Pioneer Valley Transit Authority and Springfield Redevelopment Authority

Redevelopment Plan for the Union Station Intermodal Transportation Facility

Springfield, Massachusetts

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HDR

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1 EXECUTIVE SUMMARY

EXECUTIVE SUMMARY

This Redevelopment Plan is the culmination of a year-long effort by the Pioneer Valley Transit Authority and the Springfield Redevelopment Authority and its consultant, HDR, to discover and advance a fresh approach to the redevelopment of Springfield's Union Station. The funding for this Plan was provided by the Massachusetts Executive Office of Transportation (EOT).

Once a thriving railroad hub, the station has been vacant for more than 30 years. Past efforts to redevelop this facility were not successful due to for a variety of reasons, but the common denominator was that the plans were not based on market realities. This Redevelopment Plan takes a grounded approach based on well-defined objectives, available funding, economic viability and the realities of the real estate market, and recommends a framework for success which meets these criteria.

Redevelopment Plan Objectives

- Create a 21st Century transit facility that enhances regional mobility
- Maximize the multimodal transportation attributes of Union Station
- Improve access and connectivity to public transportation
- Adaptively reuse and preserve an important historical structure
- Revitalize the property with viable transit and transit-oriented uses
- Ensure that capital improvements are feasible and ongoing operations sustainable
- Spur local area economic development over the longer-term

Existing Site – The Redevelopment Plan (the "Plan") encompasses the existing Union Station parcel and the former Hotel Charles site - the entire block from Main Street to Dwight Street and from the present Amtrak Station to Frank B. Murray Street. The existing Station is comprised of two landmark structures both built in 1926: 1) the 120,000 sq. ft. three-story Terminal Building; and, 2) the 92,600 sq. ft. two-story Baggage Building.

Transit Providers – The Plan incorporates the program needs of multiple transit providers:

- Pioneer Valley Transit Authority (PVTA) – local and regional bus service
- Intercity Buses – Peter Pan and Greyhound
- Amtrak – national passenger train service
- Commuter Rail – planned for future

Planning Process – The planning process began with a review and update of the documents prepared in the prior planning effort, including transit providers' input on space and operational needs; market conditions, non-transit tenant potential; and physical solutions and associated development and operating costs. Over 15 possible development scenarios were explored, and tested for physical "fit", a sense of place, design and construction costs, operating viability, and proforma feasibility. Three viable options emerged, of which one was recommended as it met all the program requirements of a intermodal transit center in the most cost-effective manner. "Option One" forms the basis of the Redevelopment Plan. The two other options are viable but do not achieve all the program requirements. One leaves the intercity buses at the current Peter L. Picknelly Transportation Center ("Picknelly Terminal") location; and the other requires the acquisition of the 30 Frank B. Murray Street parcel. These two options are either less functional or cost effective than Option A.

Redevelopment Scenarios – All three options include the following components:

- Restoration and reactivation of the Terminal Building with: approximately 33,000 sq. ft. for PVTA, Amtrak, commuter rail and intercity bus operating facilities; 55,000 sq. ft. of transit-related retail and office space, including day care, PVTA administrative offices and a transportation conference center; and, 35,000 sq. ft. of commercial "Opportunity Space" for future economic development
- Removal of the Baggage Building and construction of a new 70,000 sq. ft. bus terminal with 23 bays, and, above it, a two-level 139,000 sq. ft., 400-space parking garage connected to the Terminal Building for transit and public parking
- Reopening of a 6,300 sq. ft. passenger tunnel providing a safe, walkable connection from the Terminal Building to the Amtrak Station and platforms, and Lyman Street
- ADA upgrading of rail platform for Amtrak and future commuter rail service

Capital Costs, Annual Cash Flow and Funding – The capital cost of the recommended option is estimated at approximately $65.2 million (in 2010 dollars). A major portion of this cost ($61.2 million) is for the transit related facilities and parking structure. The remainder ($4 million) is for tenant fit-out of the "Opportunity Space" (non-transit retail and office rental space). An estimated $65.2 million of funding is projected to be derived from:

• FTA Contracts and Earmark Grants	$25,957,722
• EOT Match – FTA contracts and Earmarks Grants	6,489,431
• State Transportation Bond – Contract Balance	3,750,000
• State Transportation Bond – Earmarks	7,250,000
• A&F Off-Street Parking Grant	7,700,000
• Commuter Rail Funds	10,000,000
• Loans (for Opportunity Space build-out)	4,100,000

A fully occupied Option One is expected to generate an annual revenue budget of approximately $1.9 million of which $1.5 million is associated with the transit related operations and $400,000 from the Opportunity Space. The total annual operating cost is estimated at approximately $1.5 million. A net balance of about $400,000 would generate enough cash flow to cover the debt service of the $4.1 million financing needed to build out the Opportunity Space.

Ownership – This report recommends that a public entity serve as the project sponsor and oversee the financing, planning, design, construction and startup of the Union Station Intermodal Transportation Center and hold ownership of the physical assets. It is anticipated that the public entity would be formed as a "partnership" between PVTA and SRA.

Implementation – The key steps going forward include:

- Review and approval of the Plan by FTA/EOP
- Determine and establish ownership entity to oversee development and operations
- Procure project management team and architecture/engineering services
- Negotiate lease agreements with transit and other key tenants
- Finalize funding arrangements
- Market the retail and opportunity spaces
- Establish the construction delivery approach and procure the contractor
- Procure property management services
- Design, build and commission (review and test building operating systems)

Construction Schedule – Phase A, which includes the bus terminal and parking garage construction, and the Terminal Building improvements, would be completed by June 2011. Phase B, which includes the train tunnel reopening and train platform ADA improvements, as well as the Opportunity Space build-out, is estimated to be completed four months later, depending on funding and leasing progress.

2 INTRODUCTION

INTRODUCTION

This Report presents a plan and strategy for redeveloping Springfield's Union Station into an intermodal Transportation Center. Repositioning the structure to serve this new and expanded function, the Redevelopment Plan also addresses the preservation of the Terminal Building's architectural and historical features, and serves as a catalyst for the revitalization of the surrounding neighborhood. The Plan is the result of a year of study and planning by a Project Team comprised of a Redevelopment Committee (the "Committee") led by the Pioneer Valley Transit Authority (PVTA) and the Springfield Redevelopment Authority (SRA), and HDR serving as the architectural, planning and economic feasibility consultant. The process was managed by the Springfield Business Development Corporation.

Station History

The existing Union Station is comprised of two adjacent and connected landmark structures in downtown Springfield – the 120,000 sq. ft. three-story Terminal Building and the 92,600 sq. ft. two-story Baggage Building situated on over two acres of land. Both structures were built in 1926 by the Boston and Albany Railroad. The station served an important role in WWII, transporting soldiers and munitions. In its heyday, more than 130 passenger trains and 100 mail trains used to pass through the station daily. Then in the 1950s, air travel gained popularity and the number of rail passengers began to decline. As the financial situation took its toll on railroads in the 1970's, Union Station fell into disrepair and was eventually condemned. In the early 70's, Amtrak initiated intercity passenger service and subsequently constructed a small modest facility accessible from Lyman Street. The vacated Union Station complex has been owned by the Springfield Redevelopment Authority since 1989.

Plan Objectives

- Create a 21st Century transit facility that enhances regional mobility
- Maximize the Intermodal transportation attributes of Union Station
- Improve access and connectivity to public transportation
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- Ensure that capital improvements are feasible and ongoing operations sustainable
- Spur local area economic development over the longer-term

Planning Approach

The HDR Project Team focused on three areas of investigation:

- Site planning, physical, design and capital development/operating cost elements:

  This work included on site observations of the property and improvements and a review of all related planning, design, environmental and other available documentation; and the development and evolution of plan concepts and design alternatives based on the work emerging out of the other two areas of investigation plus review meetings with the Project Team and other stakeholders. Concept plans were accompanied by continually evolving capital development and operating cost estimates. The recommended Redevelopment Plan drawings are shown in Appendix A: Redevelopment Plan Drawings.

- Transportation facility needs programming and planning:

  This work involved reviewing the service plans and needs (present and projected) of the key probable transportation providers (PVTA, Intercity bus, Amtrak, Commuter Rail); interviewing them for operational details and further clarifications as to program needs, such as bus berths, train platforms, parking, ticketing, waiting and administrative; and obtaining their input on alternative concept plans. Key transportation findings are summarized in Appendix B: Transportation Services Findings.

- Market analysis, financing analysis and economic feasibility modeling:

  This work involved the real estate and economic development review of the site and Springfield's market conditions, including review of recent and ongoing economic, demographic and market data indicators and studies, prevailing real estate market conditions, and interviews with real estate brokers, potential users, developers, economic development officials and other local market area participants.

  The information gathered was used to develop assessments of probable users and types of demand for space at the facility and realistic market rents. In addition, development proformas were modeled to achieve a mix of uses compatible with the projected market environment that would yield financially feasible project given the targeted funding sources and ongoing operating costs. The relevant results of this analysis and process are contained in the body of this Final Report. Appendix C: Real Estate Market Characteristics Summary.

Planning Process

The Study process began with a comprehensive review of the previous work products and plans prepared during the prior project planning and development effort that ended in 2006 and an assessment of current real estate conditions. The earlier plan (which featured an

elaborate elevated bus way structure and a complete restoration of both the Terminal and Baggage Buildings) left unresolved many cost, legal and market issues that needed to be readdressed in this current planning effort. All of these issues were revisited with the emphasis on confirming and updating each potential transit provider's space and operational needs; assessing current and projecting near-term market conditions, rents and non-transit tenant potential; and preparing physical solutions and the associated capital development and operating costs. Through a reiterative process between HDR and the Committee members, a total of more than 15 possible developments scenarios were explored. The more promising options were tested in greater depth for physical "fit", a sense of place, capital development reality, operating viability and proforma feasibility.

In the end, three options emerged as finalists, which were further narrowed down to a single recommended scenario, Option One which forms the basis of the proposed Redevelopment Plan. The two other options are viable but do not achieve all the program requirements. Option Two leaves the intercity buses at the current Picknelly Terminal location; and Option Three requires the acquisition of the 30 Frank B. Murray Street parcel to make it work. While these two options are either less functional or cost effective than the recommended solution, either could be implemented as an alternative to Option One.

Planning Assumptions

The sections that follow first detail the evolution of the recommended Plan that has emerged; and the costs associated with developing and operating the resulting project on a sustained, ongoing basis. This discussion is followed by the Project Team's conclusions as to the best way in which the project should be sponsored, owned, managed and funded. The conclusion outlines the next steps needed to move the project forward to reality.

Several important assumptions should be noted with respect to project implementation:

- The Plan and resultant project budgets are predicated on the assumption of occupancy in the Intermodal Transportation Center by all of the key transit operators in the City, i.e., PVTA, Peter Pan and Amtrak, and the future Commuter Rail).

- The redevelopment operating plan assumes each of the above transportation providers will, in return for the improved facilities and resultant benefits gained from presence in the Intermodal Transportation Center, provide annual operations funding commensurate with its occupancy and benefits.

- The project's ongoing operational sustainability is also predicated upon early up front commitments from public agencies and other entities, of a significant amount of space not occupied by the key transit operators. This is necessary to assure balancing the ongoing annual building operations budgets.

Like any major real estate development projects, these assumptions and the project funding sources need to be fully tested and confirmed amongst the PVTA and SRA, and the proposed occupants of the future Union Station Intermodal Transportation Center and adjusted iteratively based on their responses.

3 REDEVELOPMENT PLAN

REDEVELOPMENT PLAN

Physical Plan

- The Redevelopment Plan (the "Plan") encompasses the existing Union Station parcel and the former Hotel Charles site - the entire block from Main Street to Dwight Street and from the present Amtrak Station to Frank B. Murray Street. (See Appendix A: Option One - PVTA/Intercity Bus Berths) and includes the following components:

- *Restoration of the Terminal Building and its Central Hall:*

  This facility would be the focal point of the Intermodal Transportation Center. Its ground floor would be used primarily by Amtrak, Commuter Rail, PVTA, and Intercity bus operators for ticketing, baggage, and other operations; while passengers would be accommodated with a variety of waiting areas, eating, drinking and retail opportunities. Some ground floor space would also be utilized for rental car, airport shuttle, taxi and other transportation operators. Additional space would be available for appropriate retail uses, such as a pharmacy. The upper office oriented levels of the Terminal Building would be targeted at transportation and public related users.

- *Reopening and restoration of the Passenger Tunnel to Lyman Street:*

  The tunnel would be reopened and restored, enabling free and inviting flow from the activities at the Union Station Building south to the Amtrak/Commuter Rail platforms and onwards towards the center of Downtown Springfield.

- *Demolition of the Baggage Building and its replacement with a Bus Terminal and Public Parking Garage: (see Appendix A: First Floor Plan and Section drawing)*

  The new Bus Terminal would contain 23 covered bays (with four future expansion bays along Frank B. Murray Street), this being sufficient capacity to cover all anticipated needs for both PVTA and Intercity bus operations for the next 20 to 30 years. A 400 space, two level, public parking garage would be built above this terminal with its lower level being used by the transportation providers, passengers and general public, while the upper level would be primarily oriented towards the office tenants occupying upper floors of the Union Station Building and would be directly connected to it. The Main Street and Frank B. Murray corner of this combined Bus Terminal and parking garage structure would be wrapped with ground floor retail allowing opportunities for several small, street oriented retailers.

  The reuse of the existing Baggage Building was a goal of the planning process. The early development scenarios incorporated the Building in the physical plans and associated development and operating costs estimates. As the planning process progressed it became evident that the reuse of the Baggage Building was not viable for the following reasons:

1) The configuration and size of the building did not "fit" the space program requirements of any of the transit providers. For example, the building's floor size and column locations impeded its use for bus berthing or as a parking garage.

2) The use of the building for commercial or residential purposes was not economically viable given the local real estate market. (See Appendix C: Real Estate Market Characteristics Summary)

3) The cost to stabilize the building's infrastructure and exterior envelope was estimated to be over $9.0 million, which did not include the additional cost of building-out the interior of the building for reuse.

Design Options

Three viable plan options were developed. The recommended option has been labeled "Option One". This option met all the program requirements of a transit center in the most cost-effective manner. "Option Two" is similar to Option One with one main exception, the Intercity bus operations remain at the Picknelly Terminal on Main Street across from Union Station. This option is also less expensive than the recommended Option One, but fails to consolidate all transportation modes in a single facility. "Option Three" is also similar to Option One except it includes the land at 30 Frank B. Murray Street, a parcel which would improve bus circulation and add parking spaces but at a cost premium.

The Redevelopment Plan is presented in graphic form in Appendix A.

4 IMPLEMENTATION: OWNERSHIP AND FINANCING

IMPLEMENTATION: OWNERSHIP AND FINANCING

Throughout the 12 month project planning process, a cardinal principle has been to develop a project concept that reflects three primary requirements:

- Fully meeting the transit objectives
- Affordable using available funding sources
- Operate on an ongoing sustainable basis

The Redevelopment Plan described in the previous section meets these requirements.

This section describes how the Plan can be implemented and financed. In the course of the planning process, numerous financing and project delivery methods were considered and tested against market conditions, cost/revenue structures and the risk/reward expectations of different types of possible development partners. The Project Team recommended public ownership over private ownership for the following reasons:

- Project is not financially feasible for a private developer to undertake and sustain on an ongoing basis. Its complexity and the weak real estate market offer no potential profitability to a private developer.
- The limited financial return detrimentally impacts the ability of this project to attract private sector competition for selection as the project developer.
- Not having a highly competitive developer procurement process will put the public sector at a disadvantage in achieving value for its investment and also effectively eliminates the transfer of risk to the private sector.
- Primary project focus is on the transportation attributes of the property revitalizing an important landmark building with viable transit and transit-oriented uses.
- Public sources are providing over 90 percent of the capital funding.

This recommendation then sets the stage for the financing and operations plan. Accordingly, ownership is discussed first, and then the accompanying financing concept.

Recommended Ownership Arrangement

HDR recommends that a Public Entity (the “Entity”) sponsor and oversee the planning, development and financing of the Union Station Intermodal Transportation Center and own the physical assets. These would include the Terminal Building, the bus berths, the parking garage above, and the tunnel to the Amtrak station. Only if and when appropriate or opportunistic conditions emerge in the future, would ownership interest in all or parts of the

complex could be sold and conveyed to other parties, subject to any restrictions placed on such disposition by rules of the federal and state funding agencies.

The Entity should be an ownership structure sufficiently flexible to be responsive to any governance and ownership requirements needed to enable the project to satisfy all funding requirements for continued control of the facilities developed with public funds and, if possible, to qualify for the various tax credits and other financial tools identified in the financing plan set out in the succeeding section.

Initially, immediate project start-up activities over the coming three to four months (including, for example, refinements of the Plan, submission of funding applications, negotiation of occupancy agreements, legal organization, procurement of design and development services) could be undertaken by designated staff members of the current lead agencies (PVTA and SRA) and consultants procured by them. Once the legal entity structures and ongoing funding plan for the Project were formulated and implemented, it is anticipated that the Entity would procure private sector services, on a contractor basis, for all, or most, of the major aspects of project execution. These would be expected to include planning, design, engineering, legal, development, construction, construction management, and operations and property management services. Procurement of these services would be expected to be initiated over the next year. Since the choice of and details of a particular project delivery method have not yet been resolved, the issue remains open as to the timing, sequencing and packaging of these procurements (e.g. would it be a single “design-bid-build-operate” procurement; or the construction management at risk method.).

Regardless of the final choice of project delivery method, the Entity would be anticipated to own the total facility and oversee its overall development, operations and operating standards, and, at an appropriate time, contract with a management entity to execute this ongoing management role. As is typical in large enclosed mall regional shopping centers, it is entirely possible that certain portions of the facility could be leased to specific transit operators and tenants who would then have defined operational responsibilities for certain services within their physical areas of occupancy. These could include the bus station in its entirety (or perhaps bays and certain waiting areas only), rail platforms, parking garage, and/or some or all of the leaseable spaces (including for example, Main and Murray retail, transit oriented retail and/or the “Opportunity Space”). The Entity would retain overall responsibility for defined common areas and shell.

There may be certain advantages, at some time in the future, for the Entity to sell discrete physical portions of the facility (such as the bus bays and/or Opportunity Space in bulk) to private parties that may be able to take advantage of certain tax and financing incentives, if such action is authorized by the federal and state funding agencies. Nonetheless, because of the very large proportion of the total funding projected to come from public sources and because of the essential long term historical and public nature of the facility and its role in Springfield’s life and transportation system, the public must always be able to remain in control of the long term future of the overall investment to assure its continued use as a transportation facility. If portions are ever sold or converted into condominiums, the Entity will have to ensure continuing control over the transportation-related portions of

the building through deed restrictions or other legal mechanisms consistent with the requirements of federal and state funding agreements.

Why this Approach is Recommended

A number of other alternatives to initial public sponsorship, development and ownership of the Union Station Intermodal Transportation Center were considered and ultimately rejected by the Study Team. These included:

Early Sale to and Development by Private Parties:

Under this approach, the entire project site would be put up for sale to private parties, subject to certain covenants and specifications regarding redevelopment. Any needed public facility space could be leased back to appropriate public agencies. This approach was ultimately rejected for two reasons:

- Near term and projected intermediate term market conditions and resultant proformas do not offer enough upside potential to justify any significant investment of private funds.

- It makes sense to leave the public in control given that the majority of capital funding will have to come from grants and/or loans collateralized by leases to public agencies or guarantees issued by them. Also the occupants of the majority of the space would be public agencies carrying the bulk of the ongoing annual operating and maintenance costs.

"Partnership" with Private Owner/Developer:

- *Version A*: Proportional ownership in corporation or partnership with returns commensurate with investment and risk.

- *Version B:* Ownership of physical "parts" (condominium) of the facility, separate investments in each of them, and co-development of the overall project.

Both of these and other "mixed" forms of public/private "partnership" ownership and development were considered and rejected because of the dilemma and complications they create with regard to the final control over the overall project and its direction. It is a given that the vast majority of the project funding and the benefits derived from the project are public and therefore the public must have close stewardship over this investment. On the other hand, private sector parties typically do not like investing money and effort in ventures where they do not have direct and final control over the outcome.

The recommended approach avoids these deficiencies and dilemmas. It enables the public purpose and framework for the project to be clearly set, executed and sustained and for the public's investment to be protected. Yet it can offer the flexibility to invite private participation and control within those sub areas most commensurate with private

operations (bus bays; food operations; Opportunity Space) and thus enable profitable private operations and control in those areas within the larger public framework.

