.6 | |
| 2012 | 2.3 | 2.4 | 2 | 2 | 2 | 2 | 1.9 | 1.8 | |
| Long-Term | Long-Term Annual Averages | | | | | | | | |
| 2010- 201 <i>4</i> | 2.2 | 2.19 | N.A. | N.A. | 1.8 | 1.8 | N.A. | N.A. | |
| 2010- 2019 | 2.39 | 2.4 | N.A. | N.A. | 2.1 | 2.15 | N.A. | N.A. | |

Source: Philadelphia FED - www.philadelphiafed.org/research-and-data

Forecasted Debt Service

Georgia has aggressively embarked on several major bonding initiatives over the past seven years in order to expedite major transportation projects throughout the state – including Governor Sonny Perdue's Fast Forward Congestion Relief Program, which is a 6-year \$15.5 billion program enacted in 2004 to relieve congestion and spur economic growth through the acceleration of programmed projects, as well as his recent \$300 million bonding initiative to fund several projects including express toll lanes on Interstate 75 south of Atlanta and a last-mile connection to the Port of Savannah. Most, if not all, of the bonds are federal GARVEE bonds – which are backed by both state motor fuel tax revenue and future federal apportionments – and state GO bonds, which are primarily backed by state motor fuel tax revenue.

Table 2 illustrates the debt service payment schedule and the respective contributions made from state motor fuel tax revenue and future federal apportionments. It is important to note that the debt service payments are collected immediately before the revenues are allocated per congressional district.

| | Table 2: Debt Service for Bonds from State and Federal Sources: FY 2011 - FY 2030 | | | | | |
|---------|---|--|---|---|--|-----------------|
| YEAR | GARVEE/GRB Debt Service from FHWA Apportionments | GARVEE/GRB Debt Service from State Motor Fuel Taxes | GO Bond Debt Service from State Motor Fuel Taxes | Total Annual Debt Service from FHWA Apportionments | Total Annual Debt Service from State Motor Fuel Taxes | Grand Total |
| FY 2011 | \$148,193,801 | \$91,051,947 | \$185,000,000 | \$148,193,801 | \$276,051,947 | \$424,245,748 |
| FY 2012 | \$148,156,201 | \$91,040,758 | \$209,710,554 | \$148,156,201 | \$300,751,312 | \$448,907,513 |
| FY 2013 | \$148,568,841 | \$91,145,905 | \$189,928,605 | \$148,568,841 | \$281,074,510 | \$429,643,351 |
| FY 2014 | \$148,195,597 | \$91,046,282 | \$162,352,963 | \$148,195 , 597 | \$253,399,245 | \$401,594,842 |
| FY 2015 | \$148,196,1 <i>57</i> | \$91,051,413 | \$163,293,119 | \$148,196,1 <i>57</i> | \$254,344,532 | \$402,540,689 |
| FY 2016 | \$148,197,957 | \$91,053,912 | \$140,914,422 | \$148,197,957 | \$231,968,334 | \$380,166,291 |
| FY 2017 | \$148,195,553 | \$91,050,050 | \$146,011,666 | \$148,195,553 | \$237,061,716 | \$385,257,269 |
| FY 2018 | \$148,197,128 | \$91,046,557 | \$130,146,072 | \$148,197,128 | \$221,192,629 | \$369,389,757 |
| FY 2019 | \$107,465,568 | \$80,864,792 | \$126,289,302 | \$107,465 , 568 | \$207,154,094 | \$314,619,662 |
| FY 2020 | \$107,465,176 | \$80,866,813 | \$115,506,024 | \$107,465,176 | \$196,372,837 | \$303,838,013 |
| FY 2021 | \$53,428,560 | \$67,353,890 | \$103,804,247 | \$53,428,560 | \$1 <i>7</i> 1,1 <i>5</i> 8,13 <i>7</i> | \$224,586,697 |
| FY 2022 | \$0 | \$24,406,625 | \$102,540,427 | \$0 | \$126,947,052 | \$126,947,052 |
| FY 2023 | \$0 | \$24,406,750 | \$91,473,251 | \$0 | \$115,880,001 | \$115,880,001 |
| FY 2024 | \$0 | \$24,405,250 | \$80,330,892 | \$0 | \$104,736,142 | \$104,736,142 |
| FY 2025 | \$0 | \$0 | \$81,596,692 | \$0 | \$81,596,692 | \$81,596,692 |
| FY 2026 | \$0 | \$0 | \$65,882,095 | \$0 | \$65,882,095 | \$65,882,095 |
| FY 2027 | \$0 | \$0 | \$62,202,028 | \$0 | \$62,202,028 | \$62,202,028 |
| FY 2028 | \$0 | \$0 | \$31,075,141 | \$0 | \$31,075,141 | \$31,075,141 |
| FY 2029 | \$0 | \$0 | \$28,380,647 | \$0 | \$28,380,647 | \$28,380,647 |
| FY 2030 | \$0 | \$0 | \$5,330,365 | \$0 | \$5,330,365 | \$5,330,365 |
| TOTAL | \$1,454,260,539 | \$1,030,790,942 | \$2,221,768,512 | \$1,454,260,539 | \$3,252,559,454 | \$4,706,819,993 |

