

2030 Transit System Plan



hov



bus



paratransit



rail



**systemwide
mobility**



October 2006





LAND USE AND ECONOMIC DEVELOPMENT

1. Promote and facilitate transit-oriented development around DART transit facilities:

- Encourage initiatives to invest at or near transit facilities
- Provide information and technical assistance to member cities and the development community

2. Coordinate and promote integrated land use and transportation plans that maximize the use of transit:

- Encourage member city adoption of transit-oriented development policies and regulations

3. Provide improved transit access where warranted to promote economic development

4. Consider transit-oriented development potential in system expansion planning

5. Integrate transit service within transit-oriented developments:

- Facilitate enhanced linkages between developments and transit service
- Design stations with ability to accommodate transit-oriented development

6. Work cooperatively with member cities and NCTCOG to coordinate land use and transportation planning work programs and activities

4.0 Land Use and Economic Development

The DART mission is not only mobility-focused but also emphasizes quality of life and economic development. Transit, particularly the more frequent service and permanence associated with light rail, is known to have the ability to influence land use development patterns and create sustainable communities that drive less, use transit, and walk more. Overall, this development pattern can minimize environmental effects of sprawl and reduce energy consumption and vehicle miles of travel. This means less time in traffic congestion, a better environment for residents throughout the region, and enhanced sales tax and property tax benefits to DART and its member cities.

4.1 DART Initiatives

DART's role in land use and economic development is threefold: to educate, facilitate, and coordinate. These efforts are done with both the public and private sectors to create transit-oriented development (TOD) and promote a more sustainable growth pattern. DART initiatives and activities are described below.

4.1.1 Education

Transit-oriented development is generally defined as development within one-half mile of a transit station that is dense, diverse, and livable – emphasizing pedestrians and transit, yet accommodating the automobile. The result is a compact growth pattern that improves livability, is efficient and cost-effective for individuals, communities and the region, and improves the environment.

DART has a Transit-Oriented Development Program designed to promote this type of land use. The DART Transit-Oriented Development Guidelines are intended to educate both the public and private sector on the benefits and characteristics of TOD and provide guidelines on how such development can be integrated with the DART transit system.

DART, including its member cities and project developers, has been recognized nationally and is increasingly involved in national-level tours and workshops to showcase local success stories and lessons learned. Many of these same events are held at a local and regional level to promote TOD and highlight economic development opportunities in areas such as the Dallas southern sector.

4.1.2 Facilitation

DART has been very active in facilitating transit-oriented development since the advent of light rail. This facilitation can take the form of accommodating direct connections from rail stations to adjacent developments to seeking out development proposals on DART-owned property. Strategically pursuing TOD opportunities achieves a higher and better use of land that can benefit DART in terms of increased ridership and revenue and benefit the developer in terms of higher property value due to enhanced transit access. One of the first development proposals facilitated on DART property is to redevelop surface parking lots at Mockingbird Station into a higher density, mixed use development that incorporates a parking structure for DART park-and-ride customers. In the future, DART will design stations at the outset to accommodate future development.

DART also works in partnership with member cities and developers to seek out and secure grants that may be available for TOD projects.