Development Costs and Funding – Option One

The following discussion of development cost, and operating revenues and costs is based on Option One. The development cost includes construction as well as "soft" costs. The project is expected to be undertaken as a FTA joint development improvement. The FTA recently issued revised guidance (2/7/07) on the eligibility of "joint development" projects for public funding under Federal transit law. The FTA's guidance is designed to provide grantees additional flexibility in working on joint development projects, and permits the FTA to fund a public transportation improvement that enhances economic development or incorporates private investment. It gives the FTA greater flexibility and expands the eligibility of transit funding for certain costs related to a joint development improvements. Applicable FTA guidance was used when preparing the capital cost budget for the Plan. A joint development improvement must be approved by the FTA in order to become eligible for their funding. It is understood that the Project Sponsor will seek such approval as part of the implementation of the recommended program.

Table 1 sets forth the basic plan for funding the capital costs of the entire Union Station Intermodal Transportation Center through to opening and lease-up.

Table 1
Capital Costs
(in millions of 2010 dollars)

	CAPITAL COSTS
DEVELOPMENT COSTS	
1. Bus Berths:	$7.4
2. Parking Deck (400 spaces)	$13.0
3. Terminal Building Preservation with Site Work	$20.6
4. Terminal Building Public Transit Spaces and Retail	$6.6
5. Transit Related Spaces	$5.0
6. Tunnel Passageway	$2.1
7. Rail Platforms/ADA Work	$6.5
8. Opportunity Space	$4.0
Total Uses	**$65.2**
SOURCES	
1. FTA Contract and Earmark Grants (FY01-FY05)	$26.0
2. EOT Match - FTA Contracts and Earmarks Grants (FY01-FY05)	$6.5
3. State Transportation Bond - Contract Balance	$3.8
4. State Transportation Bond - Earmarks	$7.3
5. A & F Offstreet Parking	$7.7
4. Commuter Rail Funds	$10.0
5. Loans (related to Opportunity Space leases)	$4.1
6. TIF/NMTC (if needed)	
Total Sources	**$65.2**
SURPLUS/(SHORTFALL)	**$0.0**

The entire project costs $65.2 million (in 2010 dollars), of which $61.2 million are for the Transit Facilities and $4 million for the build-out of the Opportunity Space. (The build-out would take 35,000 gross sq. ft. of "white box" shell space and improve it with new HVAC and electrical systems, as well as partitions, doors, ceilings, lighting and interior finishes designed to suit the programmatic needs of the tenant.)

The construction costs were developed using current industry standards and historic cost data. The construction cost includes "green" and sustainable design components to qualify the completed project for LEED certification, with the ranking of "silver" as a goal. The soft cost include project management, legal, architecture, engineering, marketing, insurance and other related real estate development expenses, as well as a project contingency.

Outright grants from Federal and State sources total $61.1 million of the total, with the remaining $4.1 million being either loans, secured by excess operational revenues from the Project and/or City of Springfield tax increment ("DIF") generated by the project and/or use of New Markets Tax Credits ("NMTC") in connection with the development of the Opportunity Space. At this point in time, if the project costs are controlled to the indicated budget and the operational results are as shown, then use of neither DIF nor NMTC appears likely to be necessary. Surplus revenues from operations would be sufficient to cover debt service on a loan for the projected $4.1 million capital gap left after receipt of all the grant funds assumed.

Operating Revenues and Costs

Table 2 presents the projected Operating Budget that underlays the above referenced financing plan for the Union Station Intermodal Transportation Center. It shows that the Transit Facilities and Transit Related Spaces, if built alone, would operate with an annual "buffer" of about $200,000/year. Moreover, the Opportunity Space if fully leased is projected to generate annual cash flow of about $300,000/year over and above the marginal costs involved in servicing the tenants that would be occupying this space. Therefore, sufficient funds are projected to be generated annually to be able to service debt needed to close the capital cost gap remaining on the Opportunity Space side, and still leave an annual operating surplus of about $100,000/yr. for a reserve.

Table 2
Operating Budget
(in 2010 dollars)

	Transit Facilities and Transit Related Spaces	Opportunity Space	TOTAL CENTER
Revenues			
PVTA	$198,000		$198,000
Peter Pan	$258,000		$258,000
Amtrak	$24,000		$24,000
Commuter Rail	$30,000		
Transit Oriented Retail (NNN)	$150,000		$150,000
Parking	$278,000		$278,000
Transit Related Retail and Office Space	$557,000		$557,000
Opportunity Space		$375,000	$375,000
Subtotal - Sources	$1,495,000	$375,000	$1,870,000
Costs			
Security	$225,000		$225,000
Repairs and Maintenance, and reserve	$250,000		$250,000
Cleaning	$250,000		$250,000
Utilities	$250,000		$250,000
Insurance	$75,000		$75,000
Misc. Expense eg. office, dues,	$50,000		$50,000
Marketing/Promotion	$50,000		$50,000
Administration/accounting/legal etc	$50,000		$50,000
Incremental Costs for Opportunity Space Occupancies		$56,000	
Management	$100,000	$11,000	$111,000
Property Taxes		$33,000	
Subtotal - Costs	$1,300,000	$100,000	$1,400,000
NET	$195,000	$275,000	$470,000

The combined "surplus" of approximately $0.5 million/year is used to service debt on the $4.1 million of tenant improvement and other preparation costs for the Opportunity Space not covered by the designated grants in the Capital budget. Amortization of these costs over 20 years at 6% per year is $87,000/yr per $1 million of debt or approximately $356,000/yr. for the projected $4.1 million needed. Any annual surplus after debt service should be accumulated as an operating account and replacement reserve.

To realize these operating targets the following revenue and cost assumptions and targets must be kept in mind:

Operating Revenues:

Transit Operators are assumed to pay as their share of operating costs (SOC) $17,000 per year per bus berth, based on the number of berths built into the plan (23) and $9 per net sq. ft. per year for areas used for ticketing and passenger waiting rooms specific to the individual bus service provider. These rates also allow for use of a certain amount of baggage space, and use of the Transportation Center's common area facilities.

Amtrak and Commuter Rail are assumed to pay about $24,000 and $30,000 per year, respectively, as their SOC. In addition, they are expected to directly maintain and pay any associated operating costs in connection with the rail platforms and access ways from the tunnel.

Transit Oriented Retail Space in the Terminal Building's Concourse will be leased to one or more retail/food operators on a net basis, meaning that they will have to pay for their own utilities, maintenance and cleaning within their designated food preparation and serving areas, and retail selling spaces, but not the common areas. The collective rent assumed from these tenants is projected at $50 per net sq. ft. NNN. A tenant improvement allowance of about $45 per net sq. ft. is included in the capital cost budget.

Transit Related Space (primarily office space on the second and third floors in the Terminal Building) assumes about 44,000 net sq. ft. at an average of $13 per net sq. ft. Gross meaning that all janitorial and cleaning, maintenance, insurance and property tax costs are paid by the lessor. This rent is at the bottom end of the range for rents for Class A buildings in Springfield and reflects the project's less than central location. It is near the top of the range for Class B rents in the best locations. A tenant improvement allowance of $45 per net sq. ft. is included in the capital cost budget. Rents would vary around a likely range of $12 to $14 per net sq. ft. depending on the location, size and quality of each individual space. Tenants are assumed to have access to reserved parking spaces in the adjacent garage at the rate of 3 per 1,000 sq. ft. of leased space. Parking charges are assumed to be in addition to rent. Letters of Interest have been received from three potential tenants, including the PVTA, Pioneer Valley Planning Commission (PVPC) and Square One (a daycare provider) for a total about 44,000 net sq. ft. (See Appendix D: Letters of Interest).

Opportunity Space: Retail includes the Murray Street corner retail (3,000 net sq. ft.) and approximately 11,000 net sq. ft. on the ground level of the Terminal Building on its eastern end at rents of $12 and $13 per net sq. ft. per year, respectively. The Terminal Building retail could be leased as a single unit or further subdivided into several smaller units (with some loss of net leaseable area). For all of the retail spaces, a tenant improvement allowance of $45 per net sq. ft. is included in the capital cost budget.

Opportunity Space: Office/Commercial is located on the upper levels in the Terminal Building and consists of about 19,000 net sq. ft. renting at an average of $13 per net sq. ft. Gross meaning that janitorial and cleaning, maintenance, insurance and property tax costs are paid by the lessor. This rent is at the bottom end of the range for rents for Class A buildings in Springfield and reflects the project's less than central location. It is near the top of the range for Class B rents in the best locations. A tenant improvement allowance of $45 per net sq. ft. is included in the capital cost budget. Rents would vary around a likely range of $12 to $14 per sq. ft. per year depending on the location, size and quality of each individual space. Tenants are assumed to have access to reserved parking spaces in the adjacent garage at the rate of 3 per 1,000 square feet of leased space. Parking charges are assumed to be in addition to rent.

Parking Spaces: Transit Users: Parking revenues for the 200 spaces oriented towards transit users and retail patrons are based on 250 day occupancy at 85% and a weekday daily rate of $4 per space per day; and 15% weekend use at $3 per space per day. Incremental maintenance and operations costs (over those incurred for the base structure) are estimated at $200 per space year - no property taxes. Net yield per space after costs is approximately $700 per year.

Parking Spaces: Office Users: Parking revenues for the 200 spaces oriented towards upper floor office and other Opportunity Space users are based on monthly passes at $87.50 per space per month and 85% occupancy, with no weekend revenues. Incremental maintenance and operations costs (over those incurred for the base structure) are estimated at $200 per space per year - no property taxes. Net yield per space after costs is approximately $700 per year.

Concourse (Great Hall): The concourse on the first floor of the Terminal Building would be a very desirable location for special events. The 3,400 sq. ft. of space has a ceiling height of 40 feet and could seat about 400 people. Worcester's Union Station's great hall, which can also accommodate about 400 people, is projected to take in about $82,000 in revenue in 2009. While this potential revenue source has not been included in this report at this time, further research should be done to explore this opportunity.

Operating Costs:

Transit Facilities and Transit Related Spaces: These are the costs projected to occur to open and operate the complex as a viable Intermodal Transportation Center regardless of whether the Opportunity Space is occupied or not. As can be seen, the base operation costs to be "in business" as a full Transportation Center are substantial and cannot be expected to be sustained by the transit operators

alone, at least based on the user charge schedule currently contemplated. However, when the Transit Related Spaces (such as transit oriented retail, and space leased by transit oriented agencies for office space) are added in, the additional rental revenues are sufficient to cover the base operation costs.

Opportunity Space: The project has about 35,000 sq. ft. of retail and office "Opportunity Space" located on the first and mezzanine floors of the Terminal Building and about 5,000 sq. ft. of retail space located at the corner of Frank B. Murray and Main Streets. "Opportunity Space" is floor area available for rent in the future. If this space is leased to non-transit related tenants that the build-out construction cost does not qualify for the current sources of funding identified for this project. The incremental costs of servicing tenants added in the Opportunity Space are low (since many costs, such as exterior building and parking garage maintenance, and main floor common area operations, would already be ongoing for the Transit function). They are estimated inclusive of a $1.50 per sq. ft. per year allowance for property taxes (or for "in-lieu" funding which can be used to help service debt for Tenant Improvements in the Opportunity Space).

Development and Operating Costs – Options Two and Three

The development of Option Two, in which the intercity buses remain at the Picknelly Terminal, is approximately $2.0 million less than Option One because the intercity bus ticketing and waiting space is not fully built-out and the amount of transit-related retail space is reduced to reflect fewer bus travelers. Correspondingly, there is a reduction in revenues to reflect the shared operating costs (SOC) not paid by the intercity buses and less rent from the transit-related retailers. While there would also be an overall reduction in operating expenses, the net annual operating revenues would only exceed expenses by approximately $150,000. Though marginal, the positive cash flow of Option Two would be adequate to sustain the annual operations of the redeveloped transit facility

Option Three, which includes the 30 Frank B. Murray Street parcel is approximately $3.0 million more than Option One because of the acquisition cost and expanded site improvements. While this Option Three would require additional funding to cover the increase in capital costs, the increase in operating expenses would not materially impact the operational sustainability of this Option.

Implications:

Based on the ongoing operations proforma for Option One shown in Table 2 and the respective operating cost implications of Options Two and Three noted above, it is clear that the long term sustainability of the transit facility operations depend on the following:

- Substantially all the Transit Space and Transit Related Spaces is leased and/or
- The Transit Operators are able to cover any operational shortfalls and/or

- The ownership Entity is able to cover operational shortfalls.

As noted above, a range of prospective tenants have been identified that could, between them, fill essentially all the Transit Related Space at the time of project opening. In the event that some of these prospects decide not to lease space, it would be necessary that other tenants or sources of funding be found to sustain the project as envisioned under the estimated cost structure. Section 5 of this report addresses the need and next steps to obtain commitments from these prospects early in the development process.

5 IMPLEMENTATION: NEXT STEPS

IMPLEMENTATION: NEXT STEPS

The planning process to date has resulted in a viable Redevelopment Plan for the Union Station Intermodal Transportation Center and the outline of a funding (capital and operations) scenario that can support the project. Once the Redevelopment Plan receives approval by the FTA and EOT, more detailed planning, design, engineering and development work can begin. The following outlines the key steps that would need to be taken going forward:

1. Establish ownership entity to oversee development and funding of the project

   This could be a continuation of the ongoing arrangement (that is, PVTA and SRA) or such other arrangement as these two key sponsors see as appropriate. The arrangement could continue by simple agreement amongst the parties or the creation of more formal documentation and legal structures. Whatever approach is determined to be the most advantageous, any agreement or documentation required by the funding agencies will be developed.

2. Procure project development management team including necessary professional services

   Whatever arrangements are made in the first step with respect to the ownership entity, it should also be taking the necessary actions to procure an ongoing management and development team. The project sponsors need to determine the extent to which currently contracted resources are sufficient to advance the project under existing or new contracts, and to what extent there is a need for new procurements of staff and/or professional and development services.

3. Negotiate initial Letters of Commitment with transit agency tenants, and other key tenants

   To date letters of interest to lease space have been received from three potential tenants, including the PVTA, Pioneer Valley Planning Commission (PVPC) and Square One (a daycare provider) for a total about 44,000 net sq. ft. (See Appendix D: Letters of Interest). These letters need to be advanced to formal agreements and/or leases.

4. Negotiate funding arrangements

   The project ownership entity and its development management team need to obtain funding agreements and, if needed, adjust the project parameters accordingly to reflect any changes in funding requirements. (To be eligible for FTA funding, a joint development improvement must be approved by the FTA Regional Administrator or designee.) Once initial commitments are obtained from both prospective occupants and funding sources, then the design and planning work can progress into a more advanced state.

5. Commence marketing of retail and office opportunity spaces

   Decision will need to be made to market the space exclusively through a commercial broker or independently through an open listing. Either process will require the preparation of marketing materials, which describe the project, available space, size, build-out, amenities, rent and other tenant costs.

6. Establish construction delivery approach and property management structure

   Decision will need to be made to construct the project using a traditional design-bid-build delivery, or some other method such as construction management. The advantages of each deliver approach and its potential impact on this project will need to be measured. The timing of the procurement of a contractor will depend on the approach selected, for the procurement would occur after the completion of construction documents using the design-bid-build delivery approach, whereas a construction manager can be retained prior to the design phase.

   The decision on the property management structure should be made early in the design phase to incorporate management and operational factors into the design and construction of the project. The two generic approaches is to either retain the services of an established property management company or to employ property management staff internally.

7. Procure A & E services commensurate with construction delivery method

   A & E services can differ dependent on the construction delivery method selected. For example, construction cost estimates by the architect may not be needed, since construction manager retained during the planning and design phases generally provide cost estimating services.

8. Procure construction team commensurate with delivery method

   This step can commence as soon as the construction delivery method has been chosen and can either overlap the procurement of A & E services, or follow it, depending upon the delivery method chosen.

9. Complete funding and occupancy agreements

   Work on these will be continuous from the moment the project sponsors decide to continue advancing the project following presentation of this Plan. The majority of these commitments should be reduced to formal legal agreements before significant construction begins.

10. Procure Property Management Services

    Input from property managers, experienced in public transit facilities, during the design process and prior to construction is important to incorporate operational criteria, such as security protocols and equipment, and maintenance considerations, into the design of the facility.

11. Design, build and commission the project

    The project timeline is about 33 months from the start of design to the completion of construction using the traditional design-bid-build approach and about 29 months using a construction management at risk approach. The commission process is a thorough review and testing of the finished buildings' mechanical, electrical and life safety systems to ensure that the systems operate as designed and specified. This is particularly important since sustainability and energy efficiency will be critical components of the project. Commissioning is also a mandatory requirement for LEED certification.

Project Schedule

The following project schedule begins with a planning phase of five months and continues through design and construction phases of about 33 months, starting January 2009. This schedule is based on a traditional design-bid-build approach, with distinct design, bid and construction phases. (Using a construction management and fast-track delivery method could reduce the overall schedule from 38 to 34 months.) This schedule also divides the construction into two phases.

Construction Phase A – This first phase of construction includes all the major demolition, new construction and infrastructure work and the transit related tenant build-out and common areas. The construction of Phase A would be completed and available for occupancy by about June 2011.

Construction Phase B – The second phase of work includes reactivating the tunnel from the Terminal Building to Lyman Street and upgrading the train platforms to comply with ADA requirements. This scope of work can only be constructed after Phase A is completed since the existing Amtrak ticket and waiting facilities will need to be relocated into the Terminal Building before this construction can start. Based on the current schedule and with adequate funding in place, the tunnel and platform work is projected to be completed by October 2011. Phase B also includes the build-out of the leased "Opportunity Space". The completion of this scope of work is dependent on the identification of tenants and availability of sufficient financing.

	2008					FY 2009 3rdQ			4thQ			FY 2010 1stQ			2ndQ			3rdQ			4thQ			FY 2011 1stQ			2ndQ			3rdQ			4thQ			FY2012 1stQ		
						2009												2010											2011								
	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6	7	8	9
Planning Phase																																						
Sponsoring Entity Implementation	2 months																																					
Project Management Procurement	2 months																																					
Transit Agency Lease Commitments	2 months																																					
Funding Arrangements	3 months																																					
Opportunity Space Marketing				24 months																																		
Delivery Approach Decision	2 months																																					
A/E Services Procurement			1 month																																			
Construction Team Procurement					1 month																																	
Funding and Lease	5 months																																					
Design Phase																																						
Shell																																						
Schematic Design						1 month																																
Design Development							4 months																															
Construction Documents										6 months																												
Tenants																																						
Programming						3 months																																
Schematic Design									3 months																													
Design Development												3 months																										
Construction Documents															4 months																							
Bid / Award / Permits / Mobilization																		2 months																				
Construction Phase - A																																						
Demolish Baggage Building																					3 months																	
Construct Bus / Parking Garage																								9 months														
Terminal - Selective Demo./Stabilize/Structural																					5 months																	
Terminal - Ext. Walls/Build-Out/MEP/Sitework																									9 months													
Transit Related Space Build-Out																													4 months									
Construction Phase - B																																						
ADA Rail and Tunnel																																			4 months			
Opportunity Space Build-Out																																			4 months			
TOTAL DURATION 38 months	Planning - 5 months					Design and Construction Documents - 13 months												Bid/Award 2 months			Construction - 18 months																	

Assumptions:

1. All regulatory approvals will be obtained without impact on schedule.
2. Build-out of all tenant spaces is included.
3. All hazardous materials abatement has been completed; no contaminated soils anticipated.
4. Construction Phase B completion dates are dependent on the availability of funding and identification of tenants

PROJECT SCHEDULE:

TRADITIONAL DESIGN - BID - BUILD METHOD

6 APPENDICES

APPENDICES

Appendix A: Redevelopment Plan Drawings

Appendix B: Transportation Services Findings

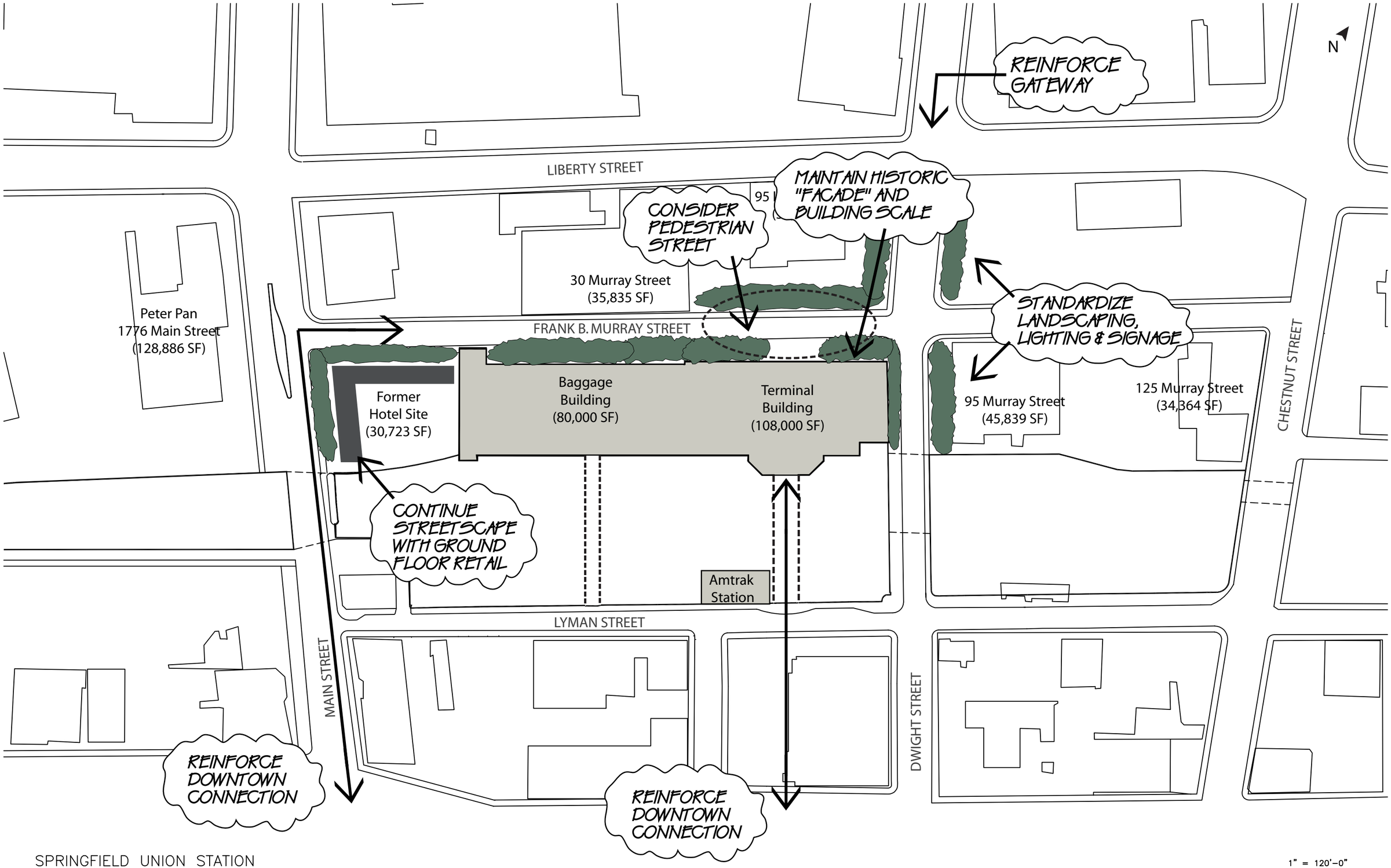
- Transit Findings and Program Report
  - ✓ Intercity Passenger Rail
  - ✓ Intercity Bus Services
  - ✓ Pioneer Valley Transit Authority
- Transit Vision and Space/Operational Program
- Building Vision and Space Requirements

Appendix C: Real Estate Market Characteristics Summary

Appendix D: Letters of Interest

REDEVELOPMENT PLAN DRAWINGS

- Existing Site Guidelines
- Option One - PVTA/Intercity Bus Berths (23+4 future)
- Option Two – PVTA Bus Berths (15) & Intercity remains at Peter Pan
- Option Three – PVTA/Intercity Bus Berths (25) & 30 Murray acquired
- Option One – Circulation Flow and Potential Conflicts
- Option Two – Circulation Flow and Potential Conflicts
- Option Three – Circulation Flow and Potential Conflicts
- Option One - First Floor Plan and Section
- Option One - Second Floor Plan and Section
- Option One - Third Floor Plan and Section
- Option One - Terminal Building First Floor Plan
- Option One - Terminal Building Tunnel and Track Level Plan
- Option One - Terminal Building Mezzanine Plan
- Option One - Terminal Building Second Floor Plan
- Option One - Terminal Building Third Floor Plan
- Option One – Exterior Elevations
- Option One – Exterior Renderings
- Option One – Interior Rendering



SPRINGFIELD UNION STATION

1" = 120'–0"

HDR

EXISTING SITE GUIDELINES

REMOVE MEDIAN STRIP AND CONSIDER TRAFFIC LIGHT

MAIN STREET

FRANK B. MURRAY STREET

DWIGHT STREET

DROP OFF AND TAXI STAND

RETAIL

PARKING LOBBY

PARKING RAMP

LOADING DOCK

ENCLOSED LOADING DOCK

TERMINAL BUILDING

TUNNEL

KEY

N

Pedestrian Circulation

Dedicated Bus Circulation

Car Circulation

Service Access

SPRINGFIELD UNION STATION

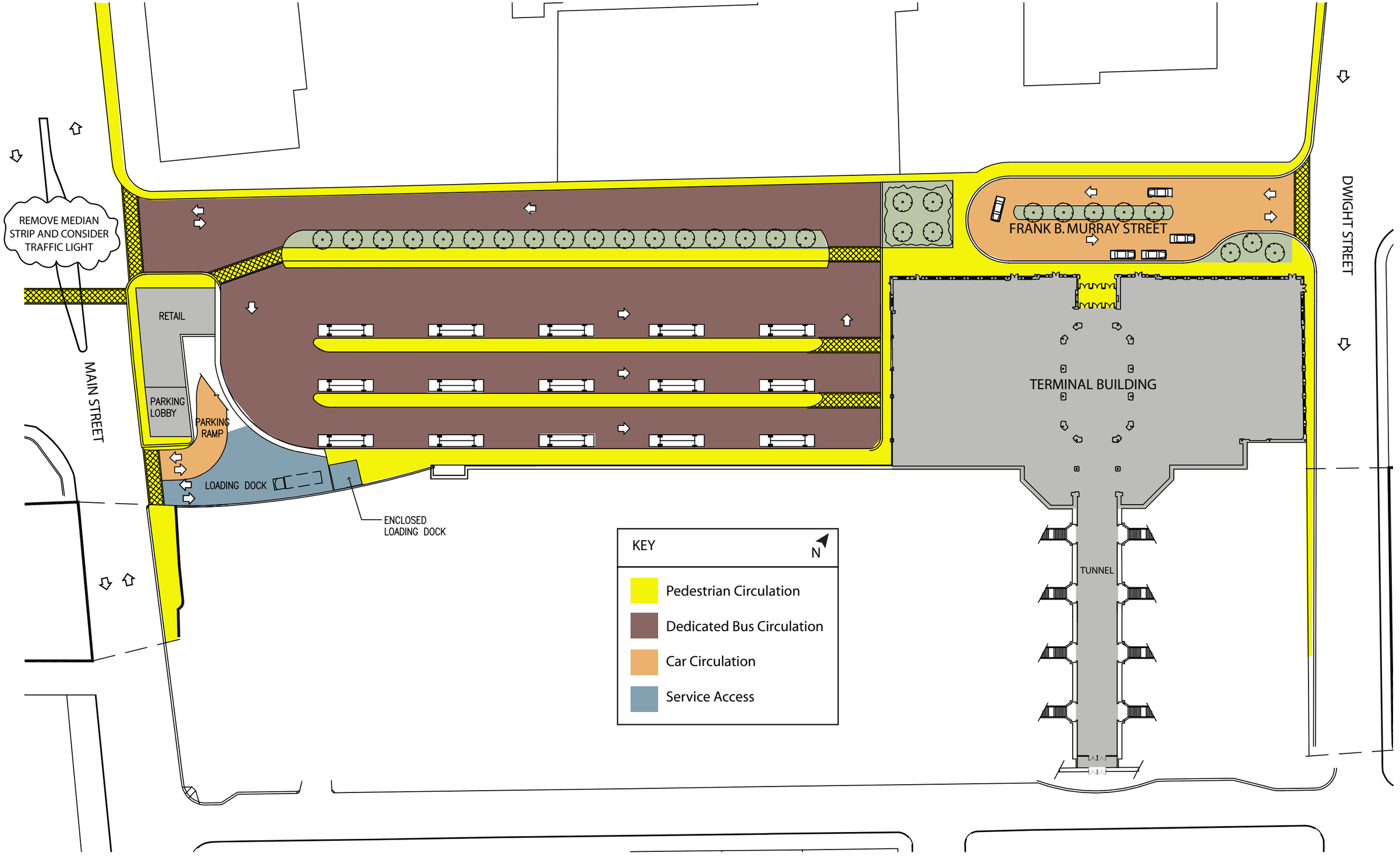
1/64" = 1'–0"

HDR

PVTA/INTERCITY BUS BERTHS (23 + 4 FUTURE)

OPTION ONE

A.3



SPRINGFIELD UNION STATION

1/64" = 1'–0"

HDR

PVTA BUS BERTHS (15) & INTERCITY REMAINS AT PETER PAN

OPTION TWO

LIBERTY STREET

SHORT TERM PARKING – 45 SPACES

REMOVE MEDIAN STRIP AND CONSIDER TRAFFIC LIGHT

PARKING RAMP

FRANK B. MURRAY STREET

DWIGHT STREET

RETAIL

MAIN STREET

PARKING LOBBY

LOADING DOCK

ENCLOSED LOADING DOCK

TERMINAL BUILDING

TUNNEL

KEY

N

Pedestrian Circulation

Dedicated Bus Circulation

Car Circulation

Service Access

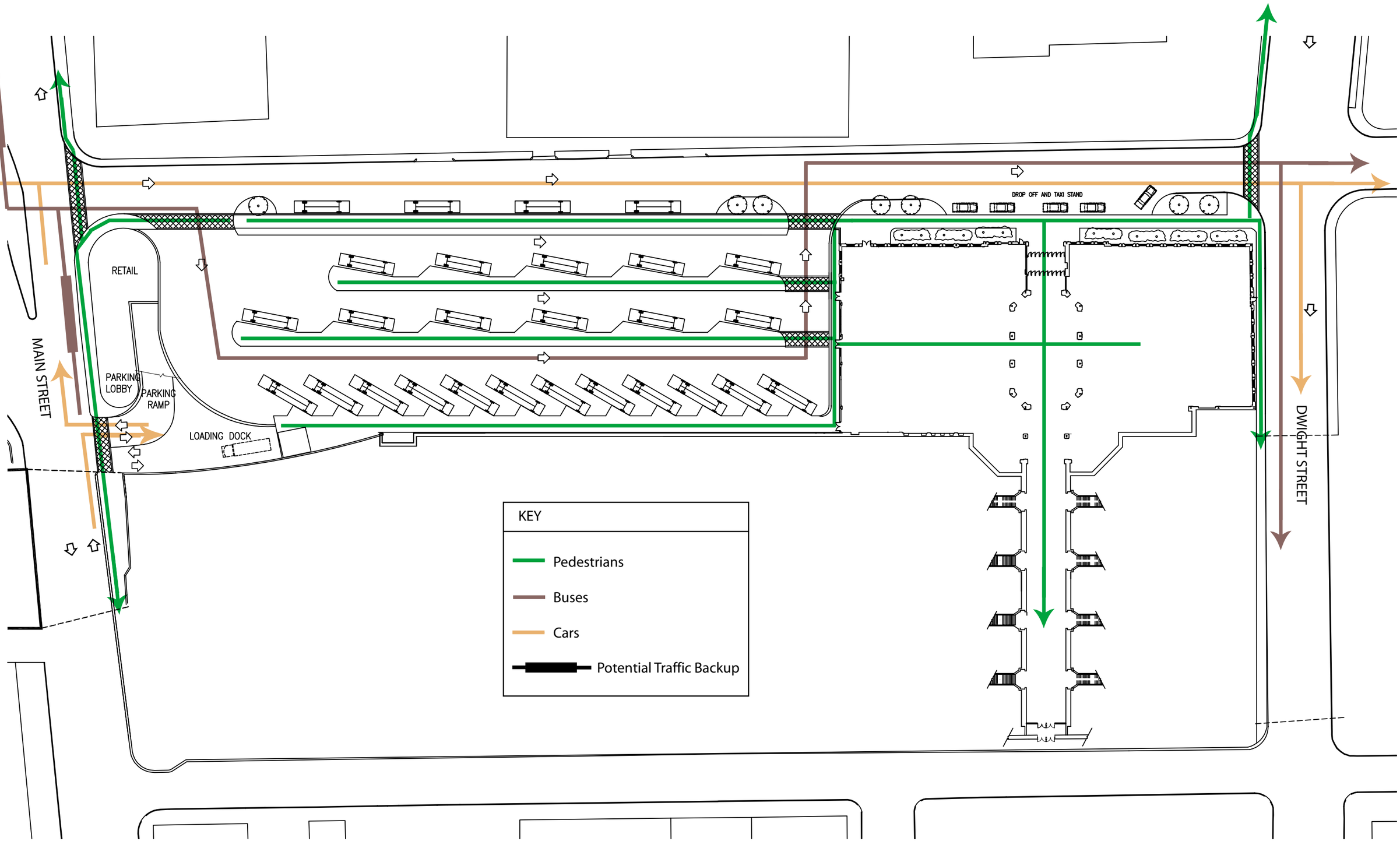
SPRINGFIELD UNION STATION

1/64" = 1'–0"

HDR

PVTA/INTERCITY BUS BERTHS (25) & 30 MURRAY ACQUIRED

OPTION THREE



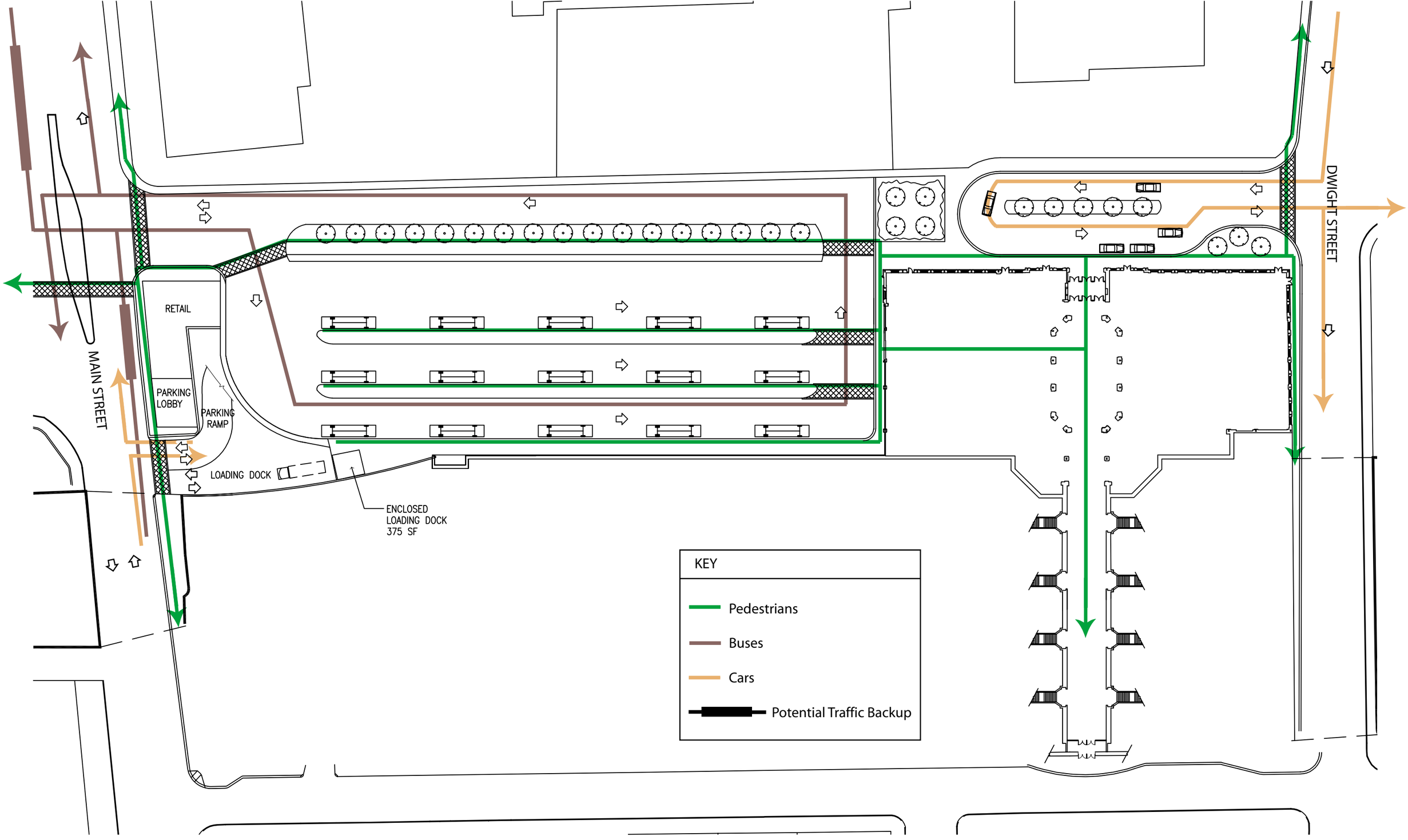
SPRINGFIELD UNION STATION

HDR

CIRCULATION FLOW AND POTENTIAL CONFLICTS

1/64" = 1'-0"

OPTION ONE CIRCULATION



SPRINGFIELD UNION STATION

1/64" = 1'–0"

HDR

CIRCULATION FLOW AND POTENTIAL CONFLICTS

OPTION TWO CIRCULATION

LIBERTY STREET

SHORT TERM PARKING – 45 SPACES

PARKING RAMP

RETAIL

MAIN STREET

PARKING LOBBY

LOADING DOCK

ENCLOSED LOADING DOCK 375 SF

DWIGHT STREET

KEY

- Pedestrians
- Buses
- Cars
- Potential Traffic Backup

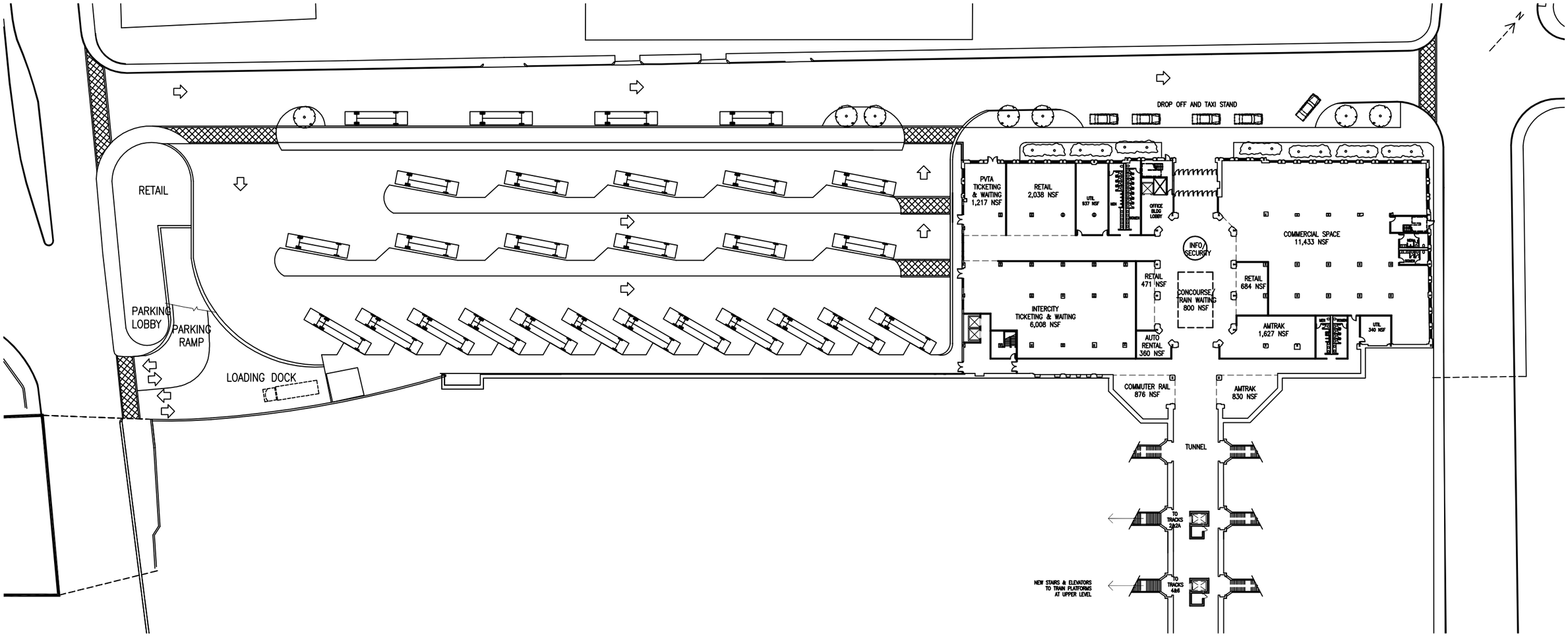
SPRINGFIELD UNION STATION

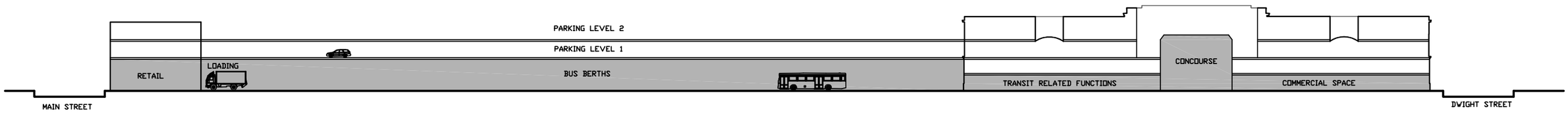
1/64" = 1'–0"