Note: Dollars at nominal values Sources: SRTA/GSFIC/GDOT

Federal Highway Funding to the Atlanta Region

• The ARC will use a forecasted 2.5% annual growth rate in federal funding for the TIP and a 1.2% annual growth rate in federal funding for long range. The 2.5% growth rate that is used for the TIP period matches GDOT assumptions as prepared by technical analysis from Georgia Tech. Because SAFETEA-LU is currently in continuing resolution and that there has been no draft of a new transportation authorization bill submitted to Congress, we must assume that current conditions hold for long range. Based on CBO analysis, the annual growth rate for federal funding nationwide will remain low over the next six years.

| Table 3: Forecasted Federal Apportionments for Surface Transportation | | | | | | |
|---|-------------------|------------------|------------------|------------------|--|--|
| | 2010- | 2015 | 2011- | -2016 | | |
| CBO Baseline | \$Millions | Annual Growth | \$Millions | Annual Growth | | |
| Federal-aid Highways (Ob Limit) | \$253,230 | 1.1% | \$256,396 | 1.3% | | |
| Exempt Highway Obligations | \$4,434 | 0.0% | \$4,434 | 0.0% | | |
| NHTSA Obligations (HTF Only) | \$4 , 504 | 1.2% | \$4 , 563 | 1.3% | | |
| FMCSA Obligations | \$3,425 | 1.6% | \$3,485 | 1.7% | | |
| FTA HTF Obligations | \$51,377 | 1.1% | \$52,011 | 1.2% | | |
| FTA General Fund Appropriations | \$1 <i>4,</i> 732 | 1.2% | \$14,921 | 1.3% | | |
| Total, "Highway Bill" Obligations | \$331,702 | 1.1% | \$335,810 | 1.2% | | |

Source: CBO/Transportation Weekly/Legislative Services Group

- The forecast of FHWA obligated funding to the Atlanta region is based upon historical obligated funding to the state of Georgia, the projected annual growth rates in federal transportation funding apportionments released by the Congressional Budget Office as shown in the previous table and the 18-county Atlanta region's forecasted share of the total state population. As shown in Table 4, the 18-county Atlanta region is forecasted to receive \$23.4 billion in obligated funding from the FHWA in the years 2012-2040 representing an average \$804.8 million in Federal Highway funding annually to the region.
- As previously displayed in Table 2, the state will forfeit an average of \$134 million per year in obligated
 FHWA funding due to GARVEE debt service payments. It must be noted that this sum is immediately
 subtracted from the total sum of FHWA obligated funding before it is apportioned by GDOT via congressional
 balancing.

| Table 4: ARC 18-County Region Share of Georgia's Total Population* | | | | | | |
|--|-----------|-----------|-----------|--|--|--|
| 2010-2013 | 2014-2020 | 2021-2030 | 2031-2040 | | | |
| 54.00% | 57.00% | 60.00% | 63.00% | | | |

Table 5: FHWA Funding Obligation Limit for Georgia and the 18-County Atlanta Region **Forecast State Forecast State ARC Share** Year (Pre-GARVEE/GRB (Post-GARVEE/GRB Payment) Payment) 2010 \$1,126,156,899 \$977,963,098 \$528,100,073 2011 \$1,140,169,528 \$991,975,727 \$535,666,893 2012 \$543,348,169 \$1,154,356,514 \$1,006,200,313 2013 \$1,168,720,027 \$1,020,151,186 \$550,881,640 2014 \$1,183,262,263 \$1,035,066,666 \$589,988,000 2015 \$1,197,985,447 \$1,049,789,290 \$598,379,895 2016 \$1,212,891,829 \$1,064,693,872 \$606,875,507 \$1,227,983,689 \$1,079,788,136 \$615,479,238 2017 2018 \$1,243,263,336 \$1,095,066,208 \$624,187,738 2019 \$1,258,733,105 \$1,151,267,537 \$656,222,496 \$1,274,395,363 \$1,166,930,187 2020 \$665,150,206 2021 \$1,290,252,504 \$1,236,823,944 \$742,094,366 2022 \$1,306,306,953 \$1,306,306,953 \$783,784,172 \$1,322,561,167 \$793,536,700 2023 \$1,322,561,167 2024 \$1,339,017,629 \$1,339,017,629 \$803,410,577 2025 \$813,407,314 \$1,355,678,857 \$1,355,678,857 \$1,372,547,398 \$823,528,439 2026 \$1,372,547,398 2027 \$1,389,625,833 \$833,775,500 \$1,389,625,833 2028 \$1,406,916,772 \$1,406,916,772 \$844,150,063 2029 \$1,424,422,860 \$1,424,422,860 \$854,653,716 2030 \$1,442,146,775 \$1,442,146,775 \$865,288,065 2031 \$1,460,091,226 \$919,857,472 \$1,460,091,226 2032 \$1,478,258,957 \$1,478,258,957 \$931,303,143 2033 \$1,496,652,747 \$1,496,652,747 \$942,891,231 2034 \$1,515,275,409 \$1,515,275,409 \$954,623,508 2035 \$966,501,768 \$1,534,129,791 \$1,534,129,791 2036 \$1,553,218,775 \$1,553,218,775 \$978,527,828 2037 \$1,572,545,280 \$1,572,545,280 \$990,703,527 2038 \$1,592,112,263 \$1,592,112,263 \$1,003,030,726 2039 \$1,611,922,716 \$1,611,922,716 \$1,015,511,311 2040 \$1,631,979,668 \$1,631,979,668 \$1,028,147,191 Total (2012 - 2040) \$40,017,255,152 \$38,711,188,414 \$23,339,239,506