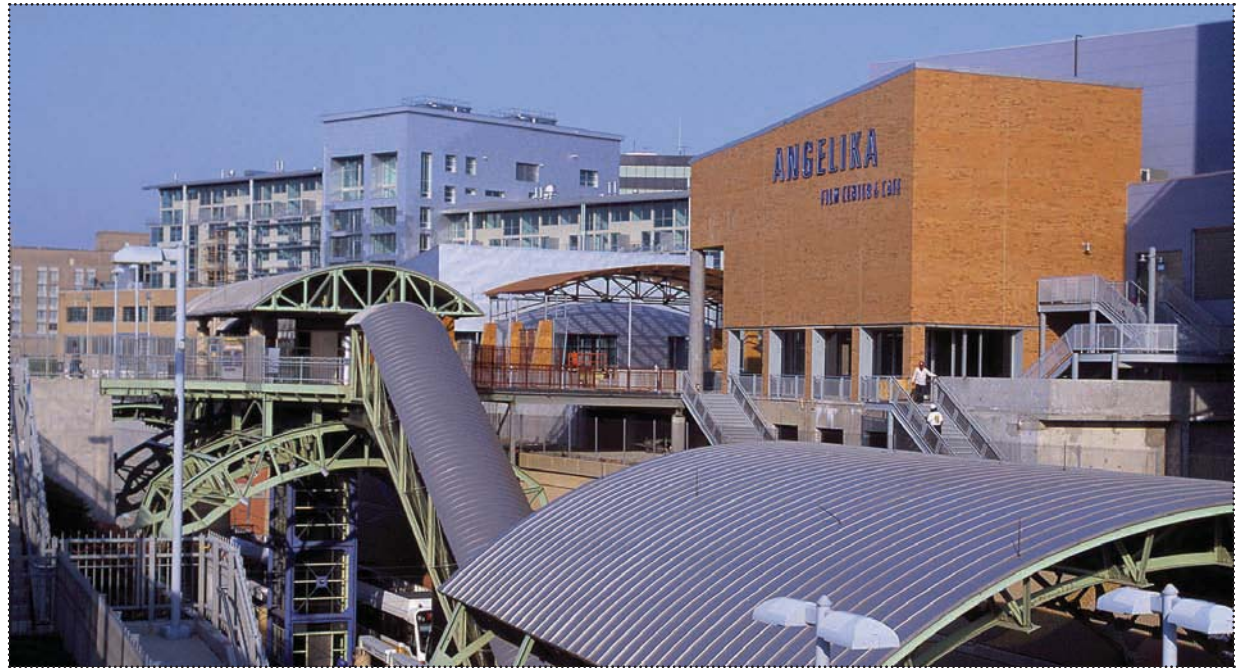
4.1.3 Coordination

While DART is not responsible for land use planning, it does support and coordinate transit-supportive land use planning and works closely with member cities to coordinate planning efforts to maximize opportunities for transit-oriented development. This is done through coordination, review, and support of member city comprehensive or specific area plans and working with member cities to develop comprehensive approaches to planning for, accommodating, and funding TOD. In addition to long-range planning, DART works with member cities to ensure phased implementation of bus transit to serve new developments and activity centers.

Land use plans are a critical element in transit corridor planning, especially in corridors that are pursuing more costly, high-capacity transit improvements. In many cases, DART seeks discretionary federal funds from the Federal Transit Administration (FTA), which evaluates how well corridor land use will support proposed transit investments as part of its funding decision. Given this emphasis on transit supportive land use, DART participates regularly in FTA land use policy development.

Demographics

For the 2030 Transit System Plan effort, DART used approved regional demographic forecasts developed by NCTCOG. These forecasts were also used for the development of the regional Metropolitan Transportation Plan (MTP). Projects recommended by DART must be included in an adopted and conforming MTP to be eligible for federal funds. As



Mockingbird Station is a nationally recognized example of a mixed-use transit-oriented development.

part of a coordination effort with the City of Dallas comprehensive plan, as well as to understand how changed development patterns can effect investment decisions and transit demand, DART conducted sensitivity tests as part of the 2030 Transit System Plan effort. This analysis used an alternative development scenario developed by the City of Dallas during their Comprehensive Plan effort. NCTCOG also tested alternative development scenarios within the framework of the Metropolitan Transportation Plan and Vision North Texas effort. The results of these sensitivity tests are discussed in Section 4.3.2.

4.2 Member City Initiatives

DART member cities lead efforts relative to land use planning, zoning incentives, and specific initiatives for funding infrastructure improvements. With the

success of the DART light rail system, most member cities are actively involved in TOD planning. They have incorporated transit supportive policies in their comprehensive plans to promote transit-oriented development through zoning, shared parking, pedestrian access and amenities, and other related policies.

4.2.1 Transit-Oriented Development

Several DART member cities have targeted station areas for strategic, transit-oriented development. These strategic initiatives are focused on taking advantage of the existing rail system, as well as preparing for new rail corridors that will open during the 2010-2018 timeframe. The 2030 Transit System Plan also presents strategic opportunities for transit-oriented development along future transit corridors.



Downtown Plano continues its revitalization since the advent of light rail service.

Existing and Planned System

There are a number of successful transit-oriented developments along the existing 45-mile DART transit system. The first four transit-oriented developments were Mockingbird Station, South Side on Lamar at Cedars Station, Downtown Plano, and Galatyn Park. Since the benefits of light rail in Dallas were relatively unknown at the time the rail system was planned, developments on the first 20-mile light rail Starter System (Mockingbird and Southside) were not planned until the rail system was under construction or already in operation. Learning from this experience, developers and cities planned for TOD in advance of rail construction. All of these projects have received national recognition and have led member cities such as Carrollton, Dallas, Farmers Branch, Irving,

and Rowlett to start planning for transit-oriented development well in advance of the next expansion phase. For example, both Carrollton and Farmers Branch have developed TOD plans for stations along the Northwest Corridor, ensuring that they capitalize on the benefits that light rail will bring when service begins in 2010. Transit-oriented development around the Addison Transit Center continues to grow in anticipation of future east-west rail and reflects the importance of strategically located bus transit centers in helping to support mixed-use development.