HDR

CIRCULATION FLOW AND POTENTIAL CONFLICTS

OPTION THREE CIRCULATION





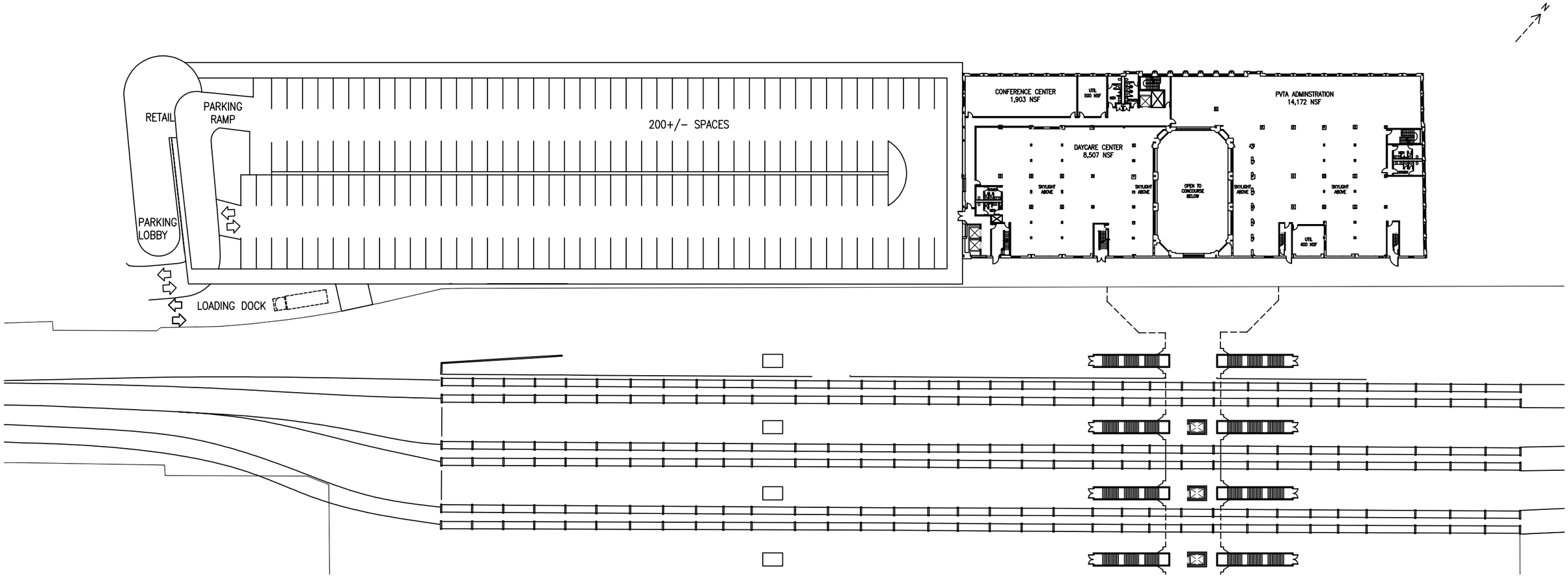
SPRINGFIELD UNION STATION

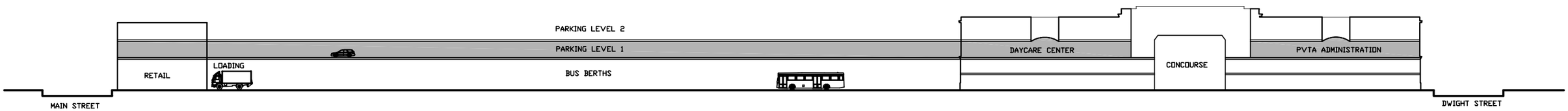
1/64" = 1'-0"

HDR

FIRST FLOOR PLAN AND SECTION

OPTION ONE - FIRST FLOOR





SPRINGFIELD UNION STATION

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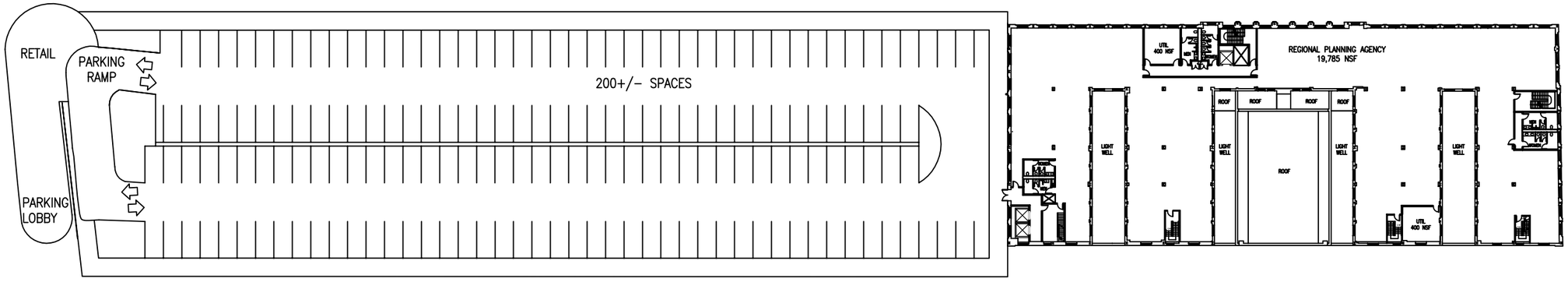
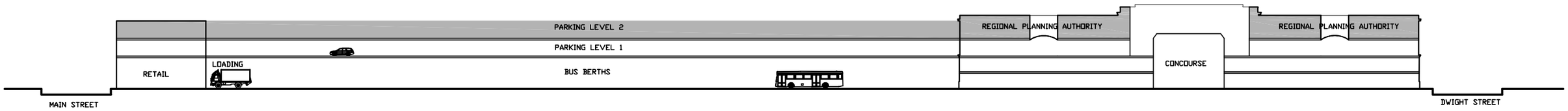
SECOND FLOOR PLAN AND SECTION

1/64" = 1'-0"

OPTION ONE - SECOND FLOOR





SPRINGFIELD UNION STATION

1/64" = 1'-0"

HDR

THIRD FLOOR PLAN AND SECTION

OPTION ONE - THIRD FLOOR

PVTA

WAITING	350 NSF
TICKETING/BAGGAGE/OFFICE	625 NSF
CUSTOMER SERVICE	175 NSF
STAFF RESTROOM	50 NSF

DROP OFF AND TAXI STAND

PVTA TICKETING & WAITING 1,217 NSF

RETAIL 2,038 NSF

UTIL 937 NSF

MEN

WOMEN

OFFICE BLDG LOBBY

INFO/ SECURITY

COMMERCIAL SPACE 11,433 NSF

MEN

WOMEN

INTERCITY TICKETING & WAITING 6,008 NSF

RETAIL 471 NSF

CONCOURSE/ TRAIN WAITING 800 NSF

RETAIL 684 NSF

AUTO RENTAL 360 NSF

AMTRAK 1,627 NSF

MEN

WOMEN

UTIL 340 NSF

COMMUTER RAIL 876 NSF

AMTRAK 830 NSF

TUNNEL

PLAN KEY

N

- PVTA
- INTERCITY
- RETAIL
- AMTRAK/COMMUTER RAIL
- DAYCARE CENTER
- REGIONAL PLANNING AGENCY
- CONFERENCE CENTER
- AVAILABLE SPACE
- AMENITIES
- CIRCULATION/COMMON AREAS

INTERCITY

WAITING	2500 NSF
TICKETING	200 NSF
EXPRESS/MISC	1700 NSF
OFFICE SPACE	1400 NSF
SECURITY	150 NSF
STAFF RESTROOM	50 NSF

AMTRAK

TICKETING	375 NSF
EXPRESS	400 NSF
BAGGAGE	780 NSF
SUPPORT SPACE	500 NSF
SECURITY	350 NSF
STAFF RESTROOM	50 NSF

SPRINGFIELD UNION STATION

1/32" = 1'-0"

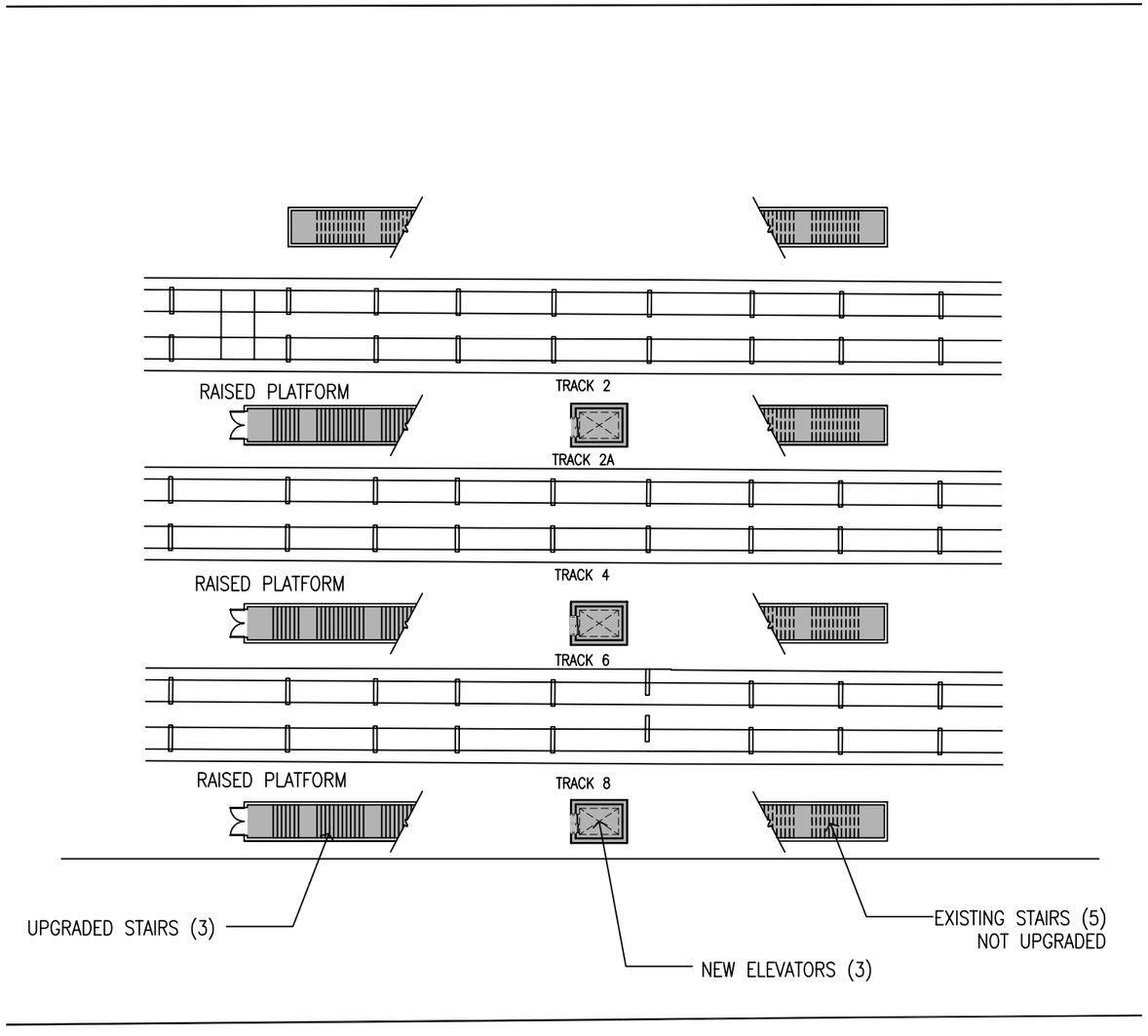
HDR

TERMINAL BUILDING FIRST FLOOR PLAN

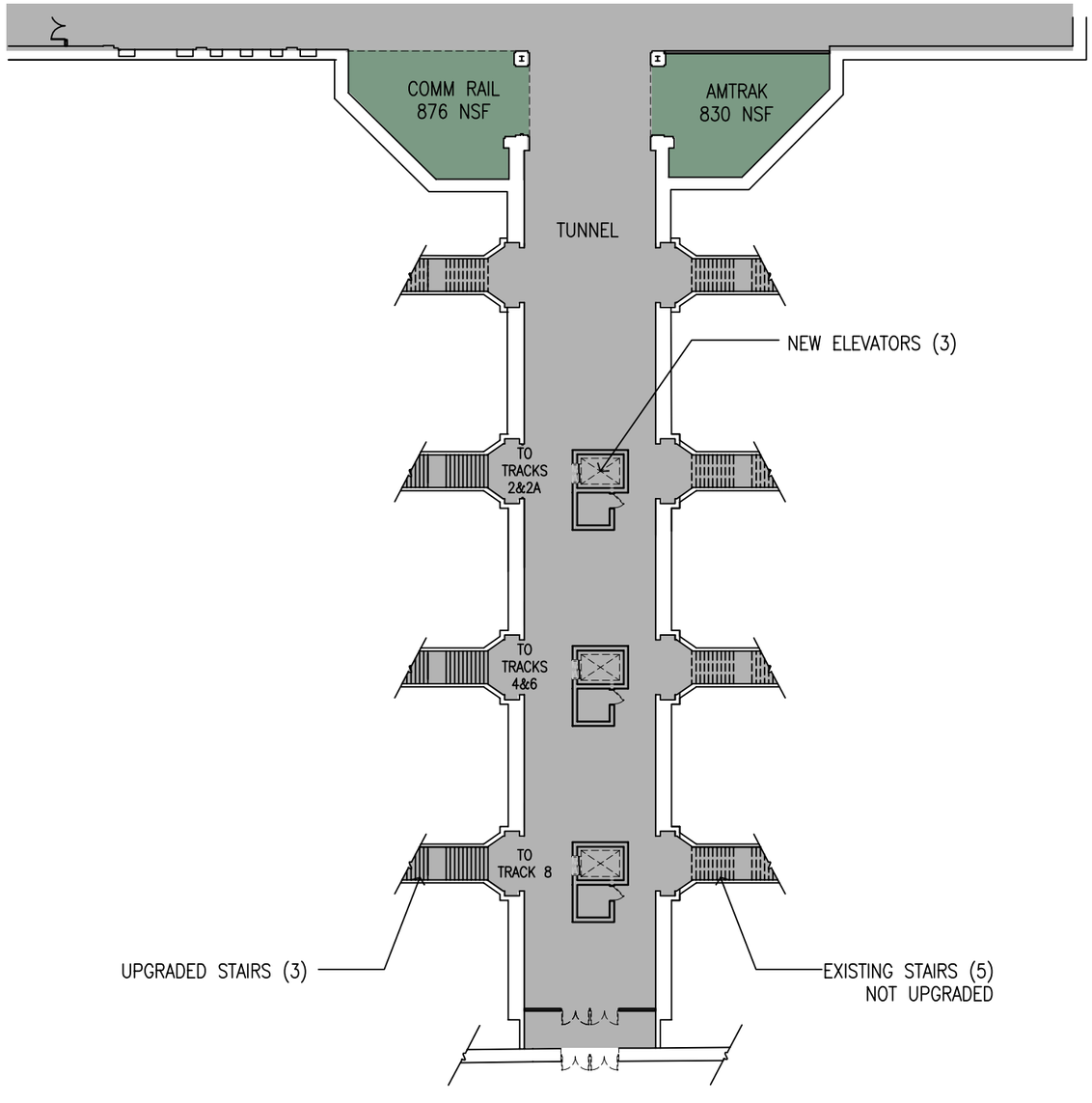
25,544 NSF (W/OUT TUNNEL)
41,726 GSF (W/OUT TUNNEL)

OPTION ONE - FIRST FLOOR PLAN

TRACK LEVEL



TUNNEL LEVEL



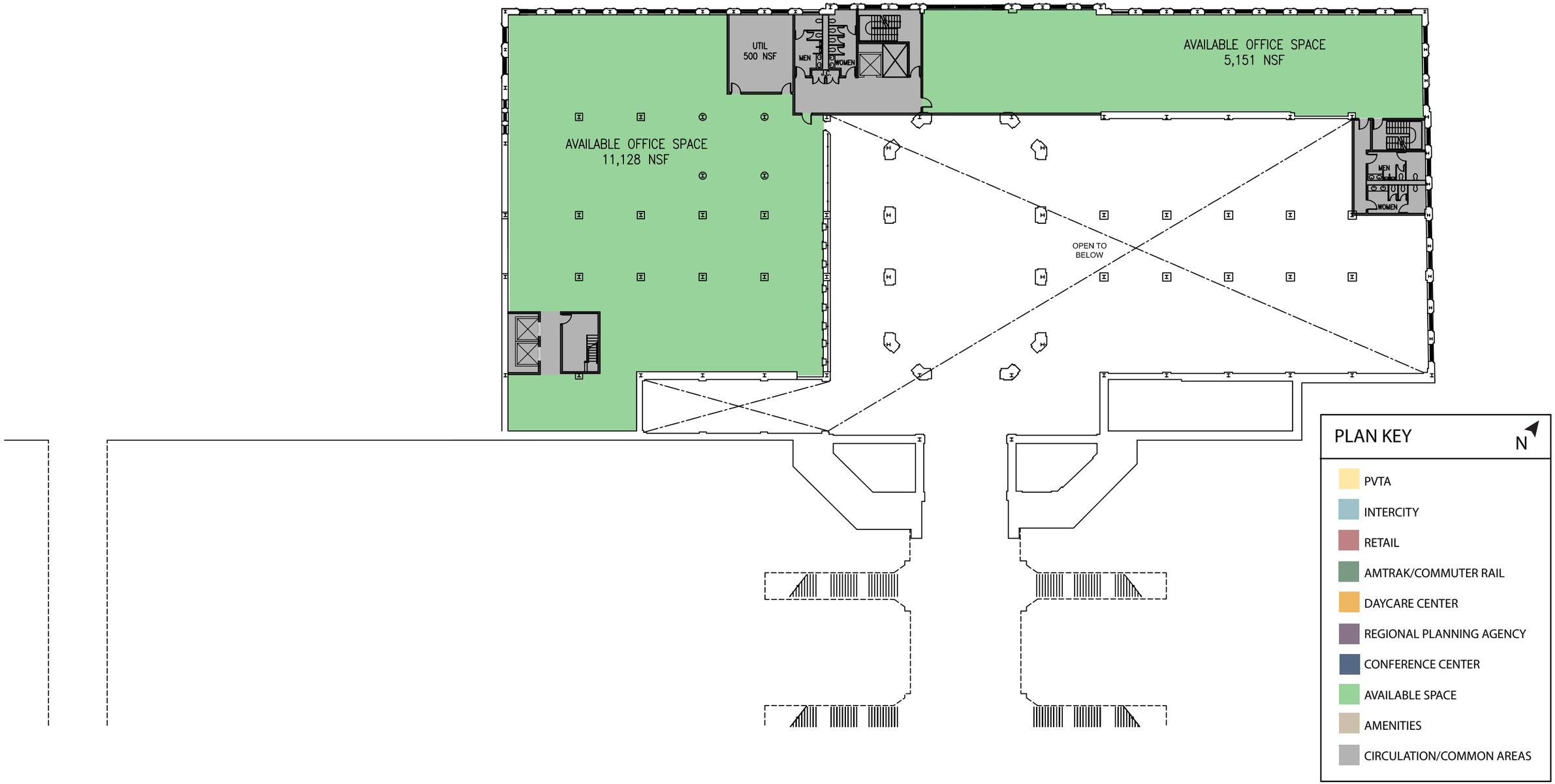
SPRINGFIELD UNION STATION

1/32" = 1'-0"