Sources: US Census Bureau/FHWA/CBO/ARC

Federal Transit Formula Funding to the Atlanta Region

- The apportionments that transit agencies within the Atlanta region receive from the Federal Transit Administration (FTA) are based on the CBO's anticipated average annual growth rate for the total sum of Federal Transit apportionments nationwide in the years 2010 2016 1.2 percent annually. As with Federal Highway funding, we must assume that this average annual growth rate will hold constant over the thirty year period of Plan 2040 due to the fact that SAFETEA LU is in continuing resolution.
- As illustrated in Table 6, the total Federal Transit apportionments to transit operators in the 18-county Atlanta region via formula funding is estimated to be \$4.02 billion in the years 2012- 2040. The majority of this funding \$2.3 billion will be comprised of Section 5307 and Section 5340 Urbanized Area apportionments.

| | | Table | 6: Atlanta Region I | FTA Formula Fundii | ng Forecasts | | | |
|-----------|--|---|---------------------|-------------------------------|---------------------------------------|-----------------------------|--|--------------------------------------|
| Year | Section 5307/5340 Urbanized Area | Section 5309 Fixed Guideway Modernization | Section 5316 JARC | Section 5317 New Freedom | Section 5309 Bus | Section 5308 Clean Fuels | Section 5339 Alternatives Analysis | Total (w/o statewide programs) |
| 2012 | \$70,386,383 | \$38,621,708 | \$1,763,647 | \$1,113,230 | \$4,098,843 | \$0 | \$30 7, 413 | \$116,291,224 |
| 2013 | \$71,250,727 | \$39,095,982 | \$1,785,305 | \$1,126,901 | \$4,149,1 <i>77</i> | \$0 | \$311,188 | \$11 <i>7,7</i> 19,280 |
| 2014 | \$72,125,686 | \$39 , 576 , 081 | \$1,807,228 | \$1,140,739 | \$4,200,129 | \$0 | \$31 <i>5</i> ,010 | \$119,164,873 |
| 2015 | \$73,011,390 | \$40,062,075 | \$1,829,421 | \$1,1 <i>54,74</i> 8 | \$4,251,706 | \$0 | \$318 , 878 | \$120,628,218 |
| 2016 | \$73,907,970 | \$40,554,037 | \$1,851,886 | \$1,168,928 | \$4 , 303 , 91 <i>7</i> | \$0 | \$322,794 | \$122,109,532 |
| 2017 | \$ 74, 81 5, 559 | \$41,052,041 | \$1,874,628 | \$1,183,282 | \$4 , 356 , 770 | \$0 | \$326 , 758 | \$123,609,037 |
| 2018 | \$75 , 734 , 295 | \$41,556,160 | \$1,897,648 | \$1,197,813 | \$4,410,271 | \$0 | \$330,770 | \$125,126,956 |
| 2019 | \$ 76,664, 312 | \$42,066,470 | \$1,920,951 | \$1,212,522 | \$4,464,429 | \$0 | \$334,832 | \$126,663,515 |
| 2020 | \$77,605,749 | \$42,583,046 | \$1,944,540 | \$1,227,412 | \$4 , 519 , 252 | \$0 | \$338,944 | \$128,218,943 |
| 2021 | \$78 , 558 , 748 | \$43,105,966 | \$1,968,419 | \$1,242,485 | \$4 , 574 , 748 | \$0 | \$343,106 | \$129,793,472 |
| 2022 | \$79,523,449 | \$43,635,307 | \$1,992,591 | \$1 , 257 , 742 | \$4,630,926 | \$0 | \$347,319 | \$131,387,336 |
| 2023 | \$80,499,997 | \$44,171,149 | \$2,017,061 | \$1,273,187 | \$4 , 687 , 794 | \$0 | \$351 , 585 | \$133,000,772 |
| 2024 | \$81,488,537 | \$4 4, 713 , 570 | \$2,041,830 | \$1,288,822 | \$4,745,360 | \$0 | \$355,902 | \$134,634,022 |
| 2025 | \$82 , 489 , 21 <i>7</i> | \$45,262,653 | \$2,066,904 | \$1,304,649 | \$4,803,633 | \$0 | \$360,272 | \$136,287,328 |
| 2026 | \$83,502,184 | \$45,818,478 | \$2,092,285 | \$1,320,670 | \$4,862,622 | \$0 | \$364,697 | \$137,960,936 |
| 2027 | \$8 4, 52 7, 591 | \$46,381,129 | \$2,117,979 | \$1,336,888 | \$4,922,335 | \$0 | \$369,1 <i>75</i> | \$139,655,096 |
| 2028 | \$85,565,590 | \$46,950,689 | \$2,143,987 | \$1,353,305 | \$4,982,78 1 | \$0 | \$373,709 | \$141,370,061 |
| 2029 | \$86,616,335 | \$47,527,244 | \$2,170,315 | \$1,369,923 | \$5,043,970 | \$0 | \$378,298 | \$143,106,085 |
| 2030 | \$87,679,984 | \$48,110,878 | \$2,196,967 | \$1,386,746 | \$5,105,910 | \$0 | \$382,943 | \$144,863,428 |
| 2031 | \$88,756,694 | \$48,701,680 | \$2,223,946 | \$1,403, <i>775</i> | \$5,168,610 | \$0 | \$387,646 | \$146,642,351 |
| 2032 | \$89,846,626 | \$49,299,737 | \$2,251,256 | \$1,421,013 | \$5,232,081 | \$0 | \$392,406 | \$148,443,119 |
| 2033 | \$90,949,943 | \$49,905,137 | \$2,278,901 | \$1,438,464 | \$5,296,331 | \$0 | \$397,225 | \$150,266,000 |
| 2034 | \$92,066,808 | \$50,517,973 | \$2,306,886 | \$1,456,128 | \$5,361,370 | \$0 | \$402,103 | \$152,111,267 |
| 2035 | \$93,197,389 | \$51,138,333 | \$2,335,215 | \$1,474,009 | \$5,427,207 | \$0 | \$407,041 | \$153,979,193 |
| 2036 | \$94,341,852 | \$51,766,312 | \$2,363,891 | \$1,492,110 | \$5,493,853 | \$0 | \$412,039 | \$155,870,058 |
| 2037 | \$95,500,370 | \$52,402,002 | \$2,392,920 | \$1,510,433 | \$5,561,318 | \$0 | \$417,099 | \$157,784,142 |
| 2038 | \$96,673,115 | \$53,045,499 | \$2,422,305 | \$1,528,981 | \$5,629,611 | \$0 | \$422,221 | \$159,721,731 |
| 2039 | \$97,860,261 | \$53,696,898 | \$2,452,051 | \$1,5 <i>4</i> 7,7 <i>5</i> 7 | \$5,698,742 | \$0 | \$427,406 | \$161,683,114 |
| 2040 | \$99,061,985 | \$54,356,296 | \$2,482,162 | \$1,566,764 | \$5,768,723 | \$0 | \$432,654 | \$163,668,583 |
| 2012-2040 | \$2,292,571,637 | \$1,257,956,841 | \$57,444,172 | \$36,259,294 | \$133,504,398 | \$0 | \$10,012,830 | \$4,021,759,676 |