Strategic Opportunities through 2030

Rail and bus corridors in the 2030 Transit System Plan and Vision element of the plan present significant opportunities to jointly plan transit and land uses to maximize economic development potential



MEMBER CITIES PLAN AHEAD

DART is generating excitement among local cities, developers and the public and the Northwest Corridor expansion project into Carrollton, Farmers Branch and Irving is no exception.

The City of Carrollton launched its first DART transit-oriented development with the purchase of a Home Depot and some adjacent property near the future Trinity Mills Station. The city plans to lease the property and later work with developers to transform the tract into a mixed-use district that could include office buildings, high-end multifamily housing, hotels, pedestrian-friendly retail and entertainment, and community amenities.

Carrollton also is mapping out development plans at the site of the future Downtown Carrollton Station on Belt Line Road near IH 35E and the city's Old Downtown area. City planners envision the revitalization of Old Downtown with a mix of high-density business and residential development stretching from the station. The city expanded the transit impact zone from 100 to 300 acres and implemented a new tax increment financing district to attract residential, retail and commercial projects.

The Dallas Stars have a Dr Pepper StarCenter near IH 35E and Valley View Lane in Farmers Branch, an area targeted for redevelopment to capitalize on DART Rail. The 95,000-square-foot facility includes two regulation-size hockey rinks and a second level that can double as a conference center. The City is also actively planning and looking at proposals to develop the land abutting the planned Farmers Branch Station. Many City Council members have weighed in saying that they will promote and encourage transit-oriented development on the site through a public-private partnership.

A land-use plan for Irving has integrated DART Rail into a corridor extending from the area near Texas Stadium north through the Las Colinas Urban Center. The plan anticipates transit-oriented mixed-use development around each of the rail stations in the corridor. A key element to support transit-oriented development, transit system ridership, and circulation within the Las Colinas Urban Center is to connect DART Rail with the Las Colinas Area Personal Transit (APT) system. To support these planning efforts, Irving hosted a technical advisory panel in 2004 from the Urban League Institute to help identify transit-oriented development options.

and programs associated with the 2030 Transit System Plan.

5.4.1 Risks and Opportunities

While DART’s long-range financial plan presents a most likely scenario for the next 20 years based on currently available data, there are significant risks inherent in long-range forecasting. Key risks and opportunities that can effect future financial capacity are described below.

Sales Tax – DART’s sales tax forecast is perhaps the most critical element of the long-range financial plan. The projected, compounded growth rate for sales tax is approximately 5 percent, a conservative growth rate when compared with local economic forecasts. Small shifts in the sales tax rate can have significant long-term effects on the plan. For example, a reduction in sales tax growth in the first year of the plan from 4 percent to 3 percent would cost DART about \$200 million in net available cash over 20 years. On the positive side, higher than expected growth in sales tax (from a faster growing economy, from a larger service area, or from an expanded sales tax base) could increase financial capacity for higher system growth or new capital projects. Sales tax collections for FY 06 have been trending above budget.

Furthermore, positive legislative changes could potentially boost DART’s base collections.

Service Area Growth – The DART Service Area can grow in the future if additional cities vote to join DART. However, the availability of a full one-cent of sales tax capacity is an obstacle for many cities. Expansion of the DART Service Area would increase sales tax revenue, which could result in additional programs and the acceleration of construction schedules.



Transit-oriented developments such as Mockingbird Station not only enhance DART member city property taxes but also increase DART sales tax revenue, the agency’s primary funding source.

However, the advantages of new revenue would be weighed against the increase in capital and operating costs associated with providing transit service into new areas.

Regional Transit Initiative outcomes could either have a positive or negative impact on DART. A new regional authority might require a tax restructuring, which could benefit DART. It also might provide DART with increased ridership (and therefore revenue) as other areas currently without transit connect with our services. However, that additional ridership could require additional capital and/or operating costs to accommodate increased demand. It could also create a risk that DART will receive a lower percentage of federal funding that is allocated to this region because it will now be spread among more entities.