HDR

TERMINAL BUILDING TUNNEL AND TRACK LEVEL PLAN

OPTION ONE - TUNNEL AND TRACK



SPRINGFIELD UNION STATION

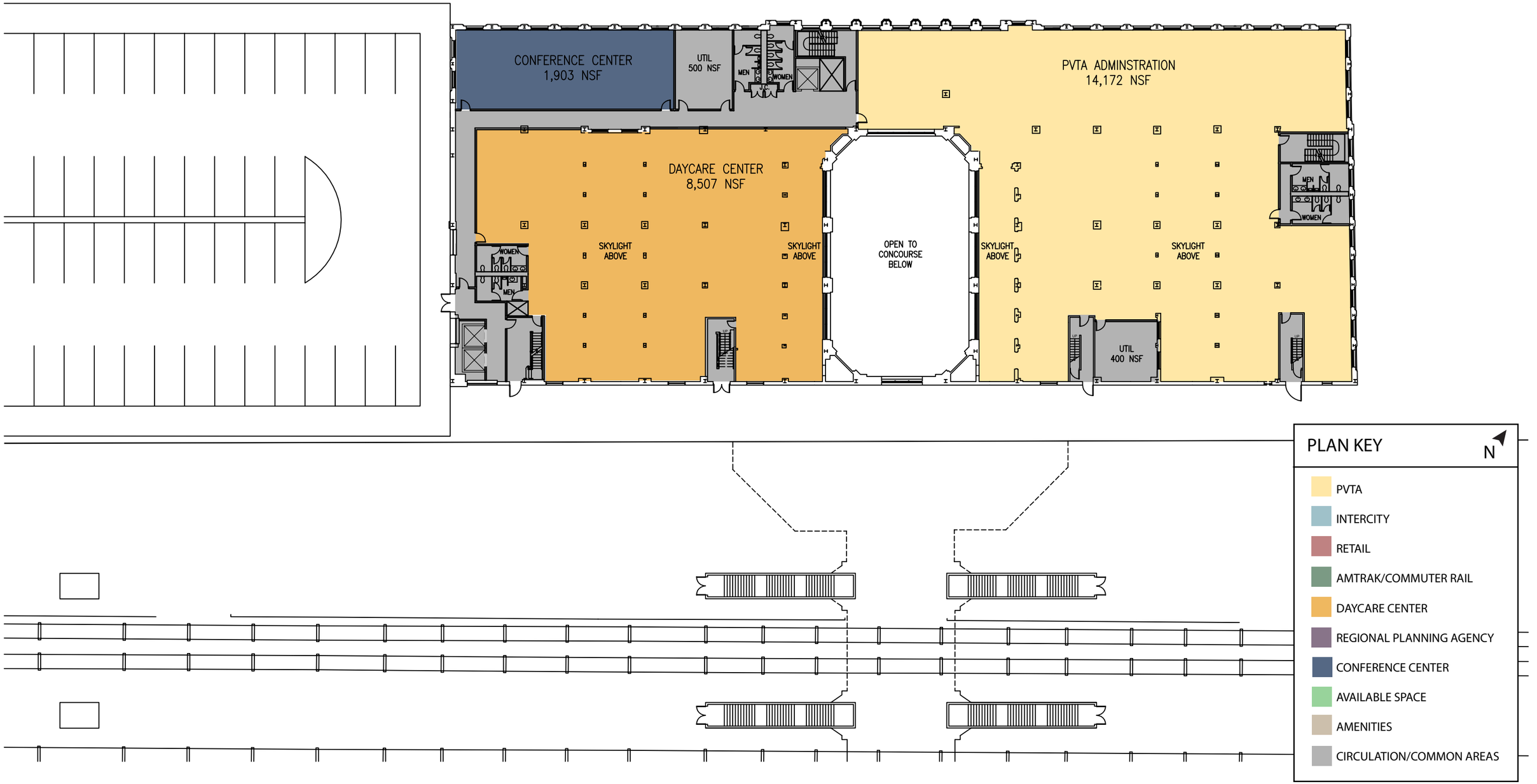
1/32" = 1'–0"

HDR

TERMINAL BUILDING MEZZANINE PLAN

16,279 NSF
18,722 GSF

OPTION ONE - MEZZANINE PLAN



SPRINGFIELD UNION STATION

1/32" = 1'–0"

HDR

TERMINAL BUILDING SECOND FLOOR PLAN

24,582 NSF
30,324 GSF

OPTION ONE - SECOND FLOOR PLAN

PLAN KEY

N

- PVTA
- INTERCITY
- RETAIL
- AMTRAK/COMMUTER RAIL
- DAYCARE CENTER
- REGIONAL PLANNING AGENCY
- CONFERENCE CENTER
- AVAILABLE SPACE
- AMENITIES
- CIRCULATION/COMMON AREAS

SPRINGFIELD UNION STATION

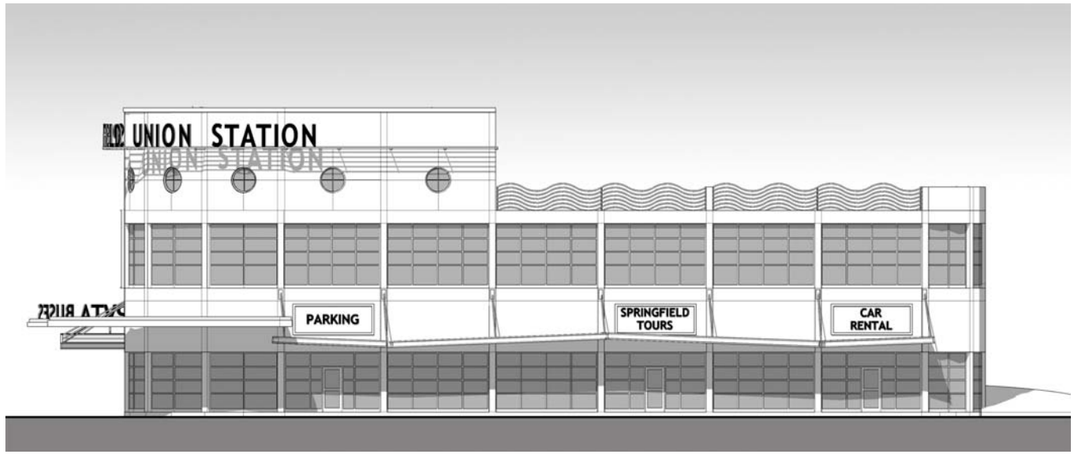
1/32" = 1'-0"

HDR

TERMINAL BUILDING THIRD FLOOR PLAN

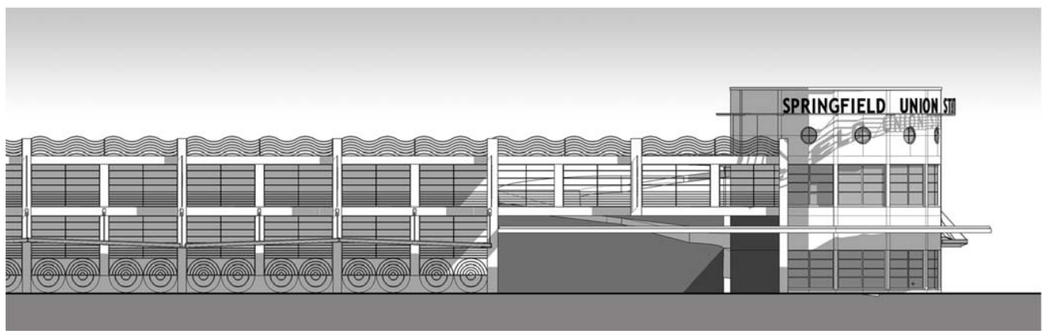
19,860 NSF
24,615 GSF

OPTION ONE - THIRD FLOOR PLAN

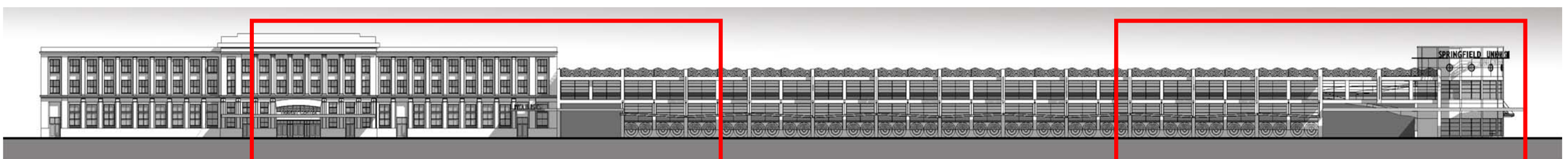


WEST ELEVATION

PARTIAL NORTH ELEVATION A



PARTIAL NORTH ELEVATION B



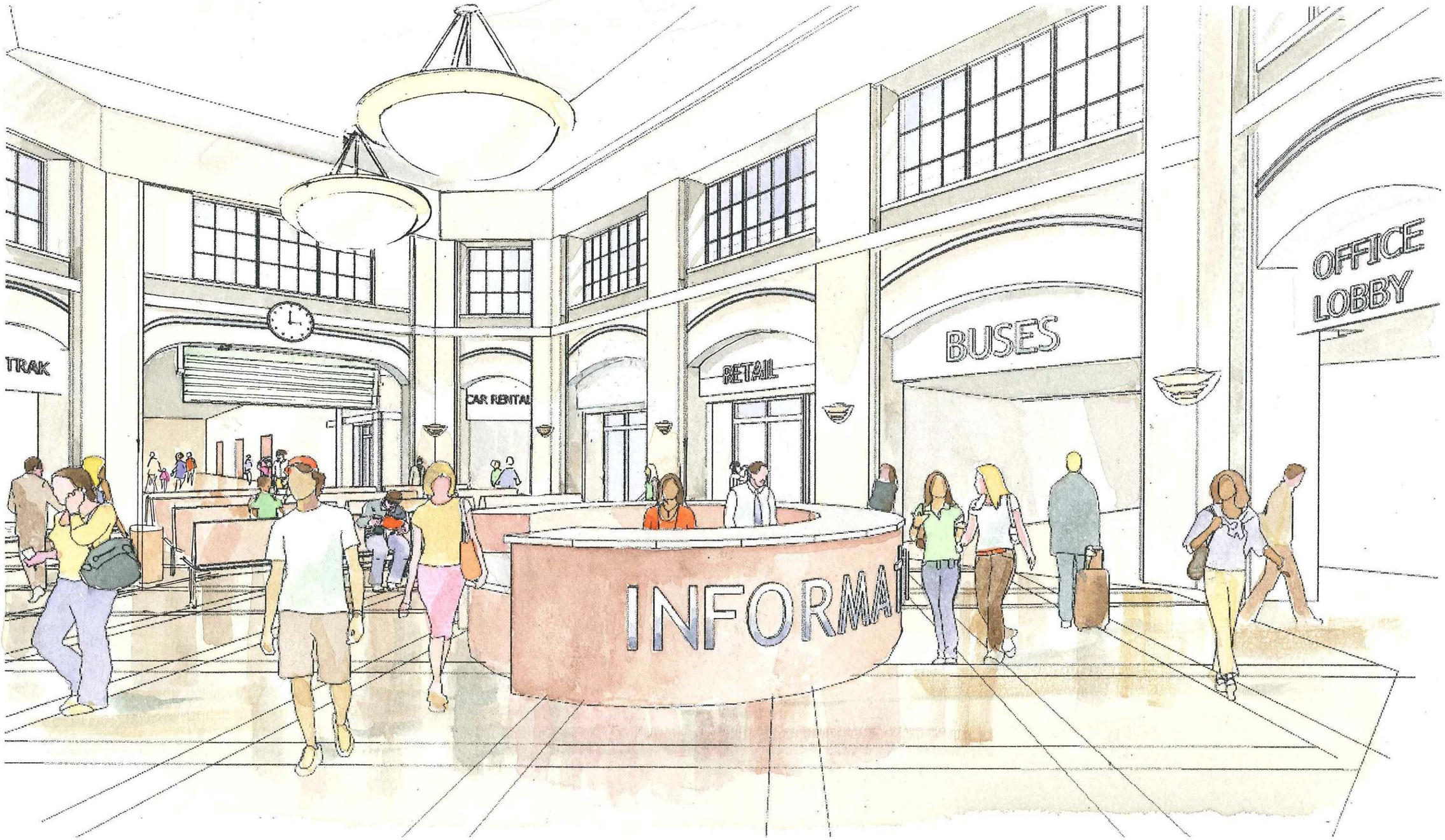
NORTH ELEVATION

ELEVATION A

ELEVATION B

NORTHWEST VIEW

NORTHEAST VIEW



CONCOURSE RENDERING

TRANSPORTATION SERVICES FINDINGS

TRANSIT FINDINGS & PROGRAM REPORT

This report is one element in the documentation of the study to revitalize Union Station in downtown Springfield, MA. Other documents address the evaluation of the station and baggage building and the potential economic development effects of reactivating this historic structure.

This report presents the findings from the stakeholder interviews conducted as part of the Union Station Intermodal Transportation Facility study. The findings describe current operations and projected future changes to service and facility requirements. The overall transit vision and space/operational program estimate is presented.

This report is organized as follows. This first chapter of the report presents a summary of the findings organized by their implications for the Union Station design. The individual sections present the findings by each travel mode, starting with the intercity rail and progressing through intercity bus, and local bus modes.

The subsequent chapter describes the transit vision for the building; and the space requirements in detail, including the relationship among the modes and their potential layout. Estimates of the transit-supported retail components will be included.

COMMON FINDINGS

- All stakeholders are interested in the project and want to be a part.
- Passenger providers want to be together but separate
    - Passengers should be able to move easily from one mode to the next
    - Each mode wants their own passenger waiting area
    - Each mode prefers an individual entrance
    - Each mode has different operating hours, up to 20 hours/day
    - Vehicle areas should be separated
- Freight railroads are experiencing an on-going expansion in demand
    - Capacity expansion must be preserved
    - Passenger platforms must not interfere with freight operations
    - Passengers should not cross the tracks at grade
- Union Station is located in a key area of downtown
    - The site is surrounded by parcels that could be redeveloped
    - Transit services could generate 8,300 daily transit boardings, or 16,600 daily transit trips (boardings + alightings)

TRANSIT SERVICES

All existing transit modes (intercity train, intercity bus, local bus) are anticipated to have all of their Springfield services operating through Union Station. In the future, an additional mode of travel, commuter rail, is anticipated to be added.

- Amtrak provides 18 daily trains (nine round trips) currently to Springfield; Springfield is the fifth most active train station in Massachusetts out of 11 total Amtrak stations
- Additional conventional Amtrak services have been planned as part of a phased implementation of commuter rail service to New Haven, CT
- Initial studies are being conducted on providing more train service to the north along the I-91 "Knowledge Corridor"
- Peter Pan intercity bus service has its headquarters in Springfield, diagonally across from Union Station.
- The Pioneer Valley Transit Authority operates all 18 of its Springfield bus routes through the same Peter Pan terminal

INTERCITY PASSENGER RAIL

SUMMARY OF INITIAL FINDINGS

- Amtrak desires to have a quick and convenient access to all passenger modes.
- Relocation of passenger activity to Union Station is a concern because of the potential backtracking that some of their passengers would encounter going through the passenger tunnel unless direct access was provided to each platform from the tunnel.
- Amtrak cannot afford to pay any more expenses for the station than it currently incurs (utilities and taxes).
- No parking is currently provided, but 85-105 spaces could be required; for the future commuter rail, an estimated 90-115 spaces could be warranted.

EXISTING AMTRAK TERMINAL

Connection to Union Station

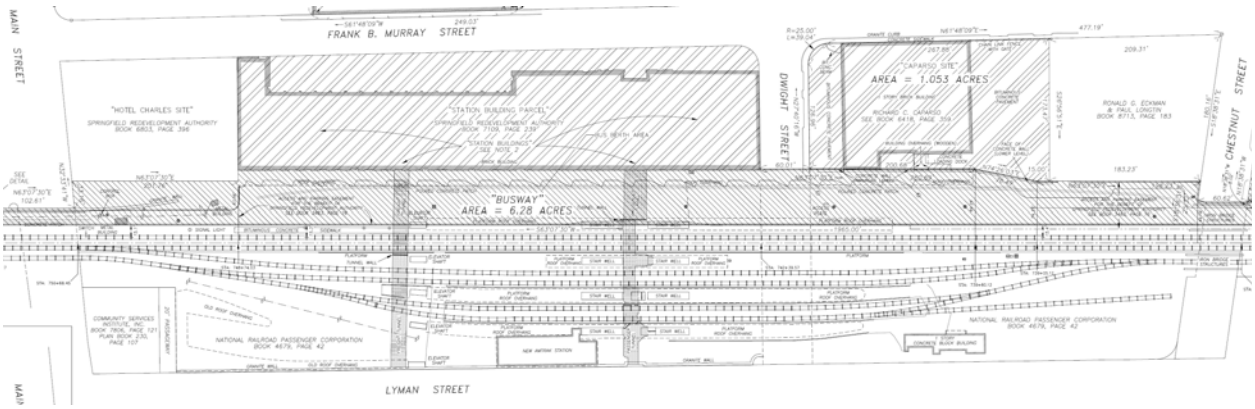
Springfield's Union Station is located at 55 Frank B. Murray Street, and is owned by the Springfield Redevelopment Authority. According to the 2008 Property Card, it was built in 1915 and has 184,850 square feet. It is adjacent to the CSX track (old Boston & Albany) that connects Springfield with Boston on the east and Albany, NY on the west. It is just northeast of a wye that connects to Amtrak's Springfield line south to New Haven, CT.

The existing Amtrak terminal is a separate building from Springfield's Union Station. They are located on opposite sides of the railroad viaduct that crosses Columbus, Main, Dwight, and Chestnut Streets. Two tunnels extend at street level from Union Station under the elevated tracks to Lyman Street. The eastern/northernmost tunnel previously was the main passenger tunnel that went from the main lobby, under the tracks, to Lyman Street. The tunnel width appears to vary from 15 feet to nearly 30 feet, with most portions around 28 feet wide. Four pairs of stairwells connected this tunnel with four platforms at track level.

This tunnel is blocked to through travel. The eastern/southernmost end, next to Lyman Street, is still open as the ground-level entrance to Amtrak's head house. One stairwell

and an elevator are open to Amtrak's passenger lobby at track level. Behind this entrance lobby space, Amtrak's Police use about 550 square feet of the tunnel for their offices.

A second tunnel connects Union Station to Lyman Street. This second tunnel is located west/south of the main passenger tunnel. Originally, this tunnel was the baggage tunnel from Union Station. It is a continuous 15 feet wide, and has five elevator shafts to the track-level platforms. The tunnel and shafts are now closed. The 2002 survey, below, prepared for a previous Union Station study[1] that envisioned a busway at track level, best illustrates the locations of the tracks, platforms, tunnels, the "New Amtrak Station", and the old Union "Station Buildings". According to this survey, the tunnels are part of the Union Station building, and are owned by the Springfield Redevelopment Authority.



Amtrak Head House

Amtrak's terminal is located at 66 Lyman Street and is open from 5 AM to 11 PM seven days per week. Ticketing and baggage check are provided until 9:30 PM. It was built in 1950, and according to the 2008 Property Card, it has 8,446 square feet. According to separate documents from Amtrak, the building is half this size, approximately 4,012 square feet. The property card appears to include a separate storage building as part of its information. Amtrak owns this building and does not pay any rent.

The bottom level of the head house includes the entrance lobby and space for a small vendor (previously occupied by a donut shop). The upper (track) level consists of the ticketing and baggage check facilities and the boarding lounge. The lounge includes three ticket counters and approximately 50 seats.

Amtrak also uses some trailers at track level. A small crew base (approximately 725 square feet) is located in temporary buildings alongside the tracks.

[1] Goody, Clancy and Associates. Design Development Submission, February 14, 2003

There are three pairs of tracks (six total). According to Amtrak, they use all six tracks at various times. The two tracks closes to the Union Station building are the mainline freight tracks, while the other two pairs are sidings located closer to Amtrak's head house.

Four platforms are provided – one adjacent to the head house that serves a single track; two platforms located between each pair of tracks that serve tracks on either side; and a fourth platform located adjacent to Union Station that serves a single track. The platforms are raised above the top-of-rail, but are generally in poor condition. Closed stairwells are in place for each platform down to the closed passenger passageway and closed stairwells and elevator towers are in place to the separate baggage tunnel. Passengers currently cross the tracks at grade to reach the appropriate platform location. Canopies are provided along most of the length of the platforms.

There are no dedicated parking spaces for Amtrak. Parking is available at several surface lots and on street.

EXISTING SERVICE AND RIDERSHIP LEVELS

Amtrak operates three routes through Springfield. The *Regional* operates primarily as a connecting train between Springfield and New Haven, CT. Transfers are provided in New Haven to trains to New York and Washington, DC. A total of five southbound and five northbound trains operate each weekday. One train in each direction provides direct service to Washington, DC without requiring a transfer. Approximately two-thirds of the station ridership is on *Regional* trains.

The *Vermonter* operates one weekday train in each direction between St. Albans, VT and Washington, DC. Springfield is an intermediate stop on these trains. The *Vermonter* accounts for approximately 20 percent of the station ridership.

Unlike the other routes, the *Lake Shore Limited* travels east/west through Springfield. It operates one train in each direction from South Station in Boston to Albany-Rensselaer, NY. Springfield is an intermediate stop on these trains. The *Lake Shore Limited* has the lowest ridership of the three routes and accounts for less than 15 percent of the ridership.

Springfield is the fifth most active train station in Massachusetts (the other four are in Boston). In 2006, Springfield had a combined total of 112,465 boardings and alightings on the routes serving the station. This level is an estimated 271 daily boardings in the peak month and an estimated 41 boardings in the peak hour.