Sources: Transportation Weekly/FTA/Federal Register/CBO/ARC

FTA Discretionary Funding

- In order to forecast the level of discretionary funding available to transit operators in the 18-county Atlanta region, the average annual growth in the amount of funding appropriated from the Congressional General Fund to the FTA was used 1.28 percent as shown in Table 3.
- Given that Federal funding for transportation will be held relatively constant due to SAFETEA-LU being in continuing resolution, the 1.28-percent growth rate was also held constant over the 30-year period of Plan 2040 resulting in \$1.4 billion in New Starts/Small Starts funding appropriated to regional transit operators, as shown in Table 7.

| Table 7: FTA New Starts/Small Starts Forecasts | | | |
|--|--------------------------------|--|--|
| Year | Amount | | |
| 2012 | \$40 <i>,757</i> ,820 | | |
| 2013 | \$41,278,297 | | |
| 2014 | \$41,805,421 | | |
| 2015 | \$42,339,276 | | |
| 2016 | \$42,879,949 | | |
| 2017 | \$43,427,526 | | |
| 2018 | \$43,982,096 | | |
| 2019 | \$44,543,747 | | |
| 2020 | \$4 5, 112,5 7 1 | | |
| 2021 | \$45,688,658 | | |
| 2022 | \$46,272,102 | | |
| 2023 | \$46,862,997 | | |
| 2024 | \$47,461,437 | | |
| 2025 | \$48,067,520 | | |
| 2026 | \$48,681,342 | | |
| 2027 | \$49,303,003 | | |
| 2028 | \$49,932,602 | | |
| 2029 | \$50,570,242 | | |
| 2030 | \$51,216,024 | | |
| 2031 | \$51,870,052 | | |
| 2032 | \$52,532,433 | | |
| 2033 | \$53,203,272 | | |
| 2034 | \$53,882,678 | | |
| 2035 | \$54 , 570,760 | | |
| 2036 | \$55,267,628 | | |
| 2037 | \$55,973,396 | | |
| 2038 | \$56,688,176 | | |
| 2039 | \$57,412,084 | | |
| 2040 | \$58,145,236 | | |
| Total | \$1,419,728,345 | | |

Sources: CBO/Federal Register/ARC

State Motor Fuel Revenues

• State motor fuel tax revenues have recently experienced a declining trend due mainly to the economic downturn. Additionally in the years 2011-2030, an estimated \$3.3 billion of state motor fuel tax revenue will be allocated for debt service payments on bonds issued through several state transportation programs that funded major transportation projects throughout Georgia. As with obligated federal funding, this sum is immediately allocated from total revenue before it is apportioned via congressional balancing. In total, the state is forecasted to receive \$29.3 billion in net revenue from state motor fuel taxes in the years 2012 – 2040.