Federal Funding – While DART’s assumptions on the amount of federal funding that will be received are conservative, federal funding for transit (formula and discretionary) is always subject to reduction or reallocation. Over the 20-year period, DART assumes receipt of over \$1.9 billion in federal funds. If these funds were reduced, DART would be faced with reductions in operating costs, capital programs, delays in construction schedules, or a combination of all three.

Capital Costs – Even assuming accurate cost projections for defined capital components, the risk of increasing capital costs can jeopardize the long-range financial plan. DART’s financial plan, including capital cost estimates, is presented in inflated or year-of-expenditure dollars. Certain costs and revenues may, however, inflate at different rates. Higher than



FIGURE 6-1
2030 Transit System Plan

- Light Rail Blue Line & Station (Existing)
- Light Rail Red Line & Station (Existing)
- Trinity Railway Express (TRE) Commuter Rail & Station (Existing)
- Light Rail Orange Line & Station (Committed)
- Light Rail Green Line & Station (Committed)

2030 Rail

- Express Rail
- Rapid Rail

2030 Bus

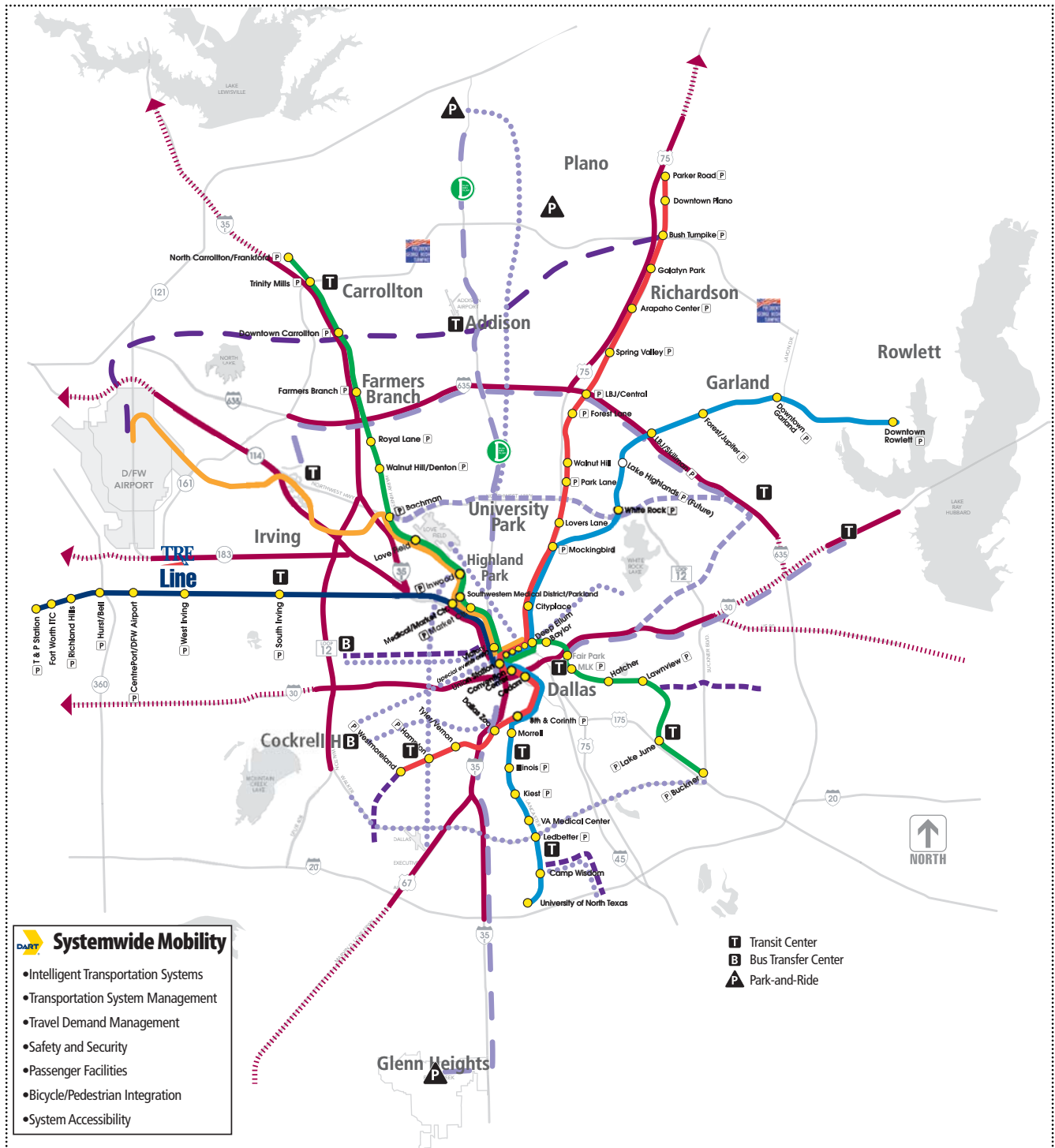
- Express Bus
- Enhanced Bus
- Rapid Bus