There is no information on transfer activity between Amtrak and the intercity bus passengers or the Pioneer Valley Transit Authority. While the terminals are only about 1,100 feet apart in walking distance (about the same as the distance from the Sheraton lobby to the Terminal B lobby at Bradley Airport), the nature of the walk is such that few passengers are estimated to transfer between modes. Based upon a study for the I-95 Coalition[2], roughly 20 percent of the intercity rail passengers could arrive/depart by public transit, if Springfield was similar to other locations.

Amtrak recommends that passengers arrive 30 minutes prior to departure.

FUTURE SERVICE AND RIDERSHIP ESTIMATES

Commuter Rail Service

The states of Connecticut and Massachusetts are studying the implementation of commuter rail service from New Haven, CT to Springfield's Union Station. 2005 New Haven-Hartford-Springfield commuter rail study[3] is examining the 62-mile corridor, owned by Amtrak. The start up service was recommended to be a 30-minute frequency during peak periods on weekdays. Service would operate in both directions during both morning and evening peaks. Commuter rail service times would be coordinated with Amtrak service on the corridor. A total of 15 trips in each direction were assumed between Springfield and New Haven; 7 in each direction are new commuter rail trips and 8 are adjusted existing Amtrak trips.

Total end-to-end travel time was estimated to be 90 minutes. Nine existing stations and three new stations were assumed to be served. No new parking spaces were assumed to be constructed at Union Station.

The NHHS study estimated that the total daily ridership at Springfield would be 169 weekday boardings and 169 weekday alightings. Subsequent to the initial ridership estimate, the study Steering Committee requested the development of a maximum-ridership alternative of 5,000 daily riders on the entire line. At this ridership level, the Springfield station was estimated to have an additional 73 daily boardings and alightings, for a total of 242 daily boardings and alightings.

DESIGN/SPACE CONSIDERATIONS

Station/Platform Location

According to the commuter rail study, the existing four platforms are adequate for the current and projected level of trains and passengers. While Amtrak officials indicated they use all six tracks for passenger boarding, observations indicate that the four siding tracks are used for the majority of passenger trains. According to the train schedules, no more

[2] TransCore, Inc. and Matthew Coogan. Intermodal Passenger Travel Information System Phase 2A Final Report. December 2003. http://66.167.232.132/pm/projectmanagement/Upfiles/reports/full194.pdf

[3] Wilbur Smith Associates. New Haven-Hartford-Springfield Commuter Rail Implementation Study. June 2005.

than two trains are scheduled to be in Union Station during any one hour period throughout the day.

One outstanding question is whether any improvements to Amtrak facilities, or the introduction of new commuter rail service, will require modification of the boarding platforms. The Americans with Disabilities Act (ADA) requires that accommodations be made to allow passengers in wheelchairs to use passenger trains. In many station locations, this accommodation has been accomplished through the use of movable platform lifts, or the construction of mini high platforms. A platform height of approximately four feet above the top of rail is needed to bring the platform height in line with the floor height of most passenger cars.

The US Department of Transportation (USDOT) Office of the Secretary is promulgating more stringent requirements, particularly along the Northeast Corridor. USDOT considers the Springfield line and Union Station to be located along the Northeast Corridor, primarily because Amtrak owns both corridors. The proposed regulations, which appear to be enforced in actual practice, are contained in a Notice of Proposed Rulemaking (NPRM), Docket ID OST-2006-23985. This NRPM was issued in 2006 and is still "pending". As currently proposed, a new, full-length, high-level platform will be required to permit level boarding with the passenger cars. To limit the gap between the high-level platform and the car, the platform must be located on a tangent track. To avoid conflicts with wider freight trains, the raised platform may need to be constructed on a gauntlet track adjacent to the main freight line. This requirement will add to cost and may require additional right-of-way. The new platform should be more secure, with access to the platform limited to the station so that passengers cannot bypass the ticketing lobby.

The implications of these regulations are considerable at Union Station. If fully enforced, four raised platforms will need to be constructed, each potentially 900+ feet long. The passenger tunnel, stairwells, and new elevators will need to be reconstructed between each pair of tracks to permit wheelchair-bound passengers to access all platforms. With raised platforms, passengers will no longer be able to cross the tracks at grade to reach the individual platforms. Raised platforms on the two tracks closest to Union Station could be an issue with the freight railroads since these are through freight tracks and the raised platforms could interfere with wide freight loads. The other platforms are already on gauntlet tracks, so interference with freight should not be an issue. Final resolution of these issues will be dependent upon negotiations among the USDOT, Federal Railroad Administration, Federal Transit Administration, Amtrak, and the freight railroads.

Sizing Considerations

The existing ticketing and boarding lounge space is considered to be adequate for the existing passenger volumes, with space to spare for additional commuter rail passengers. No parking is currently provided for Amtrak passengers. Based upon industry guidelines, approximately 100 spaces could be warranted for current service, with another 100 spaces for the commuter rail service.

The crew base and Amtrak police facilities will need to be maintained. This space can either be part of the new station or located close by as is the current arrangement. The existing facilities are adequately sized.

Track Implications

This current study does not foresee that any track improvements are required at the Springfield Union Station. Currently, there are four side tracks and two through freight tracks. The two freight tracks appear to only be used in the rare instance that the passenger sidings are blocked. No additional passenger sidings are warranted for the commuter rail service based upon the findings of that study. This conclusion assumes that any ADA platform improvements will not interfere with freight movements on the two through tracks.

CSX, the freight railroad company that owns and operates the tracks where the boarding platforms are located, has indicated that they do not want to have passengers crossing the tracks at grade. While they dislike the current Amtrak operation that does have passengers crossing at grade, they are most opposed to previous Union Station plans that envisioned passengers would exit Union Station at track level and walk across the tracks to their boarding platform. This movement would have all passengers crossing the active through freight tracks.

CSX also opposes having buses operate at track level, as envisioned in some of the earlier Union Station studies. CSX views this as compromising their right-of-way, and potentially creating a safety hazard by having passenger vehicles operating so close to freight trains.

INTERCITY BUS SERVICES

SUMMARY OF INITIAL FINDINGS

- Peter Pan is willing to move into a renovated Union Station if it makes financial sense for the company.
- Peter Pan desires to control the intercity bus space, including operations, signage, and other elements; a separate passenger waiting area is also desired.
- Security will be an issue if high school students board at Union Station.
- Their existing terminal works well for them.
- A minimal amount of drop-off parking is provided, and about 90 daily spaces are available behind the terminal for $7/day; this supply is adequate for projected demand at the current terminal.

EXISTING PETER PICKNELLY TERMINAL

Passenger Services

The existing Peter L. Picknelly Transportation Center is located at 1776 Main Street, and is open from 5:30 AM to 9:15 PM weekdays and 7:15 AM to 9:15 PM weekends. According to the 2008 property card, the original building was constructed in 1969 and is 26,301 square feet. A 10,500 square foot addition was built in 1986. The total square footage is 36,801 square feet. Peter Pan separately had an architect examine their existing facility. According to that report, the current building has 34,111 square feet, consisting of 25,150 on the first floor and 8,961 on the second floor.

The terminal has 17 bus bays or gates on the loading side, with another 4 bus bays on street adjacent to the building. Other than the on-street bays, the bus bays are head-in bays, which requires buses to back out upon departure. The site is 3 acres.

Four intercity companies operate at the facility: Peter Pan, Bonanza (a Peter Pan subsidiary), Greyhound, and Vermont Transit. Peter Pan charges the other companies as a percentage of their sales. PVTA has been a tenant for about 10 years; prior to that time they loaded their buses on street surrounding Tower Square. The surrounding merchants had concerns, which led to relocating PVTA to the Picknelly terminal. PVTA pays a flat amount to use the gates and to have a dispatch office. Until a few months ago,

PVTA also had a customer service center near the entrance. PVTA relocated its customer service center to a more customer friendly and visible location on Main Street.

Separate waiting areas are provided for the intercity buses and PVTA. Most PVTA riders stay outside at the boarding platforms or in the gate concourse hallway. There are approximately 34 seats in the intercity bus waiting area and no seats at the concourse or interior boarding area.

Retail Space

Besides the bus activity, there are three tenant restaurants – McDonalds (1839 square feet), Dunkin Donuts (619 square feet), and a Subway is being added (777 square feet). The Subway will be located where PVTA previously had a customer service center. No seating is provided in the restaurants, but standing tables are provided. In addition to the restaurants, a small sundries shop (492 square feet) is also located in the building. A total of 3727 square feet is devoted to these transit-supported retail activities. These tenants provide a strong financial return. They are the right mix and size for the current level of passenger activity. There are 5 vending machines in the boarding concourse and a cash machine in the lobby.

Peter Pan is undertaking a $400,000 renovation project in 2008. This project will include upgrading the HVAC, restrooms, waiting areas, and front façade, and adding the Subway.

Parking

There are 92 spaces on surface lot between Peter Pan's garage and the terminal, approximately 14 on the east side of terminal (for employees) and 21 on the west side, for a total of 126 spaces. The west side parking consists of 13 15-minute spaces and 8 reserved spaces. Peter Pan officials consider this amount of parking is about right for current passenger activity, but they may need a little more for growth. The current parking rates for the 90-space lot is a maximum of $7 per day, or $70 per month. No utilization information was provided, but based upon observations; the lot appears to be about two-thirds full.

Peter Picknelly also owns the parking garage across from Union Station at 30 Murray Street. This two-level facility has about 220 spaces and was built in 1951. The top level is currently closed, but has been used in the past as a storage facility for vehicles. Current parking rates are $0.50 per hour, with a monthly rate of $45. According to Picknelly officials, this garage is in poor condition. No utilization information was provided, but from observations, it appears to be lightly used.

Peter Pan Headquarters Space

The Picknelly Terminal is also the headquarters for Peter Pan Bus Lines and its subsidiaries. Office space is provided on two levels of the building. According to a 2008 architectural study prepared for Peter Pan, the headquarters space needs separate from the passenger activity is 15,902 square feet. This area does not include any space for passenger activity or the transit-supported retail.

RIDERSHIP LEVELS

According to Peter Pan officials, the existing Picknelly Terminal is the most used building in Springfield. Approximately 11,000 people per day go through the building, with 16,000 people per day during peak seasons. The majority of these users are PVTA users, with intercity passengers accounting for approximately 3,000 daily riders (less than 30 percent). No specific ridership counts are available.

Peak times for riders are Friday afternoons, Saturdays from 6 AM to 1 PM, and Sundays from 3 PM to 8 PM.

Intercity passengers are in the building for 30-45 minutes; Peter Pan encourages riders to arrive 30 minutes prior to departure.

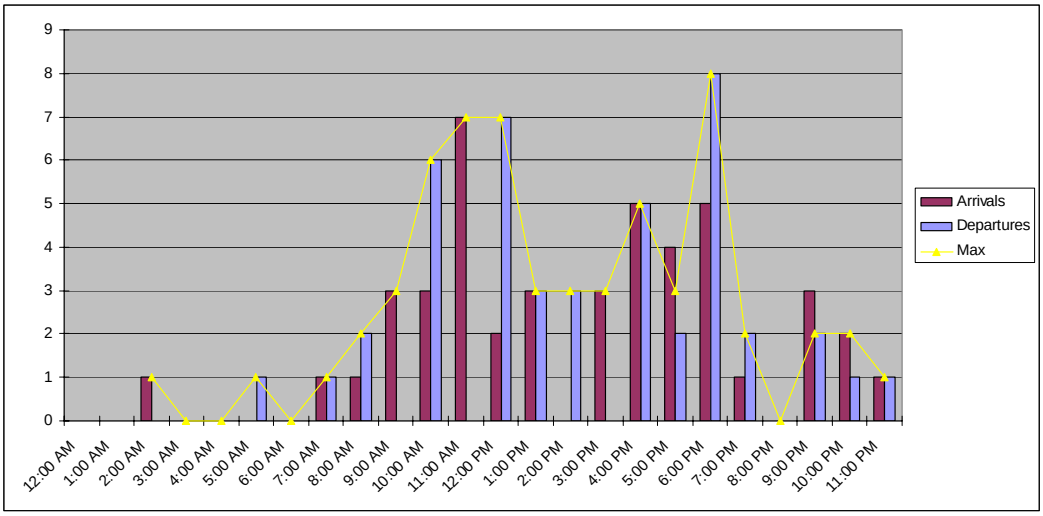
There is some transfer activity between the intercity carriers and PVTA, but there are no specific counts. Based upon the study for the I-95 Corridor Coalition, roughly 10 percent of the intercity bus passengers could arrive/depart by public transit, if Springfield is similar to other locations.

BUS ACTIVITY

Peter Pan regularly uses 9 of the 17 gates. This works well for the current passenger and bus levels. For the future, they estimate 10-12 gates would be required, but fewer gates would be needed if they were shared with PVTA. Intercity buses generally stay in the bays for 30 minutes or an hour at most. If they have more than an hour layover, the bus moves to a layover bay by the fence.

An analysis of the current (October 2007) bus schedules was made from *Russell's Guide* data. Based upon that information, the average weekday has 45 bus arrivals and 44 bus departures, with the majority of this activity Peter Pan or Bonanza buses. Vermont Transit has 5 arrivals and 3 departures and Greyhound has 3 arrivals and 4 departures.

The chart below shows arrival and departure activity by hour of the day. Also shown is the peak accumulation of buses, defined as buses arriving/departing within a 30-minute window.



Peak bus accumulation is during the 6 PM hour, when 8 buses are at the terminal at the same time. A smaller peak accumulation of 7 buses occurs twice during the 11 AM and 12 noon hours. Little bus activity occurs between midnight and 7 AM, with only 1 arrival and 1 departure during these hours.

Based upon the published schedules, for those buses with a layover, the average layover time is 18 minutes, but this is an estimated amount since the schedules do not show all layover information.

DESIGN/SPACE CONSIDERATIONS

The existing building space provides the appropriate sized space for their needs. Office and dispatching space is provided in addition to the retail tenants. No operator facilities are required since the main garage is adjacent to the terminal.

Peter Pan conducted an independent assessment of their space needs. According to their calculations, they need approximately 9,400 square feet for transportation purposes; 4,500 square feet for miscellaneous purposes, primarily transit-supported retail; and 16,000 square feet for the headquarters activity. Should Peter Pan relocate to Union Station, the headquarters activity could move or remain in the current location independent of whether the passenger activity moves.

PIONEER VALLEY TRANSIT AUTHORITY

SUMMARY OF FINDINGS

- The current Springfield Bus Terminal at the Picknelly building is inadequate for PVTA's operation. Major concerns are:
    - Passenger platform space
    - Head-in bus bays
- Additional amenities are desired for waiting passengers, including real-time bus information
- An estimated 14-15 bus bays should be provided within a new terminal to allow room for growth
- Space should be maintained for a dispatching office and operator restrooms
- No parking is currently provided, but between 45-70 spaces could be required

SPRINGFIELD BUS TERMINAL

PVTA calls the Picknelly Terminal the Springfield Bus Terminal (SBT). PVTA moved its central hub to this location from Tower Square in 1997 in response to adjacent business owner complaints. PVTA has a lease with Peter Pan Bus Lines to operate out of the terminal. Lease payments consist of two parts – the first part is for the lease of the bus gates and waiting area at an annual rent of $73,800; the second part is an additional rent of $40,000 for after hours dispatching, marketing, and additional security. The additional rent became effective in 2001. The total lease amount starting in 2001 is $113,800. While the lease includes an escalator clause for the rent, the amount has remained unchanged since it was first established, other than the institution of the "additional rent".

OPERATIONS / RIDERSHIP LEVELS

PVTA has a total of 44 routes in the system, but only 18 peak routes go through the Springfield Bus Terminal (SBT). The North Hampton and UMass routes do not come through. Frequency of service ranges from 15 minutes to 2 hours, with some routes only offering peak service. There are 555 daily arrivals 551 departures.

PVTA estimates that their ridership at the terminal ranges from 3,000 to 6,000 per day; Peter Pan had estimated PVTA riders at 8,000 to 11,000 per day. PVTA appears to count transferring riders once at the terminal while Peter Pan is counting them twice. The maximum number of riders waiting at one time is estimated to be 170 on weekdays (14 passengers per 12 bays); 125 on Saturdays (11.5 passengers per 11 bays); and 60 on Sundays (10 passengers per 6 bays). An estimated 1.6 million annual boardings occur at

the terminal. Ridership trends have been flat or declining until the recent surge in fuel prices.

There is some transfer activity between the intercity carriers and PVTA. Based upon similar locations, PVTA could account for 10 percent of the intercity bus passenger activity.

BUS ACTIVITY

PVTA currently uses 12 bus bays, which consist of 8 head-in bays at the SBT and 4 on-street bus bays on Liberty Street. On Saturdays, maximum bay usage is 11 bays; on Sundays, the maximum bay usage is 6 bays. Buses do not have assigned bays; they pull up to whichever bay is available; the dispatcher announces the bay assignment. There is some effort at a pulse, but the schedules are not strictly coordinated.

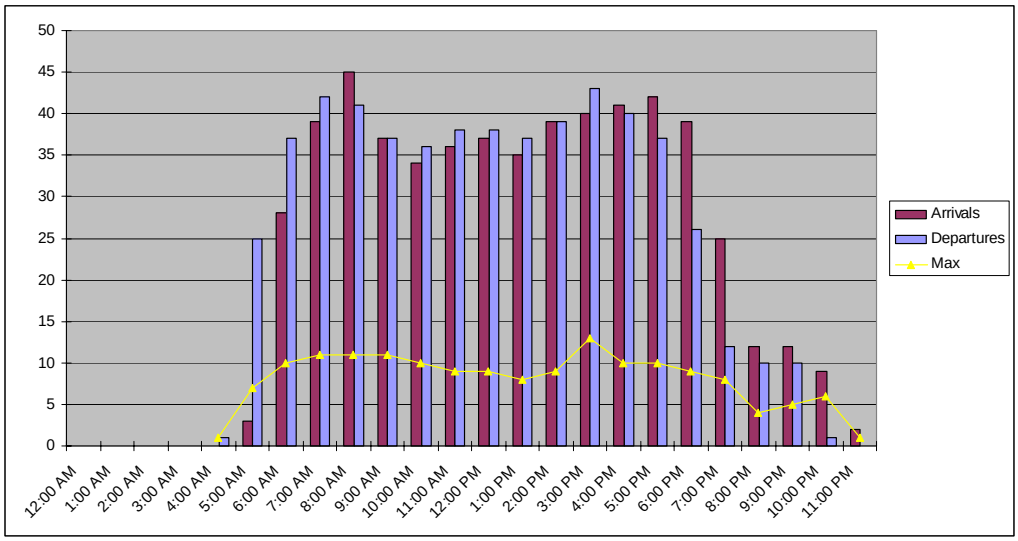
Past estimates of future demand have indicated a need for 6 additional bays for the following purposes:

- 1 bay for passenger drop offs for buses going out of service
- 1 bay for buses out of service due to mechanical or other reasons
- 1 spare bay
- 3 bays for future service expansions

At a new facility, the bus bays should be pull-through or some other arrangement that does not require the bus to back up.

Bus sizes are 30, 35, and 40 foot buses; most of the fleet is the larger buses. No articulated buses are in the fleet, but some bays should be designed to accommodate them in any new facility. Buses have an approximate 5 minute layover, while the operator takes a break at the SBT.

The chart below shows arrival and departure activity by hour of the day. Also shown is the peak accumulation of buses, defined as buses arriving/departing within a 5-minute window.



Peak bus accumulation occurs at 3 PM, when 13 buses are at the terminal at the same time. From 6 AM to 7 PM peak bus accumulation is in a narrow range between 8 and 13 buses. The maximum bus accumulation during most peak hours is 10-11 buses, with a 9-bus accumulation during most midday hours. Little bus activity occurs between 11 PM and 5 AM, with only 2 arrivals and 1 departure during these hours.

Access to the SBT is along Main Street, with buses traveling in both directions, that is, to and from downtown.

DESIGN/SPACE CONSIDERATIONS

In light of the current bus activity, 11-12 bus bays will accommodate the peak bus arrivals; the one exception at 3 PM can be modified to eliminate the need to add one bay for just one five-minute period. Based upon previous planning work, another 3 bus bays are needed for potential expansion, resulting in 14-15 bus bays. The remaining bus bays requirement previously identified does not need to occur at the principal loading platform; buses out of service, for example, can be in a lay-by location away from the platform.

PVTA currently has an approximate 150 square foot dispatch office, located within sight of the bus bays. In a new facility, they would like to have public restrooms, a customer service office and a drivers' break room. A customer-service booth is also desired. An estimated space amount is 300 square feet total.

In the funding application for the off-street parking grant, it was identified that 60 parking spaces were required for PVTA. A reasonable assumption is that the current activity level could require 45-60 parking spaces. While parking is currently available behind the SBT, the daily parking charge far exceeds the daily bus fare. No riders are assumed to park & ride at the SBT, but if convenient, free, and secure parking was provided, some riders would choose to use it. Based upon experience in other cities, this usage could be as high as 3 percent of the originating boardings.

