

Appendix A - Project Phasing

Portland Union Station Building & Tracks Improvement Project City of Portland (City), Multnomah County, Oregon

Implementation Plan/Project Phases

The Build Alternative for the Project is comprised of two major work areas: architectural and building related improvements and trackside/rail yard improvements. Each work area has several components. The availability and securing of future funding, the need to maintain passenger and freight rail operations and keep the station building operable/usable during construction activities, and potential impacts to station users necessitate a phased approach to implementing these improvements over time. Because of these constraints, a potential phasing scenario/implementation strategy was recommended by Prosper Portland's Project consultants in which the Project as a whole could be built, breaking up the work into multiple phases, which are described below. Additional information is available in *Proposed Improvements at Portland Union Station-Implementation Plan Report, IBI Group, May 2019*.

Track Phase Descriptions

Proposed Track improvements for Portland Union Station have been subdivided into four phases.

- **Phase T1 – Passenger Crossing Relocation:** This phase would relocate the existing passenger crossing approximately 120 feet to the north in order to allow for increased train berthing capacity at the station. FRA and Amtrak would need to review and approve design plans for this phase to ensure compliance with the Americans with Disabilities Act (ADA) and the US Department of Transportation's ADA standards for transportation facilities. To accommodate the shift of the passenger crossing, a minimal amount of Main Building reconfiguration is recommended to minimize conflicts between Amtrak baggage/service vehicles and passengers boarding and disembarking trains and passenger movement to/from the Main Building concourse.
- **Phase T2 – Tracks North and South of Station:** This phase would construct rail improvements north and south of the station, including new signaling and switches. This phase also includes grade crossing improvements at NW 9th Avenue, in coordination with the Portland Bureau of Transportation. In order to allow for the planned future 15 -inch-high platform along Tracks 2 and 3, the Track 1 inspection track, the associated changes to Track 5, and the grade crossing at NW 9th Avenue must be in place. Phase T2 would complete the required improvements to allow switching and inspections on Track 1, therefore enabling the construction of raised platforms in Phase T3.
- **Phase T3 – Station Tracks, Platforms, and Canopies:** This phase would construct new tracks and platforms within the area in front of the Main Building. The approach would be to work from the Main Building outward, in order to facilitate new utility connections that pass from the building side and under the reconstructed tracks out towards the island platforms. The first step includes the construction of new Tracks 1, 2, and 3, as well as a new track 2/3 platform. Following the completion of this first step, the remainder of work in this phase would complete the utilities and construct the new Track 4/5 platform at 8 inches above the top of rail as a temporary condition.

- **Phase T4 – Construct Track 6:** This phase would construct a new Track 6 and raise the Track 4/5 platform height to 15 inches above the top of rail, similar to the new Track 2/3 platform. When/if rail traffic congestion on the mainline and/or in the Union Station terminal tracks dictates the need in the future, Track 6, which existed previously but was removed in order to accommodate residential development on the east side of the tracks, can be re-constructed. To accommodate this change, a topping slab could be installed on top of the Track 4/5 platform, which would be constructed to 8 inches above top of rail during Phase T3.

Building Phase Descriptions

The architectural resources at the station include the Main Building and the Annex. The Main Building houses Union Station passenger facilities, Amtrak rail operations and maintenance spaces, passenger concessions, and third-party leasable space (office and retail space). The Annex currently houses the boiler room, building maintenance functions, and third-party leasable space. Historically, the Annex was also used as a rail operations/crew support space. Proposed building improvements for Portland Union Station have been subdivided into three phases. Because of the extensive nature of these improvements (structural/seismic retrofit, complete systems replacement, new stairs/elevators, ADA improvements, etc.), there are few opportunities to disaggregate the improvements into stand-alone discrete elements. However, because of the need to ensure continued occupation of the site by Amtrak throughout construction, and to maintain functionality of the facility as a passenger rail terminal at all times, Prosper Portland gave careful consideration to phasing options for the Main Building and the Annex and recommends the phases described below.

- **Phase B1 – Main Building - South End:** This phase would begin renovation of the Main Building with architectural, structural/seismic, and systems work in the South End of the Main Building which is currently third-party leasable space. Pending future constructability reviews by a future Construction Manager/General Contractor (CM/GC) hired by Prosper Portland, work on the South End is anticipated to include all first floor work, certain upper floor work, crawlspace work, and vertical elements through the building such as chimney seismic retrofits and utility ducts. Minimal improvements would also be made to the Annex to prepare this space to provide temporary support for rail operations support during Phase B2; however, the existing Boiler Room would remain in operation because it is needed to support the still-occupied spaces in the North End of the Main Building that are used for baggage and ticketing. The existing Nursery addition on the rear of the Main Building would also be demolished in Phase B1. If not completed previously to support the northward shift of the Passenger Crossing (Track Phase T1), the relocation of the baggage room door and related interior configurations may also be completed during Phase B1.
- **Phase B2 – Main Concourse/North End:** This phase would include major renovations, seismic retrofits, and systems replacements for the majority of the Main Building – including all Amtrak operational spaces (first and second floors), the Passenger Concourse, South Concourse/Restrooms, Passenger Vestibule, First Class Lounge, and Clock Tower. Phase B2 includes construction of new systems in the mechanical room located at the North End of the building, in the location of the existing City of Portland garage. The North Foyer

would be constructed during this phase, including new restrooms and new ticketing/baggage facilities. The Passenger Concourse and South Concourse would be comprehensively refurbished, including temporary removal of marble panels to complete seismic retrofit work. New vertical circulation elements (stairs and elevators) would be installed. Seismic retrofit of the Clock Tower, including subterranean foundation micro-pile reinforcements and interior shotcrete/steel braced frame reinforcements, would be performed.

- **Phase B3** – Phase B3 is divided into two sub-phases as described below:
 - **Phase B3a – Main Building South End/Upper Floor Leasable:** This sub-phase would involve tenant fit-out of the South End of the first floor of the Main Building, as well as leasable spaces on the second and third floors. Prior to construction, these spaces will have been vacated by existing tenants to accommodate extensive structural retrofit and refurbishment of historic building materials and systems.
 - **Phase B3b – Annex Leasable and Annex Plaza:** This sub-phase would involve seismic strengthening and rehabilitation of the Annex, completing work initiated under Phase B1. By the commencement of Phase B3b, all temporary uses of the Annex/Annex Plaza area for rail passenger facilities, construction staging, and/or underground utility improvements will have been completed during earlier phases. Work would be completed to core-and-shell stage, to be followed by tenant fit-out based on future leasing and market considerations.

Future Track Usage

Once the Project is complete, there would be a total of six (6) tracks at the station. The proposed track usage is described below:

Proposed track usage:

- Track 1 would be used for maintenance and inspection of trains as well as longer-term storage of trains and private passenger cars. As needed, Amtrak's Empire Builder would occupy Track 1 south of the passenger crossing for several hours.
- Tracks 2 and 3 would be for loading and unloading of passenger trains, most frequently the Amtrak Cascades and the Empire Builder, though the Amtrak Coast Starlight could berth on Track 3 if needed.
- Track 4 would be predominantly used for passenger service, but would also accommodate freight service.
- Track 5 would be predominantly used for freight, but would also accommodate passenger service, most notably the Amtrak Coast Starlight, which has one northbound and one southbound service per day.
- Track 6, when constructed, would be exclusively used for freight.