| Table 8: Revenues from Georgia's State Motor Fuel Taxes | | | | | | |
|---|----------------------|--------------------|-----------------------------------|-------------------------|----------------------------|-------------------|
| Year | Prepaid Sales Tax | Excise Tax | Total Revenue | GO Bond Debt Service | GARVEE/GRB Debt Service | Net Total Revenue |
| 2010 | \$385,241 | \$443,386 | \$828,627,000 | (\$199,101,343) | (\$91,051,941) | \$538,473,716 |
| 2011 | \$450,366 | \$474,642 | \$925,008,113 | (\$185,000,000) | (\$91,051,947) | \$648,956,167 |
| 2012 | \$471,029 | \$467,121 | \$938,149,853 | (\$209,710,554) | (\$91,040,758) | \$637,398,542 |
| 2013 | \$491,692 | \$459,519 | \$951,210,795 | (\$189,928,605) | (\$91,145,905) | \$670,136,284 |
| 2014 | \$512,355 | \$451,839 | \$964,193,850 | (\$162,352,963) | (\$91,046,282) | \$710,794,605 |
| 2015 | \$533,018 | \$444,083 | \$977,101,691 | (\$163,293,119) | (\$91,051,413) | \$722,757,159 |
| 2016 | \$553,681 | \$436,255 | \$989,936,774 | (\$140,914,422) | (\$91,053,912) | \$757,968,440 |
| 2017 | \$574,344 | \$428,357 | \$1,002,701,356 | (\$146,011,666) | (\$91,050,050) | \$765,639,641 |
| 2018 | \$595,008 | \$420,390 | \$1,01 <i>5</i> ,397,517 | (\$130,146,072) | (\$91,046,557) | \$794,204,888 |
| 2019 | \$61 <i>5,</i> 671 | \$412,357 | \$1,028,027,173 | (\$126,289,302) | (\$80,864,792) | \$820,873,079 |
| 2020 | \$636,334 | \$404,258 | \$1,040,592,092 | (\$115,506,024) | (\$80,866,813) | \$844,219,255 |
| 2021 | \$656,997 | \$396,097 | \$1,053,093,906 | (\$103,804,247) | (\$67,353,890) | \$881,935,769 |
| 2022 | \$677,660 | \$387,874 | \$1,065,534,124 | (\$102,540,427) | (\$24,406,625) | \$938,587,072 |
| 2023 | \$698,323 | \$3 79, 591 | \$1,077,914,140 | (\$91,473,251) | (\$24,406,750) | \$962,034,139 |
| 2024 | \$718 , 986 | \$371,249 | \$1,090,235,245 | (\$80,330,892) | (\$24,405,250) | \$985,499,103 |
| 2025 | \$739,649 | \$362,849 | \$1,102,498,632 | (\$81,596,692) | | \$1,020,901,940 |
| 2026 | \$760,312 | \$354,393 | \$1,114,705,409 | (\$65,882,095) | | \$1,048,823,314 |
| 2027 | \$780 , 975 | \$345 , 881 | \$1,126,856,599 | (\$62,202,028) | | \$1,064,654,571 |
| 2028 | \$801,638 | \$337,315 | \$1,138,953,152 | (\$31,075,141) | | \$1,107,878,011 |
| 2029 | \$822,302 | \$328,694 | \$1,150,995,950 | (\$28,380,647) | | \$1,122,615,303 |
| 2030 | \$842,965 | \$320,021 | \$1,162,985,806 | (\$5,330,365) | | \$1,157,655,441 |
| 2031 | \$863,628 | \$311,296 | \$1,1 <i>74</i> ,923, <i>4</i> 78 | | | \$1,174,923,478 |
| 2032 | \$884,291 | \$302,519 | \$1,186,809,665 | | | \$1,186,809,665 |
| 2033 | \$904,954 | \$293,691 | \$1,198,645,019 | | | \$1,198,645,019 |
| 2034 | \$925,617 | \$284,813 | \$1,210,430,139 | | | \$1,210,430,139 |
| 2035 | \$946,280 | \$275,885 | \$1,222,165,583 | | | \$1,222,165,583 |
| 2036 | \$966,943 | \$266,909 | \$1,233,851,866 | | | \$1,233,851,866 |
| 2037 | \$98 7, 606 | \$257,883 | \$1,245,489,464 | | | \$1,245,489,464 |
| 2038 | \$1,008,269 | \$248,809 | \$1,257,078,818 | | | \$1,257,078,818 |
| 2039 | \$1,028,932 | \$239,688 | \$1,268,620,332 | | | \$1,268,620,332 |
| 2040 | \$1,049,596 | \$230,519 | \$1,280,114,382 | | | \$1,280,114,382 |
| Total (2012 - 2040) | \$22,049,056 | \$10,220,156 | \$32,269,212,810 | (\$2,036,768,512) | (\$939,738,996) | \$29,292,705,302 |

Sources: Georgia Dept. of Revenue/GDOT/GSFIC/ARC

Based on the data in Table 8, as well as forecasted population growth in Metro Atlanta, the 18-county
 Atlanta region is forecasted to receive \$15.8 billion of state motor fuel tax revenue and \$146.5 million of
 state General Fund revenue – comprising a total of \$16 billion in state funding for transportation projects in
 the 18-county region, as shown in Table 9.