TRANSIT VISION & SPACE/OPERATIONAL PROGRAM

This chapter is organized as follows. This first section describes the overall transit vision of Union Station. The second section describes the space planning needs for each travel mode, including supporting retail space to complement the transportation elements.

OVERALL MULTIMODAL TRANSPORTATION CENTER VISION

The revitalization of Union Station will dramatically change the look and feel of the northwestern side of downtown Springfield. Located in an area of lower-density development between the railroad and I-291, Union Station offers the potential to spur development. It can do so by increasing the level of activity on the northwest side through bringing in transit patrons from all travel modes in one convenient place, and by removing a long-standing vacant building. An active and attractive building located on one of the major freeway arteries into downtown should help spur development. With proper encouragement, the entire area between downtown and Mercy Hospital could be developed with higher densities, and in a way to encourage transit use. A revitalized Union Station cannot accomplish this redevelopment by itself, nor overcome a generally depressed real estate market, but it can serve as a focal point for development that is looking for a place to occur.

A successful multimodal transportation center at Union Station offers the following advantages:

- Increases transit use – by creating an attractive space where users can conveniently transfer among modes, ridership on all modes will increase. Improving the passenger experience will increase the viability of transit as an option for more downtown employees and residents.
- Establishes a transit identity – Union Station will be a focal point for transit service in Springfield, increasing the ease for new and casual users to find transit and understand how to use the systems. The station itself becomes a critical component of a transit marketing campaign.
- Plans for future modes – one major new transit mode is planned for Springfield. The New Haven-Hartford-Springfield (NHHS) commuter rail system is currently under study, as is its possible extension north to Vermont. Union Station can foster this service by preserving space for its implementation and by creating a pleasant transit environment for riders.
- Creates a gateway destination – by establishing an active, attractive space that serves more than just transit users, Union Station becomes the northwestern gateway into downtown. Instead of passing a derelict structure, the revitalized Union Station becomes an attractive welcoming feature, not only for transit users, but also for private vehicles entering downtown from I-291.
- Supports development – by creating a destination space, Union Station will foster spillover development on nearby parcels. Through proper controls, this development can increase the current density and value of the area.

The benefits of revitalizing Union Station are considerable, but they will not be without some challenges to implementation. The major challenges that have to be faced include:

- Coordination among multiple parties – while it is desirable to have all modes connecting, and have public and private interests involved in development decisions, there are numerous challenges in coordinating the desires and schedules of these diverse groups.
- Engineering – restoring an historic building and reopening a tunnel under active railroad tracks present numerous challenges. Fortunately, the building is empty and Amtrak's current passenger operations are on the other side of the tracks, which will allow construction to occur without disrupting passenger services.
- ADA Requirements – the ADA requirements for rail passenger platforms is in a state of flux. To prepare for any eventuality, funds should be set aside for the most costly option of having to raise the three platforms away from the through freight lines to an elevation of four feet for the entire length of the platform, restoring the stairwells for each platform, and installing a new passenger and freight elevator for each platform.
- Cost – the cost of Union Station, both for construction as well as for ongoing building and transit operations must be a principal concern. Equitably distributing the costs among the transit modes and the private sector must be determined at the outset to maximize the available funding from all sources, including governments at all levels and the private sector.

OPERATIONAL VISION

Based upon the discussions with the multiple stakeholders associated with this project, a vision has emerged for what the parties desire to accomplish. Some of these desires may conflict with one another, but techniques and good design through this process and continuing through implementation will allow most of the conflicts to be resolved.

- *Establish walkable connections among all passenger modes*
- *Create an active and attractive space*
- *Improve local bus operations*
- *Provide capacity for future commuter rail*

MODAL CONNECTIONS

Since at least 1991, when the Intermodal Surface Transportation Efficiency Act (ISTEA) was signed into law, federal transportation policy has sought to encourage intermodal passenger connections. As the Bureau of Transportation Statistics (BTS) notes in its special report on intermodalism[4], "The intermodal terminal is a key building block for developing connectivity because travelers can only transfer directly between modes if there is a place to do so." The vision for passenger travel in Springfield is for Union Station to be that place.

Currently in Springfield, excellent multimodal connections are provided between intercity bus service and local bus service. All of the Pioneer Valley Transit Authority (PVTA) Springfield bus routes connect with all intercity bus routes at the Picknelly Terminal,

[4] Bureau of Transportation Statistics. Making Connections: Intermodal Links in the Public Transportation System, Special Report. September 2007

diagonally across from Union Station. Riders can seamlessly transfer from one bus mode to the other without having to walk between locations.

Intercity train service, however, has limited connections with the other modes. While the walking distance from Amtrak's station to the Picknelly Terminal is only 1100 feet, the walking environment is not attractive, and involves a walk along a blank wall of the viaduct. The railroad viaduct separates the two terminals, which creates a psychological barrier as well.

Specific information on transfer activity among modes in Springfield was not available. Research conducted in other areas of the country suggests that providing connections within the same terminal can result in significant levels of intermodal transferring. The I-95 Corridor Coalition study examined trip making for the 12 northeast states along I-95 and compared their patterns with the other 38 states. Outside of the northeast, the study found that at Amtrak locations at the non-home end of the trip, such as would be the case for downtown Springfield, 20-25 percent of the trips used public transportation, and another 10 percent used taxis. In the northeast, the percent usage was even higher, with public transit used for 25-30 percent of the trips and taxis used for 30-35 percent of the trips. At intercity bus stations outside of the northeast, more than 10 percent of the travelers used public transit at the non-home end of their trip, with another 10 percent using taxis. Usage was even higher in the northeast, with nearly 40 percent of intercity bus passengers using public transit at the non-home end, with taxi usage similar at about 10 percent.

The implications for the Union Station are that, if the national patterns hold, 20 percent of the passenger rail users will arrive/depart by public transit, 10 percent of the intercity bus passengers will arrive/depart by public transit, and 10 percent of both intercity rail and intercity bus passengers will arrive/depart by taxis. If the higher capture rates of the northeast are realized, the transferring level could increase to 25-30 percent of rail passengers and 40 percent of intercity bus passengers. While bus-to-bus transfers are unlikely to increase since they already share a terminal, the connections with Amtrak are likely to result in an increase in the rail ridership. These connections will be a critical element in helping the future commuter rail system meet its ridership potential.

IMPROVED PASSENGER AMENITIES

Besides the practical objectives of bringing together the multiple transit modes into one space and addressing the needs of a new market of commuters, the vision for Union Station is to create an attractive location for all transit users and for the public at large. Simply creating a place to change travel modes is not enough – the building should be viewed as an overall asset for the community.

The existing Picknelly Terminal and Amtrak station provide a climate-controlled environment with seating and restrooms. The Picknelly Terminal also has a choice of fast-food restaurants and a sundries shop. Intercity bus passengers have information displays on bus arrival and departure times. A renovation is scheduled to get underway in 2008 to upgrade the HVAC system and add an additional fast-food restaurant. Compared with

many similar sized cities, Springfield has more passenger amenities and a more comfortable waiting environment for intercity passengers.

Even so, there are improvements that are warranted. The original portions of the Picknelly terminal are nearing 40 years old. The building has been heavily used during that time, particularly during the past 10 years since PVTA moved in. The one convenience store offers a limited shopping opportunity, and no retail services, such as dry cleaning or drug stores, are available. The waiting space for local bus passengers is inadequate. Little seating is provided, and most passengers wait outside, under cover, on small, cramped platforms. (No PVTA customer service center is provided, although one previously was located at the Picknelly Terminal). Customer service is provided at the dispatch center. Riders do not have any information displays telling them the bus bay location for their route; instead they must wait for a loudspeaker announcement due to the dynamic bay assignment used by PVTA. PVTA will be implementing these improvements over the next several months.

Outside of the Picknelly terminal, there are a few restaurants, a post office, and some medical offices available, but little else. Most of these locations are not readily apparent from the terminal. From the Amtrak station doorway, only empty storefronts and one lounge are visible. Passengers on all modes are essentially captive to their terminal/station, with little to do either inside or out.

The Amtrak building is even older, nearing 60 years old. Neither location provides the quality waiting environment that is desired in a modern, multimodal facility. No amenities are provided that would appeal to commuter rail users, namely retail opportunities, a pleasant waiting environment, wi-fi access, and other amenities that allow these passengers to make productive use of their time. A new, modern facility will serve to attract more riders, particularly those who have a choice of how they travel.

INCREASE OPERATIONAL EFFICIENCY

The Picknelly Terminal was designed as an intercity bus terminal. Bus bays are all oriented as head-in bays. Such an arrangement works best for intercity services where buses dwell for an extended time, but this orientation is inefficient for local bus operations with short dwell times. The revitalized Union Station can be constructed to provide separate bay orientations for each mode, improving the efficiency of local bus operations.

Intercity buses typically stay in their bay for 20-30 minutes while loading and unloading. Passengers load and unload at the single bus door, located near the building entrance. When departing, buses back out of the bay, which can be time consuming, but this is a small time penalty compared with the overall time spent in the bus bay. Local bus operations, in contrast, unload passengers through two doors and rarely spend more than five minutes at a bus bay. The head-in bus arrangement increases passenger congestion since passengers using the rear door must walk in a confined space between buses. The time spent backing up a local bus is relatively large compared with the dwell time in the bay. Because of these factors, local bus operations are more efficient when the bay orientation is shallower. Shallow bays allow passengers using the rear door to directly

access the platform without having to squeeze between buses, and the shallow bays allow buses to independently arrive and depart without having to back up.

The Picknelly Terminal arrangement increases PVTA's operational costs by increasing the time each bus must spend at the terminal, loading and unloading passengers, and then backing out of the bay. PVTA also has a person on full-time duty at the terminal to assist buses in backing up, and ensuring that no passengers are behind the bus.

The new Union Station arrangement, with bays oriented for local bus needs, will eliminate these costs and delays.

ADDITIONAL RAIL SERVICE

Two separate commuter rail efforts are underway. Both of these efforts are designed to attract a new group of choice users to public transit. Besides the NHHS commuter rail to the south, initial planning efforts on the I-91 Knowledge Corridor commuter rail to the north have begun. This rail service would connect Springfield with Holyoke, Northampton, and Greenfield in Massachusetts, and other locations further north into Vermont. To attract these users, an attractive, convenient station facility must be provided. The revitalized Union Station should be that facility.

Planning for commuter rail service connecting Springfield with Hartford and New Haven, CT is underway. The initial feasibility and implementation studies have been completed, and environmental studies have now commenced. As currently envisioned, the New Haven-Hartford-Springfield commuter rail would nearly double the number of weekday trains between Springfield and New Haven. A more even headway of approximately every 30 minutes would be offered. Passengers would have convenient trains scheduled for traditional work hours in the three major cities, as well as for connections into New York City.

The existing Amtrak facilities are not conducive to a commuter service. The most notable amenity lacking is the provision of convenient and inexpensive parking. Due to the separation of the local and intercity bus modes from Amtrak, all commuters would be expected to arrive by private vehicle, and few public parking decks are within a short walk. None provide a sheltered connection to the Amtrak waiting area. There is no convenience retail at the station or in the immediately surrounding area.

Commuter rail service to Springfield also faces some hurdles. The chief among these is the lack of an easy connection to distributor bus routes. While some downtown destinations are within a short walk of the Amtrak station, most are not, including Bay State Medical and Mass Mutual. The connections to a shuttle bus must be quick and easy to appeal to commuters, and the current connections through a walk to the Picknelly Terminal are not.

BUILDING VISION AND SPACE REQUIREMENTS

This section of the report presents the programmatic requirements for Union Station. This discussion begins with an overview of the estimated passenger demand at the facility. All space requirements are based upon this estimated demand.

For ease of reference, the building requirements have been divided into the interior elements and the exterior elements. Interior elements include the space requirements for waiting areas, baggage handling, and associated office space. Included in the interior space calculations is the space requirement for retail activities that can be supported by transit patrons. Additional retail tenants may be desirable in the building, but this additional space cannot be supported by transit patrons alone; additional patronage from non-transit riders would be required. Exterior elements include the vehicle loading space, parking requirements, and connections for other modes, such as taxis.

PASSENGER DEMAND

- *Total weekday boardings expected to exceed 8000 patrons*
- *Total annual passenger movements (boardings + alightings) are expected to exceed 3.8 million patrons*
- *More than two-thirds of the patrons are on PVTA*
- *New commuter rail service that is projected to double rail ridership*

The space requirements for Union Station will be based upon the space needed to support the projected passenger and vehicle demand. Passenger demand has been based upon existing patronage plus forecasts for patronage on future modes, however, no specific ridership forecasts have been prepared for this study. Instead, ridership has been estimated based upon forecasts prepared by previous studies that focused on an individual mode's demand.

The table below summarizes the expected patronage by mode for both the annual passenger movements as well as the average daily boardings. Passenger movements include both boardings and alightings, while the boarding estimate only covers patrons getting on a transit vehicle. Each component is important in sizing the facility since some elements will be based upon the number of patrons waiting to board, while other elements will be based upon the number of people moving through the building.

Mode	Annual Passenger Movements	Average Weekday Boardings
Existing Services		
PVTA	2,620,000	5,800
Peter Pan Bus Lines / GREYHOUND	960,000	1,900

Mode	Annual Passenger Movements	Average Weekday Boardings
AMTRAK	110,000	300
EXISTING TOTAL	2,050,000	4,000
Mid-Term Services		
	120,000	300
TOTAL		
TOTAL PASSENGERS	3,810,000	8,300

No projections were provided for changes to any mode's ridership. Essentially, all modes are projecting flat ridership. PVTA indicated they expected flat ridership over the foreseeable future, unless there are funds available to improve service levels.
The New Haven-Hartford-Springfield commuter rail study included two ridership projections – a conservative level and an aggressive ridership level. The table above reflects the aggressive ridership projection. No ridership estimate has been prepared for the I-91 Knowledge Corridor. The analysis of this service is only beginning in 2008. Based upon the population along the corridor compared with the NHHS corridor, ridership levels are anticipated to be lower.

INTERIOR ELEMENTS

- *Central grand lobby space provided for all modes*
- *Lobby includes ticket counters, baggage handling, and the majority of waiting space and retail*
- *Smaller departure lounges with convenience retail provided nearer boarding platforms, primarily for intercity services*
- *Office space provided for transit functions only; market office space would be in addition to estimated space*
- *Overall transit space requirement is 28,000 square feet; all but 2,000 square feet are based upon existing modes*
- *Additional tenant space could include PVTA's headquarters (12,000 sf); Peter Pan's headquarters (16,000 sf); Amtrak crew base (700 sf); Amtrak Police (600 sf)*
- *Transit-supported retail space (included in overall) is 7,000 square feet*

The principal passenger flow is anticipated to be through the central lobby, although experienced users can go directly to their platform area if they do not need to interface with a ticket agent. PVTA passengers can flow through the lobby or directly proceed to their boarding platform as they do at the current terminal. A small customer service area will be located near the exit doors for the platform. Intercity bus passengers will buy their tickets in the central lobby and either wait there, or precede to a smaller boarding lounge near their platform exit doors. Amtrak passengers will buy their tickets in the central lobby and wait there until time for their train to board. They will then proceed through the tunnel to

the stairs/elevator to their boarding platform. Commuter rail passengers can either flow through the central lobby, or enter from Lyman Street and proceed up the stair/elevator to their boarding platform, assuming that the commuter trains are always assigned to the same platforms.

The space requirements for the building interior are based upon the expected passenger levels. The space has been calculated using design guidelines for each of the major intercity modes, including Amtrak's facility planning guide and Greyhound's guidelines. The general guidelines have been augmented by additional guidance from the local staff, and by an architectural review for Amtrak and intercity bus. The space requirements should be viewed as a general indicator of the space needs. A more complete analysis of the individual mode's needs and how it would fit within Union Station is required before a final determination can be made.

No guidelines exist for estimating the amount of retail space that can be supported by transit users. This space requirement has been estimated using guidelines prepared for the airline industry, adjusted for the differing waiting characteristics of the individual mode patrons and actual terminal usage from other locations around the country. It is considered to be a reasonable estimate, but it has some degree of uncertainty. The overall estimate, however, is in line with the amount of successful retail that has been provided at other intercity bus and rail facilities that rely on just transit patrons. Additional retail space can be provided if other patrons are drawn to Union Station besides just riders on the transit service.

The following table shows the projected space needs for each transit mode. Included in these numbers are the space requirements for passenger waiting, baggage, offices, and other support space. Also included is the amount of retail space that each mode's passengers could be expected to generate. These space numbers do not represent the amount of space each mode would have to "rent", nor does it include boarding space at platforms.

Mode	Overall Space (square feet)	Optional Space (square feet)	Total Space (square feet)
Existing Services			
PVTA	4,200	12,100	16,300
Peter Pan Bus Lines / GREYHOUND	16,900	15,900	32,800
AMTRAK	4,700	1,300	6,000
EXISTING TOTAL	25,800	29,300	55,100
Mid-Term Services			
CONNECTICUT COMMUTER RAIL	1,900		1,900

Mode	Overall Space (square feet)	Optional Space (square feet)	Total Space (square feet)
	TOTAL		
TOTAL SPACE	27,700	29,300	57,000

Central Lobby Space

The majority of the interior building space will be dedicated to the central lobby. Riders on all modes will most likely enter the building through this space. Overall, the central lobby space is about 20,000 square feet. The following summarizes the assumptions for the lobby space:

- Central hall for retail, baggage handling, auto rentals, courtesy phones
- Approximately 75 percent of train passenger waiting will be in lobby area, requiring an estimated 115 seats
- Baggage handling is required for Amtrak and Peter Pan/Greyhound modes; passengers may be required to carry their own baggage to their vehicle, depending upon the policies of the operators
- Approximately 80 percent of retail will be in lobby area; departure lounges will have vending machines only
- Any shared facilities, (e.g. restrooms, smoking lounge) would be located in the central terminal lobby or directly adjacent
- No specific space has been set aside for security screening for passengers or baggage

The central lobby will include the majority of the seating and waiting areas for train passengers, including any visitors that are there to meet arriving passengers or send off departing passengers. The majority of this space will be for the Amtrak/commuter rail passengers since intercity and inner city buses have their own waiting areas closer to the bus berths. An example of this operation is New Haven, CT, which has a large display announcing pending train departures, shown at the far end of the hall.

Most of the retail space will be located within the central lobby. This space can be a combination of kiosks located out in the lobby area as well as separate spaces off to the side, primarily for kitchen and related counter needs. Seating for retail patrons will be intermingled with seating for departing passengers. The amount of transit-supported retail is modest, but with additional office or residential uses on upper floors or in surrounding blocks, more retail space can be provided. As a guide, a fast-food restaurant requires about 750-1500 square feet for kitchen, counter, and queue space, while a sundries shop requires about 500-700 square feet.

No Transportation Security Administration (TSA) guidance has been issued on screening passengers for any of the Union Station modes, so no specific space has been provided for this function. Based upon airport guidance, 100-150 square feet could be required if all passengers were screened.

Intercity/PVTA Departure Lounges

Separate departure lounges should be provided for the bus modes. These lounges should be located closer to the passenger boarding areas. They will be used for the passengers during the time they are in the facility waiting for the bus.

These lounges will include seating, since passengers will be in them for an extended period. PVTA will have their own departure lounge, although smaller, since the passengers would likely wait at the boarding platforms.

Transit Passenger Office Space Requirements

All of the transit modes require some amount of office space to support their customer interface requirements. The amount of office space varies considerably based upon how much interaction is anticipated to occur. The regional and local providers (PVTA and the future commuter rail) do not require much space since the majority of their patrons will not need assistance. These patrons are generally more familiar with the system, do not carry baggage, and purchase their fares either on-board or in advance of arriving at Union Station. A single, small office for one agent should suffice.

The intercity providers require more space since more ticket and baggage agents are required to process their patrons. Peter Pan / Greyhound estimates that they need space for ticket agents and the associated office space, a dispatcher's office, a drivers' break room, and a training room. Amtrak has similar requirements.

Optional Transit Office Space Requirements

Several ancillary office space users could be located within Union Station. These users are not directly related to passenger functions and so do not necessarily need to be located in the passenger building, but they could be additional tenants. If located in Union Station, these uses could be on the upper floors instead of at ground level.

PVTA's headquarters are located away from downtown in a renovated city firehouse. Since this building was originally designed for a significantly different function, PVTA has made some sacrifices in their space arrangement to fit within the building. Relocating the headquarters to Union Station may allow for a more efficient space layout, and would allow headquarters staff to be more closely attuned to service quality. Based upon discussions with PVTA staff, the program requirements are estimated to be 12,100 square feet – less than the 16,800 square feet in the firehouse location.

Peter Pan's headquarters are another possible tenant. The headquarters use could stay in the existing Picknelly Terminal, owned by Peter Pan, or it could move to Union Station. Based upon an estimate prepared by their architect, the headquarters function would need 15,900 square feet.