2030 Managed HOV Lanes

- DART Participation
- No DART Participation

2030 Paratransit (service provided systemwide)

2030 Systemwide Mobility



DART Systemwide Mobility

- Intelligent Transportation Systems
- Transportation System Management
- Travel Demand Management
- Safety and Security
- Passenger Facilities
- Bicycle/Pedestrian Integration
- System Accessibility

- Transit Center
- Bus Transfer Center
- Park-and-Ride

6.4.7 Vision Corridors

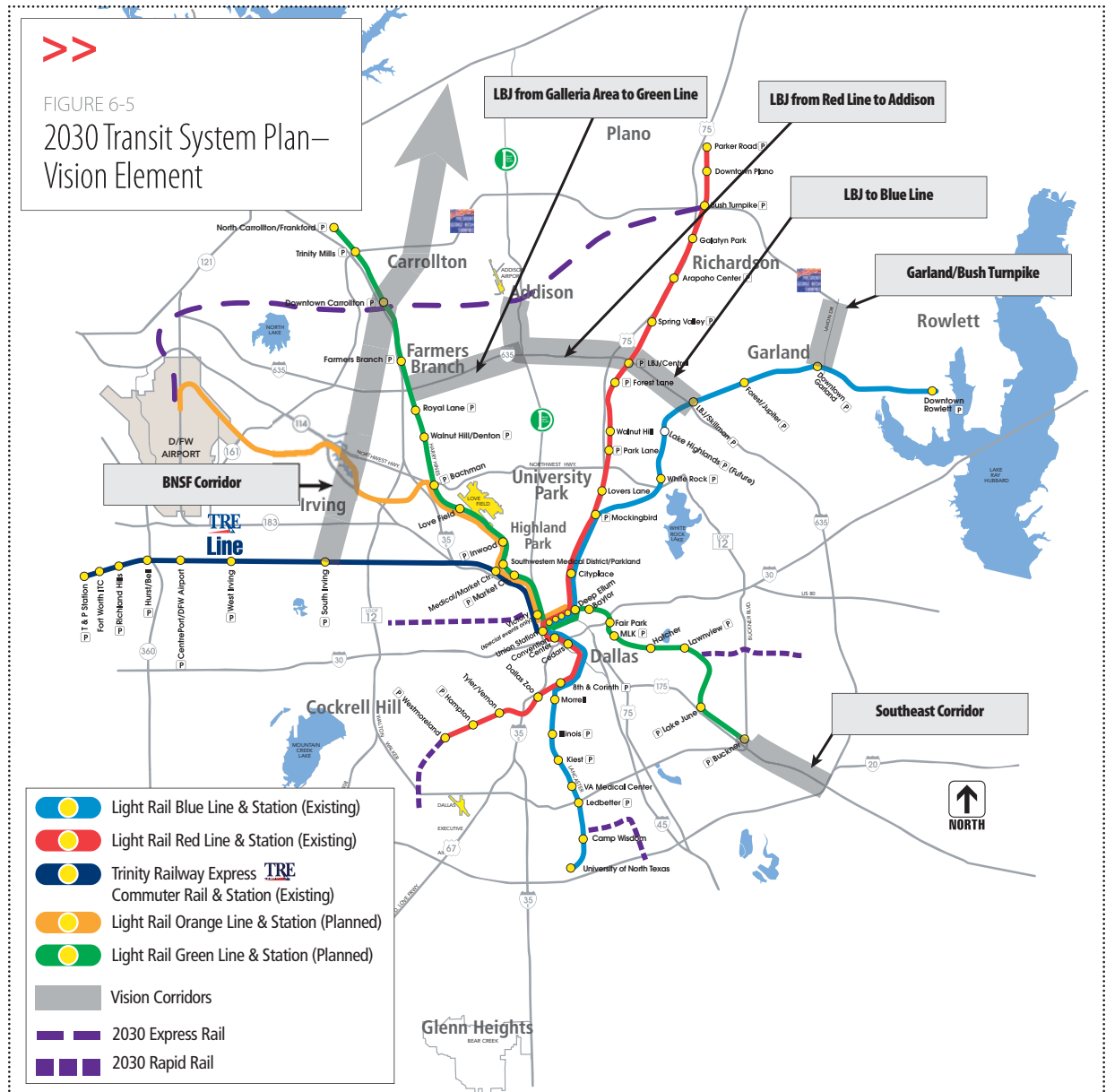
In addition to recommended rail corridors, several potential corridors within the DART Service Area are identified in the Vision Element (see Figure 6.5). These vision corridors may be candidates for future rail, or it may be that another mode is more suitable (bus, shuttle). Each of these corridors is discussed below, including actions that would make a rail investment potentially warranted.