| Table 9: 18-0 | Table 9: 18-County Atlanta Region's Share of State Transportation Funding | | | | | |
|---------------|---|-------------------------------|------------------------|--|--|--|
| Year | Revenue from State Motor Fuel Taxes | General Fund | TOTAL | | | |
| 2012 | \$344,195,213 | \$3,762,090 | \$347,957,302 | | | |
| 2013 | \$361,873,594 | \$3,810,997 | \$365,684,590 | | | |
| 2014 | \$383,829,087 | \$4,075,014 | \$387,904,101 | | | |
| 2015 | \$390,288,866 | \$4,127,989 | \$394,416,855 | | | |
| 2016 | \$409,302,958 | \$4,181,653 | \$413,484,611 | | | |
| 2017 | \$413,445,406 | \$4,236,015 | \$41 <i>7</i> ,681,421 | | | |
| 2018 | \$428,870,640 | \$4,291,083 | \$433,161,722 | | | |
| 2019 | \$443,271,463 | \$4,346,867 | \$447,618,330 | | | |
| 2020 | \$455,878,398 | \$4,403,376 | \$460,281 <i>,774</i> | | | |
| 2021 | \$476,245,315 | \$4,695,390 | \$480,940,705 | | | |
| 2022 | \$506,837,019 | \$4,756,430 | \$511,593,449 | | | |
| 2023 | \$519,498,435 | \$4,818,263 | \$524,316,698 | | | |
| 2024 | \$532,169,516 | \$4,880,901 | \$537,050,416 | | | |
| 2025 | \$551,287,048 | \$4,944,352 | \$556,231,400 | | | |
| 2026 | \$566,364,589 | \$5,008,629 | \$571,373,218 | | | |
| 2027 | \$ <i>574</i> ,913,468 | \$5,073,741 | \$579,987,209 | | | |
| 2028 | \$598,254,126 | \$5,139,700 | \$603,393,826 | | | |
| 2029 | \$606,212,263 | \$5,206,516 | \$611,418,779 | | | |
| 2030 | \$625,133,938 | \$5,274,201 | \$630,408,139 | | | |
| 2031 | \$634,458,678 | \$5,609,903 | \$640,068,581 | | | |
| 2032 | \$640,877,219 | \$5,682,832 | \$646,560,051 | | | |
| 2033 | \$647,268,310 | \$ <i>5,</i> 7 <i>5</i> 6,709 | \$653,025,019 | | | |
| 2034 | \$653,632,275 | \$5,831,546 | \$659,463,821 | | | |
| 2035 | \$659,969,415 | \$5,907,356 | \$665,876,771 | | | |
| 2036 | \$666,280,008 | \$5,984,152 | \$672,264,160 | | | |
| 2037 | \$672,564,311 | \$6,061,946 | \$678,626,257 | | | |
| 2038 | \$678,822,561 | \$6,140,751 | \$684,963,313 | | | |
| 2039 | \$685,054,979 | \$6,220,581 | \$691,275,560 | | | |
| 2040 | \$691,261,766 | \$6,301,448 | \$697,563,215 | | | |
| Total | \$15,818,060,863 | \$146,530,430 | \$15,964,591,294 | | | |

Sources: GDOT/Georgia Dept. of Revenue/GSFIC/ARC

MARTA

- As the largest transit operator in the Atlanta region, the Metropolitan Atlanta Rapid Transit Authority (MARTA) derives a bulk of its revenues from a 1-percent sales tax levied in DeKalb County, Fulton County, and the City of Atlanta as authorized by the State of Georgia. It must be noted that MARTA is the largest public transit agency in the US that does not receive significant funding from the state.
- After reaching a peak in the early part of the previous decade, MARTA sales tax revenues have declined precipitously due primarily to the current economic downturn. Sales tax revenue forecasts for MARTA are performed and released annually by Georgia State University's Fiscal Research Center which bases its assumptions on the anticipated economic outlook over a 30-year period. According to GSU, MARTA's 1-percent sales tax is forecasted to generate \$17.2 billion in revenue for the transit agency in the years 2012 2040, as shown in Table 10.

| Table 10 | : MARTA Sales Tax | c Revenues (\$000 | Os) |
|---------------------|--------------------------|-------------------|--------------------|
| Year | Net Sales Tax Revenue | Use Tax | Total (Nominal) |
| 2012 | \$316,765 | \$9,000 | \$325,765 |
| 2013 | \$326,667 | \$9,000 | \$335,667 |
| 2014 | \$337,989 | \$9,000 | \$346,989 |
| 2015 | \$350,714 | \$9,000 | \$359,714 |
| 2016 | \$368,325 | \$9,000 | \$377,325 |
| 2017 | \$388,336 | \$9,000 | \$397,336 |
| 2018 | \$398,170 | \$9,000 | \$407,170 |
| 2019 | \$406,487 | \$9,000 | \$415,487 |
| 2020 | \$426,572 | \$9,000 | \$435,572 |
| 2021 | \$452,087 | \$9,000 | \$461,087 |
| 2022 | \$476,336 | \$9,000 | \$485,336 |
| 2023 | \$509,689 | \$9,000 | \$518,689 |
| 2024 | \$525,564 | \$9,000 | \$534,564 |
| 2025 | \$537,519 | \$9,000 | \$546,519 |
| 2026 | \$548,251 | \$9,000 | \$557,251 |
| 2027 | \$271 <i>,</i> 759 | \$9,000 | \$580, 7 59 |
| 2028 | \$600,173 | \$9,000 | \$609,173 |
| 2029 | \$628,241 | \$9,000 | \$637,241 |
| 2030 | \$656,851 | \$9,000 | \$665,851 |
| 2031 | \$681,022 | \$9,000 | \$690,022 |
| 2032 | \$698,870 | \$9,000 | \$707,870 |
| 2033 | \$716,006 | \$9,000 | \$725,006 |
| 2034 | \$745,797 | \$9,000 | \$754,797 |
| 2035 | \$783,937 | \$9,000 | \$792,937 |
| 2036 | \$826,454 | \$9,000 | \$835,454 |
| 2037 | \$868,325 | \$9,000 | \$877,325 |
| 2038 | \$914,423 | \$9,000 | \$923,423 |
| 2039 | \$951,041 | \$9,000 | \$960,041 |
| 2040 | \$976,565 | \$9,001 | \$985,566 |
| Total (2012 - 2040) | \$16,688,935 | \$261,001 | \$17,249,936 |