Amtrak has two uses that do not necessarily need to be in the passenger building. These uses are for a crew base and for the Amtrak Police. The crew base needs 725 square feet and the police need 550 square feet, for a total space requirement of 1275 square feet. These users could also be located in the current head house when the passenger activity is moved to Union Station.

EXTERIOR ELEMENTS

- *Three groups of boarding platforms are required – Amtrak & commuter rail; Peter Pan / Greyhound intercity bus; and PVTA local bus*
- *ADA requirements for rail platforms in flux, but high-level platforms are assumed*
- *Parking space requirement estimated at 260+ daily / overnight spaces*
- *Additional parking required for drop-off and hourly needs, estimated at 80 spaces*
- *Eight (8) taxi stands required*

The exterior elements covers the conceptual needs to accommodate the vehicles providing the transit services, as well as other access modes, principally parking. Transit vehicle space has been estimated based upon the operating plan for each mode. Parking requirements have been estimated from the best available sources.

Platform Space

Platform space is required for trains; the intercity services can share platform space with the future commuter rail service. Separate platforms will be required for intercity and local buses due to different bus requirements and the different usage patterns of the passengers.

The following summarizes the platform requirements:

- Amtrak has four current platforms, two of which serve two tracks each, for a total of six boarding locations. Based upon current Amtrak schedules, a maximum of two trains are boarding/alighting within any given hour. Under the potential commuter rail schedule, a maximum of three trains will be boarding/alighting within a single hour. This train activity level can be satisfied with just the two platforms furthest from Union Station (and the through freight tracks), since one of the platforms serves two tracks. Even if a fourth train boarded/alighted during the same hour, the existing number of platforms and side tracks are sufficient for passenger operations.
- Platforms must be ADA-compliant – under current FRA regulations, these platforms will need to be 48" high for the length of the train, currently 1000 feet; platforms must be straight to minimize gaps with the train

- If commuter rail service is implemented, it will be able to use the intercity platforms
- Peter Pan / Greyhound needs 10-12 bus bays with a head-in orientation (1-3 more than current)
- PVTA needs 12-15 saw tooth bus bays (12 for current levels, 15 for growth); the additional bays could be located on street, as are some of the current bus bays.

Parking Space Requirements

Only Peter Pan currently provides any parking; 13 15-minute spaces are provided adjacent to the building, primarily for the package express. Paid parking is available in the vicinity of all modes, although only short-term parking is available near Amtrak, and overnight parking near the Picknelly Terminal is unsecured.

Parking space requirements have been estimated by a combination of the design guidelines for each mode (where specified); actual experience from other locations; or the previous parking grant application. The major parking need comes from the future commuter rail, closely followed by the existing Amtrak service. Total parking demand has been reduced by 15 percent to account for the ability of each mode to share spaces due to the different peaking periods for each mode. Parking can be shared among the modes as long as there is easy access to the central lobby.

Mode	Kiss & Ride / Hourly Spaces	Daily / Overnight Spaces
Existing Parking Need		
PVTA	14	44
Peter Pan Bus Lines / Greyhound	26	44
Amtrak	17	86
EXISTING TOTAL	57	174
Mid-Term Parking Need		
Connecticut Commuter Rail	25	91
TOTAL NEED		
TOTAL PARKING	82	265

The above requirements could be considered as being on the high side for the two bus modes. The estimate, however, is based upon actual experience at other locations and can be viewed as the upper potential demand if free, secure parking is provided. The

parking needs for the rail modes is judged to be reasonable based upon nationwide experience and in light of the existing and projected ridership.

An additional 50-60 spaces could be required for employees, based upon current demand. Actual spaces should reflect the city code.

Taxi Stands

None of the design manuals provide a method for estimating taxi stand requirements. Future demand has been estimated based upon the access mode split for taxis from the I-95 Coalition study. Based upon this mode split and the ability to share taxi stands at a combined terminal, Union Station will need an estimated eight (8) taxi stands. Taxis can stage on Frank B. Murray Street in front of the station.

Street Circulation Impacts

The bus circulation patterns will essentially be the same as the current pattern, given that the bus activity is only moving diagonally across the street. One change that will need to be made is to permit vehicles to make a left-turn on from Main Street to Frank B. Murray Street and to permit vehicles to make a left-turn from Frank B. Murray Street on to Main Street heading into downtown. See Appendix A for Option One, Two and Three Circulation Drawings.

REAL ESTATE MARKET CHARACTERISTICS SUMMARY

Real Estate Market Characteristics Summary

Following is a summary of the economic and real estate market conditions which form the back-drop for the Union Station Redevelopment Plan and Project Implementation Strategy. This addendum summarily reviews the national and regional forces affecting the project and then looks at the dynamics surrounding specific use categories in the City of Springfield and relates their potential viability to the project.

Current General Economic Outlook

National Outlook

As has been widely reported, the US economy has remained generally weak throughout 2007 and the first half of 2008. Residential and commercial real estate, while varied, is weak across most of the country. Residential real estate continues to be a drag on the overall economy and consumer credit continues to soften. Input prices, including those for commodities, energy, metals and others continue to increase, with oil prices being a prime driver in overall input costs. Wage growth remains limited except in a few areas for certain skilled labor positions. The general outlook for the near term is for the economy to continue to be soft but stable with the national economy maintaining modest or nominal growth.

Regional and Local Outlook

The current regional economy mirrors the national outlook in the very near term, with weak or nominal growth. While the national economy is forecasted to improve somewhat by the end of this year, Springfield and the surrounding area is anticipated to remain relatively stable with only nominal gains in population and employment for a 3 mile radius around the project as well as within the 3 County area. Similarly, the outlook for the City of Springfield as a whole is for slow growth as shown in the following charts:

3 Mile Radius				3 County Area		
2007	2012	change	Indicator	2007	2012	change
8.17%	8.19%	0.02%	**Unemployment Rate**	5.43%	5.15%	-0.28%
133,979	133,790	-0.14%	**Population**	687,525	692,195	0.68%
$145,455	$166,265	14.31%	**Existing Home Price**	$213,716	$262,311	22.74%

Table 1 : Regional and Local Outlook

Indicators	2007	2008	2009	2010	2011
Gross Metro Product, $B	23.0	23.3	23.6	23.9	24.1
% Change	*0.9*	*1.1*	*1.2*	*1.2*	*0.8*
Total Employment (000)	294.2	295.1	296.7	298.7	300.0
% Change	*0.5*	*0.3*	*0.5*	*0.7*	*0.4*
Unemployment Rate	5.4	5.5	5.2	5.1	5.2
Personal Income Growth	5.9	3.1	3.2	3.3	3.3
Population (000)	687.5	688.6	689.6	690.5	691.4
Single-Family Permits	995	863	1,217	1,292	1,257
Multifamily Permits	126	34	46	71	78
Existing Home Price ($Ths)	213.7	210.7	224.5	238.2	249.8
Mortgage Originations ($Mil)	4,049	3,168	3,500	3,725	3,840
Net Migration (000)	0.3	0.0	-0.2	-0.3	-0.5
Personal Bankruptcies	1,402	1,936	2,176	2,374	2,426

Table 2: Springfield SMSA Projections

Real Estate Market Sectors – Project Area Market Conditions and Metrics

Office

The downtown Springfield office market is very competitive; there is a relatively large supply of space (~500,000 SF of vacant Class A space as of January 2008) relative to demand. Office buildings in the downtown area sell for $35 - $120/SF. Rental rates (annual full service) for Class A space in downtown are generally in the $15-20/SF range.

Industrial, Flex and Warehousing

The industrial sector is contracting in the Springfield area with a decrease in jobs and output forecasted. Therefore, the demand for industrial space will continue to lag supply. As a result, typical rental rates are approximately $5/SF (NNN). These low rates make the prospect of bringing new supply on-line as part of the project infeasible.

Retail

A survey of the retail market place within the vicinity of the project shows few gaps between supply and demand with most categories indicating a surplus of retail supply within the .6, 3 and 5 mile radii. This data indicates that for retail to succeed within the project, demand must be generated by the project itself, in a localized manner.

Retail Stores	Demand (Consumer Expenditures)	Supply (Retail Sales)	Opportunity Gap/(Surplus)
Radius 1:SPRINGFIELD, MA 01103, 0.00 - 0.60 Miles, Total			
Total Retail Sales Incl Eating and Drinking Places	$86,064,687	$169,869,069	($83,804,382)
Radius 2: SPRINGFIELD, MA 01103, 0.00 - 3.00 Miles, Total			
Total Retail Sales Incl Eating and Drinking Places	$1,700,138,127	$2,346,773,984	($646,635,857)
Radius 3: SPRINGFIELD, MA 01103, 0.00 - 5.00 Miles, Total			
Total Retail Sales Incl Eating and Drinking Places	$3,420,579,177	$3,863,880,509	($443,301,332)

Table 3: Retail Market Supply and Demand

Residential

Sales remain slow, but prices are stabilizing. Springfield is predominantly a single family market with demand lower for multi-family product. This weak demand coupled with low market prices and rents make residential development within the project area difficult if not impossible. Sales prices for existing condos within the downtown area average approximately $115/SF. The pricing range for all types of ownership housing is $80 to $120/SF. These values do not support new construction or substantial rehabilitation/conversion in the downtown area.

Sources/References: Claritas – MarketPlace; The Federal Reserve Board - "The Beige Book"; Colliers International – various reports; Moody's Economy – Précis METRO; Property& Portfolio Research, Inc. – PPR Fundamentals; interviews with various area real estate professionals.

Achievable Rents at Site:

The following table summarizes our estimates of "Achievable" rents at the Union Station site in the next year to 18 months. It is based on our analysis of the local real estate market trends (including, in addition to the above summarized real estate research, interviews with key local commercial brokers and development interests) and the locational attributes of the site relative to the larger "Downtown" market.

Rents are quoted in $ per square foot per year of Net Leaseable Space (i.e. excluding common corridors and areas).

Use	Vacancy Rate/Empty Space-Units	City of Springfield Rent Low	City of Springfield Rent High	Achievable Rental Rate at Site	Terms
Class A Office	~500,000 sf	$ 14	$ 20	$ 15	Full service (includes TI's)
Class B Office		$ 11	$ 13	$ 12	Full service (includes TI's)
Med Ofc. (off-site)		$ 10	$ 19	$ 15	Full service (includes TI's)
Retail	15 to 20%	$ 7	$ 18	$ 11	NNN (white box)

Table 4: Summary of Market Rents for City of Springfield and at Site
(mid 2008 conditions)

LETTERS OF INTEREST

- Pioneer Valley Transit Authority
- Pioneer Valley Planning Commission
- Square One

PVTA

September 16, 2008

Mr. David Panagore, Director
Springfield Redevelopment Authority
36 Court Street
Springfield, MA 01103

Subject: PVTA Letter of Interest
Union Station Intermodal Transportation Project

Dear Mr. Panagore:

This letter will confirm the interest of the Pioneer Valley Transit Authority in moving its administrative offices to Union Station as part of the PVTA's joint effort with the Springfield Redevelopment Authority (SRA) to redevelop the historic station property as an Intermodal Transportation Center (ITC). The redevelopment plan, which will enable Union Station to serve this new and expanded function, calls for restoring many of the terminal building's signature architectural and historical features, and envisions the property as a linchpin for revitalization of the surrounding neighborhood. This effort is the result of a year of study and planning by a team led by the PVTA and the SRA.

PVTA administrative functions will occupy approximately 18,000 square feet in the Union Station ITC, and a 2,500-square-foot conference center which will be shared by the other transit providers located in the proposed center.

The station redevelopment project is expected to integrate transit and transit-related uses. The ITC will house PVTA bus operations as well as private intercity bus carriers and passenger rail service, while transit-related components are expected to include commercial, institutional and/or educational uses.

We look forward to continuing our partnership with the SRA as we finalize plans for redeveloping the Union Station ITC and complete our specific occupancy and space layout requirements.

Sincerely,

Mary L. MacInnes
Administrator

MLM/cms

Pioneer Valley Transit Authority **address:** 2808 Main Street, Springfield, MA 01107 **phone:** 413.732.6248 **fax:** 413.737.2954 **web:** www.pvta.com

Catalyst for Regional Progress
PVPC
Timothy W. Brennan, Executive Director

September 19, 2008

Ms. Mary MacInnes, Administrator
Pioneer Valley Transit Authority (PVTA)
2808 Main Street
Springfield, Massachusetts 01103

Mr. David Panagore, Director
Springfield Redevelopment Authority
36 Court Street
Springfield, Massachusetts 01103

Reference: Expression of Interest in Occupying the Proposed Union Station Intermodal Transportation Center

Dear Ms. MacInnes and Mr. Panagore:

After receiving an authorization from the Pioneer Valley Planning Commission's Operations Subcommittee earlier this week, I am writing to express the Planning Commission's keen interest in the possibility of becoming a future tenant of the rehabilitated and revitalized Union Station Intermodal Transportation Center situated in the City's downtown area. More specifically, this letter will confirm our interest in the potential to lease approximately 20,000 net square feet on the third floor of the subject transportation facility from the Pioneer Valley Transit Authority (PVTA) and/or the Springfield Redevelopment Authority (SRA). We understand that the subject space is to be built to the specification approved by the Pioneer Valley Planning Commission's Executive Committee and said space is located wholly within the proposed Intermodal Transportation Center which will be developed at the Springfield Union Station property located at 55 Frank B. Murray Street in downtown Springfield.

As we understand it, this new transit-oriented redevelopment project is expected to include an integration of transit and transit-related uses. Moreover, the Union Station Intermodal Transportation Center will service PVTA operations as well as a private intercity bus carrier and passenger rail services. Transit-related facility components will likely include a mix of commercial, institutional and/or education uses that we expect will complement one another within this shared transportation facility.

The space referenced in this letter of interest will be utilized as the home-base and headquarters of the PVPC which is the officially-designated lead planning agency for a planning district encompassing 43 cities and towns, approximately 1200 square miles of land area and a population in excess of 615,000 residents. The PVPC encompasses New England's fourth largest metropolis and its transportation, transit and transportation related responsibilities are a core function of the agency and its mission over four and a half decades. Among the numerous transportation duties the PVPC conducts include being the lead planning entity for the Pioneer Valley's Metropolitan Planning Organization; it provides ongoing transit planning support to the PVTA; it is the region's premiere regional data and GIS mapping center; and it is responsible for a myriad number of transportation related functions including regional land use planning, air quality conformity, transportation modeling and housing and community development functions.

Based on recent and ongoing conversations with both PVTA and SRA representatives, we understand that the PVTA is now in the midst of finalizing plans for the Union Station Intermodal Center and that the PVTA anticipates it will initiate the construction work to create this new Transportation Center within the next 12 to 15 months. Assuming the project is completed in a reasonable time frame anticipated to be on the order of three to four years, our agency will be interested and prepared to take occupancy at the time the new Intermodal Transportation Center is completed and the facility opens. In the interim, we look forward to working with the PVTA and the City to negotiate our organization's specific occupancy arrangements including space layout requirements; lease terms and conditions; and associated occupancy expenses that would be charged for the space our agency would presumably occupy.

We here at the PVPC see this as an extraordinarily important and exciting opportunity for our agency, the host City of Springfield, our PVTA Transit partners and indeed the Pioneer Valley region as a whole. We thus look forward to becoming an anchor tenant in the new Union Station Intermodal Transportation Center and all the new possibilities this new facility can unleash for our Planning Commission.

Sincerely,

Timothy W. Brennan
Executive Director

TWB/ikg

cc: PVPC Executive Committee

LOI_Union Station/admin/staff/brennan/letters

Square One
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September 8, 2008

Ms Mary MacInnes, Administrator
Pioneer Valley Transit Authority
2808 Main Street
Springfield, MA 01103

Mr. David Panagore, Director
Springfield Redevelopment Authority
36 Court Street
Springfield, MA 01103

Dear Ms. MacInnes and Mr. Panagore,

Please accept this letter as evidence of Square One's interest in leasing approximately 8,000 – 10,000 square feet at the Union Station Intermodal Transportation Center from the Pioneer Valley Transit Authority (PVTA) and/or the Springfield Redevelopment Authority (SRA). The space, to be built to the specifications approved by Square One, is located in the proposed Transportation Center which will be developed at the Springfield Union Station property located at 55 Frank B. Murray Street in downtown Springfield.

If we can come to an agreement on appropriate terms, this space referenced in this Letter of Interest would be utilized for early education and care programs.

We understand that the PVTA is finalizing plans for the Union Station Intermodal Transportation Center and expects to begin construction within the next 12 months. We look forward to working with you to negotiate our specific occupancy arrangements, including space layout requirements and lease terms and conditions, including the occupancy expenses that will be charged for the space and other terms of a lease.

Sincerely,

Joan Kagan

Joan Kagan
President and Chief Executive Officer

REQUIRED APPROVALS AND PERMITTING

- List of Permitting Requirements

UNION STATION DEVELOPMENT REQUIRED APPROVALS AND PERMITTING

This listing of permitting requirements to implement the Union Station Redevelopment Plan also includes a review of the following documents from previous environmental reports and EOEA responses:

Environmental Notification Form, dated June 1998, prepared by Frederic R. Harris, Inc. (FRHI)

Draft Environmental Impact Report/Environmental Assessment Final Draft, dated December 1999 by FRHI

Draft Environmental Impact Report/Environmental Assessment, dated February 2000 by FRHI

Notice of Project Change Union Station Intermodal Redevelopment Project, dated June 2001 by DMJM Harris

Certificate of the Secretary of Environmental Affairs – Notice of Project Change, dated July 2001 by EOEA

1. State and Federal

- Massachusetts Environmental Policy Act (MEPA) certified the original Draft Environmental Impact Report (DEIR) in 2000 and the Notice of Project Change (NPC) filed in 2001. The DEIR documents the need for NEPA and FTA approvals and the requirement of an Environmental Impact Statement (EIS). The DEIR concluded that the FTA will not require an EIS. It also noted that the submission of the DEIR satisfies a major component of the Massachusetts Environmental Protection Agency (MEPA) regulations. The DEIR also documents the need for review with the Massachusetts Historical Commission/State Historic Preservation Office. The NPC alerted the EOEA to a change in the project which EOEA had granted a Final EIR Certificate in May 2000. EOEA responded in July 2001 that no further MEPA review is required since the project change reduced the size of the project and there were fewer potential impacts.

  A determination will need to be made whether another NPC or a revised EIR should be filed to reflect the current plan. The major change since the 2001 EOEA ruling is that the current project recommends the demolition of the Baggage Building and its replacement with a bus terminal and parking garage structure. This determination could be made before or after the Owner's Project Manager (OPM) or designer is selected.

- National Environmental Policy Act (NEPA) issued a Finding of No Significant Impact on the EA submitted in 2000. A determination needs to be made whether the original NEPA documentation could be revised to reflect the new plan. This determination could be made before or after the Owner's Project Manager (OPM) or designer is selected.

- The Springfield and Massachusetts Historical Commissions will need to comment on the any MEPA/NEPA revisions. The Springfield Historical Commission was presented the recommendations of the Redevelopment Plan during an unofficial hearing on December 18, 2008. The Plan's primary historic issues and solutions are: 1) that the Baggage Building be demolished and replaced with a new bus terminal/parking garage building; 2) that the Terminal Building's remaining and

undamaged original interior architectural features would, wherever economically and functionally feasible, be incorporated into the new design but that interior would not be restored "historically"; and 3) that the exterior restoration of the Terminal Building would include replacing the existing windows and other features with products that are compatible with the building's scale and original design but not reproductions of the original exterior features. The specific program and cost implications of preserving the Baggage Building were also documented and presented in an exhibit which demonstrated the practical and economic reasons for not preserving the Baggage Building. The Commission voiced no opposition to these issues and proposed solutions. The same issues in greater detail will need to be reviewed again with the Commission after the schematic design phase of the project, in advance of filing the MEPA/NEPA.

2. City of Springfield

- Memorandum of Agreement (MOA) dated December 1996 between the City, Massachusetts State Historic Preservation Officer (SHPO) and Advisory Council on Historic Preservation sets out certain requirements for recording and reviewing the demolition of a National Register property and subsequent planned future construction with the SHPO and the Historic American Buildings Survey (HABS). The stipulations of the MOA should be carried out after the schematic design phase of the project.

- Plan Approval – Springfield Redevelopment Authority (SRA)

- Site Plan Review – Planning Department review and City Council and Planning Board approval. Site Plan Review required under the new Zoning Ordinance.

- Excavation Permit – Building Department

- Water and Sewer – Water and Sewer Commission approval required for new connections or modifications of use.

- Fire Service – Water and Sewer Commission, and Fire Department

- Storm-water – DPW

- Demolition –Building Department

- Building –Building Department

- Occupancy –Building Department

- Sign –Building Department

- Fire Alarm/Sprinkler – Fire Department

- Traffic Controls – DPW

- Traffic Signs – DPW

- Roadway markings – DPW approval for any street modifications

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