LBJ/Inwood Corridor

This corridor has significant ridership potential given that it provides access to a dense employment corridor that also is one of the most congested freeway facilities in the state. The alignment for the LBJ/Inwood corridor is not specifically defined at the system plan level due to the range of possible variations. However, it would generally connect the existing Red Line in the vicinity of the LBJ/Central Station (or some point to the south) to the Addison Transit Center. The alignment could be within the LBJ freeway corridor for a portion of its route until it turns north in the vicinity of the Galleria and Dallas North Tollway. Given right-of-way constraints within the LBJ corridor, a tunnel configuration may be necessary unless other non-freeway street, utility and/or private rights-of-way can be used. It is recommended that this corridor be reassessed for inclusion in the next transit system plan.

LBJ Corridor Extension to Blue Line

The LBJ/Inwood Corridor from the Red Line to Addison Transit Center was also evaluated to the Blue Line, including being interlined with the Blue Line further east to Garland. The majority of transfer activity with the transit network occurs with the





The Trinity River Corridor project includes several area land-use plans to take advantage of the improvements associated with the project. This map depicts concepts for the La Bajada area of West Dallas, which is within the West Dallas Vision Corridor of the DART 2030 plan.

Red Line. While there is additional demand further east into Garland, this can be addressed by bus service within the LBJ managed HOV lanes. During subsequent studies for the LBJ/Inwood Corridor it is recommended that the feasibility of not precluding this extension be addressed.

LBJ Corridor from Galleria area to Green Line

While not evaluated in the 2030 Transit System Plan effort, it is recommended that an extension west of the Dallas North Tollway, from the Galleria area to the Green Line, be considered during the next system plan update to provide additional east-west capacity in this congested corridor.

Southeast Corridor Extension to IH 20

By 2010, DART will have light rail service to Buckner Boulevard in the Southeast Corridor. An extension of this corridor to the IH 20 area was evaluated in the 2030 planning effort but did not have ridership and cost-effectiveness commensurate with other recommended corridors. The performance of this corridor did improve under sensitivity tests conducted using the City of Dallas land use vision scenario (see Chapter 4). It is recommended that land use changes and public input be monitored in this corridor, and that it be reassessed in future updates when new regional demographics are available.

Garland/Bush Turnpike Corridor

This corridor represents an extension from the Downtown Garland Station to the President George Bush Turnpike near Firewheel Center, along the Kansas City Southern (KCS) railroad or SH 78 corridor. A rail extension in this corridor would require that an additional Blue Line be operated from the Firewheel area to downtown Dallas, or that it be part of an east-west LBJ rail corridor. The first option would result in two branches of light rail from Downtown Garland. As capacity needs on the Blue Line increase, there may be a need to add frequency. DART will continue to monitor this need, and if warranted, an additional branch to this area could be considered.

BNSF Corridor

The BNSF Corridor extends from the South Irving Station on the TRE line to the future Downtown Carrollton Station, continuing north into Frisco. The TRE and the City of Dallas own the corridor from south Irving to downtown Carrollton. The BNSF Corridor has the potential to serve areas such as Mercer Crossing, Las Colinas and south Irving. NCTCOG evaluated passenger rail for the section north of downtown Carrollton in the Regional Rail Corridor Study (see section 6.4.8). Implementation of rail in this corridor is closely tied to regional rail needs and passenger demand south of Carrollton toward Irving and Dallas. Passenger service in this corridor will continue to be evaluated in future system plan updates and monitored as regional rail discussions continue. Connections to this potential rail corridor are reflected in both the Downtown Carrollton Master Plan and the DART Northwest Corridor Irving/DFW light rail expansion project.