Sources: Georgia State University Fiscal Research Center/ARC

Local

- County and local governments within the Atlanta region primarily fund transportation projects through two
 revenue sources: property taxes and sales taxes. Revenue generated by property taxes is more likely to fund
 maintenance and operations of existing infrastructure while sales taxes are more likely to fund new capacity
 projects. In counties and municipalities where there is no available funding source derived from sales tax
 revenue, property tax revenues may also be utilized to fund new capacity projects or capital improvements.
- In FY 2011, county and local governments within the 18-county Atlanta region have budgeted \$536 million for transportation purposes of which \$343 million being allocated for roadway maintenance, \$80 million being allocated for road safety and bike-ped projects, \$75.2 million being allocated for major capital projects, and \$32.3 million being allocated for local transit service (as shown in Table 11).

| Table 11: Local Transportation Funding in the 18-County Atlanta Region - FY 2011 | | | |
|--|-----------------------|--|--|
| Purpose | Amount | | |
| Agency Operations | \$200,335,272 | | |
| Traffic Services | \$11,807,198 | | |
| Rehab-Resurfacing | \$68,502,304 | | |
| Utilities-Street Lighting | \$8,815,230 | | |
| Traffic Operations | \$8,074,660 | | |
| Intersection | \$29,194,658 | | |
| Bridges-Culvert-Drainage | \$16,748,928 | | |
| Bicycle-Pedestrian | \$30,310,000 | | |
| Road Safety and Alignment | \$49,350,076 | | |
| Major Capital | \$75,172,830 | | |
| Local Transit | \$35, 7 31,165 | | |
| TOTAL | \$535,981,929 | | |

Source: ARC

- Preliminary forecasts for the total value of each of the 18 regional counties' property tax digests indicate that
 taxable property values will increase at an average annual rate of 2.7 percent over the course of Plan 2040,
 while sales tax revenue forecasts indicate that sales tax revenue will increase at an average annual rate of 4
 percent in the Atlanta region during the same period.
- A more modest average annual growth rate of 2.5 percent was used to forecast local sources of funding for transportation projects and services in the Atlanta region over the timeframe of Plan 2040 – resulting in \$22.8 billion in transportation funding from local sources in the years 2012 – 2040, as shown in Table 12.

Table 12: Forecasted Annual Transportation Funding by Regional County & Local Governments

| | Road | | | | |
|-------|---------------------------|---------------------------------|---------------------------------|-------------------------------|---------------------------------|
| Year | Maintenance & Improvement | Major Capital | Bike-Ped/Road Safety | Local Transit | Annual Total |
| 2012 | \$352,065,207 | \$ <i>77</i> ,052,1 <i>5</i> 1 | \$81,651,578 | \$33,156,670 | \$543,925,606 |
| 2013 | \$360,866,837 | \$78,978,455 | \$83,692,867 | \$33,985,58 <i>7</i> | \$557,523,746 |
| 2014 | \$369,888,508 | \$80,952,916 | \$85,785,189 | \$34,835,226 | \$571,461,839 |
| 2015 | \$379,135,721 | \$82,976,739 | \$87,929,819 | \$35,706,107 | \$585,748,385 |
| 2016 | \$388,614,114 | \$85,051,1 <i>57</i> | \$90,128,064 | \$36,598,760 | \$600,392,095 |
| 2017 | \$398,329,467 | \$87,1 <i>77,</i> 436 | \$92,381,266 | \$37,513,729 | \$615,401,897 |
| 2018 | \$408,287,703 | \$89,356,872 | \$94,690,797 | \$38,451,572 | \$630,786,945 |
| 2019 | \$418,494,896 | \$91,590,794 | \$97,058,067 | \$39,412,861 | \$646,556,618 |
| 2020 | \$428,957,268 | \$93,880,564 | \$99,484,519 | \$40,398,183 | \$662,720,534 |
| 2021 | \$439,681,200 | \$96,227,578 | \$101,971,632 | \$41,408,13 <i>7</i> | \$679,288,547 |
| 2022 | \$450,673,230 | \$98,633,267 | \$104,520,923 | \$42,443,341 | \$696,270,761 |
| 2023 | \$461,940,061 | \$101,099,099 | \$107,133,946 | \$43,504,424 | \$713,677,530 |
| 2024 | \$473,488,562 | \$103 , 626 , 576 | \$109,812,295 | \$44,592,035 | \$ <i>7</i> 31,519,468 |
| 2025 | \$485,325,776 | \$106,21 <i>7</i> ,241 | \$112,5 <i>57</i> ,602 | \$45,706,836 | \$749,807,455 |
| 2026 | \$497,458,921 | \$108,872,672 | \$115,371,542 | \$46,849,507 | \$768,552,641 |
| 2027 | \$509,895,394 | \$111,594,489 | \$118,255,831 | \$48,020,744 | \$787,766,457 |
| 2028 | \$522,642,779 | \$114,384,351 | \$121,212,226 | \$49,221,263 | \$807,460,619 |
| 2029 | \$535,708,848 | \$11 <i>7</i> ,243,960 | \$124,242,532 | \$50,451,795 | \$827,647,134 |
| 2030 | \$549,101,569 | \$120,1 <i>75</i> ,059 | \$127,348,595 | \$51, 7 13,089 | \$848,338,313 |
| 2031 | \$562,829,109 | \$123 , 179 , 435 | \$130,532,310 | \$53,005,91 <i>7</i> | \$869 , 546 , 770 |
| 2032 | \$ <i>57</i> 6,899,836 | \$126,258,921 | \$133,795,618 | \$54,331,065 | \$891,285,440 |
| 2033 | \$591,322,332 | \$129,415,394 | \$137,140,508 | \$55,689,341 | \$913 , 56 7, 576 |
| 2034 | \$606,105,390 | \$132,650 <i>,77</i> 9 | \$140,569,021 | \$ <i>57</i> ,081, <i>575</i> | \$936,406,765 |
| 2035 | \$621,258,025 | \$135 , 967 , 048 | \$144,083,247 | \$58,508,614 | \$959,816,934 |
| 2036 | \$636,789,476 | \$139,366,225 | \$1 <i>47</i> ,685,328 | \$59,971,329 | \$983,812,358 |
| 2037 | \$652,709,213 | \$142,850,380 | \$1 <i>5</i> 1,3 <i>77</i> ,461 | \$61,470,613 | \$1,008,407,667 |
| 2038 | \$669,026,943 | \$146,421,640 | \$1 <i>55</i> ,161,897 | \$63,007,378 | \$1,033,61 <i>7</i> ,858 |
| 2039 | \$685,752,617 | \$150,082,181 | \$159,040,945 | \$64,582,562 | \$1,059,458,305 |
| 2040 | \$702,896,432 | \$153,834,235 | \$163,016,969 | \$66,197,126 | \$1,085,944,762 |
| TOTAL | \$14,736,145,434 | \$3,225,117,611 | \$3,41 <i>7</i> ,632,595 | \$1,38 7 ,815,386 | \$22,766,711,026 |

Source: ARC

Summary

Table 13 provides a summary of the assumptions used for Plan 2040's financial forecasts.

| Table 13: Inflation, Debt Service, and Federal Funding Growth Assumptions for Plan 2040 | | | | |
|--|-----------------|--|--|--|
| Inflation (cost escalation) | | | | |
| FY 2012-2017 TIP | 4% | | | |
| Long Range | 2.39% | | | |
| GARVEE/GRB Debt Service (statewide) | | | | |
| from FHWA Apportionments | \$1,454,260,539 | | | |
| from State Fuel Taxes | \$1,030,790,942 | | | |
| GO Debt Service (from State Fuel Taxes) | \$2,221,768,512 | | | |
| Federal Funding Annual Growth Rates | | | | |
| FHWA Obligated Funding (FY 2012-2017 TIP) | 2.5% | | | |
| FHWA Obligated Funding (Long Range) | 1.2% | | | |
| FTA Formula Funding | 1.2% | | | |
| FTA Discretionary Funding | 1.3% | | | |

Table 14 illustrates the total amount of forecasted funding by source over the course of Plan 2040 - \$84.8 billion.

| Table 14: Total Forecasted Funding for Plan 2040 by Source | | | | | |
|--|------------------|-----------------|--------------------------|------------------------|------------------|
| Source | 2012-2017 | 2018-2020 | 2021-2030 | 2031-2040 | Total |
| FHWA | \$3,504,952,449 | \$1,945,560,441 | \$8,1 <i>57</i> ,628,912 | \$9,731,097,704 | \$23,339,239,506 |
| FTA Formula | \$719,522,166 | \$380,009,415 | \$1,372,058,536 | \$1,550,169,559 | \$4,021,759,676 |
| FTA Discretionary | \$252,488,290 | \$133,638,413 | \$484,055,927 | \$549,545, 7 15 | \$1,419,728,345 |
| State | \$2,327,128,880 | \$1,341,061,826 | \$5,606,713,840 | \$6,689,686,748 | \$15,964,591,294 |
| MARTA Sales Tax | \$2,142,796,000 | \$1,258,229,000 | \$5,596,470,000 | \$8,252,441,000 | \$17,249,936,000 |
| Local | \$3,474,453,571 | \$1,940,064,099 | \$ 7, 610,328,931 | \$9,741,864,441 | \$22,766,711,041 |
| TOTAL | \$12,421,341,355 | \$6,998,563,194 | \$28,827,256,147 | \$36,514,805,167 | \$84,761,965,863 |