

PARTICK BUS STATION REDEVELOPMENT, GLASGOW



LOCATION: GLASGOW

COMPLETION: 2018

VALUE: £2.21M

SERVICE: ARCHITECTURE, LANDSCAPE ARCHITECTURE,
LEAD DESIGN CONSULTANT, CONTRACT ADMINISTRATOR,
NEC3 PROJECT MANAGER

SECTOR: TRANSPORT

CLIENT: SPT

CONTRACTOR: LUDDON CONSTRUCTION LTD

LANDSCAPE: AUSTIN-SMITH:LORD

CIVIL/ STRUCTURAL ENGINEERING/TRANSPORTATION:
CURTINS

SERVICES: SVM

COST CONSULTANT: CURRIE & BROWN

BUILDING SERVICES: SVM

Regional Transport Authority Strathclyde Partnership for Transport (SPT) commissioned the redevelopment of Partick Bus station as part of their strategy to invest in and promote multi-modal connectivity.

Having previously invested in the reconstruction of Partick station between 2009-15, which integrates heavy rail with subway, the existing bus station formed a functional but uninspiring first impression at the entrance to a contemporary transport interchange. This project provided SPT with the opportunity not only to promote multi modal transport connectivity but to improve the setting for the current facilities, enhance the passenger experience, address health and safety issues and stitch the interchange into the urban fabric by improvements to the public realm.



SPT tasked the team to design the new enclosed bus station facility.

The layout required to serve the current service patterns and create capacity for future growth without the requirement for on-site bus regulators. The station was to be un-manned. Ensure that there is segregation of bus movement from all the other vehicles/ pedestrians/cyclists.

Improve the operational safety and security through CCTV coverage of the bus area. Provide a contemporary, comfortable, quality waiting environment to attract an increase in bus passenger numbers. Improve the information provision for passengers commensurate with a contemporary interchange facility incorporating real time customer information. Provide an affordable solution for SPT both for capital works and on-going operational and maintenance (revenue) expenditure.

Whilst the project involves the integration and enhancement of the public realm surrounding the Interchange promoting connectivity to other parts of the city and environs, the primary driver for the project was to create a

contemporary bus station facility to improve the passenger experience. At the heart of the project is the bus apron, the design of which is crucial to ensure bus movements can be accommodated, and passengers can alight/ board safely. The focus in the early stage of the project was to design the operational space to achieve the optimum functional solution within the existing site and context constraints. key bus apron design issues:

- Utilisation of a Drive in, Drive out solution (DIDO) developed to accommodate service frequency.
- Recreate an "Island" solution to achieve the required number of stances as no more than 3 stances could be achieved along the apron perimeter.
- Improve passenger safety: the number of crossings to the "Island" is reduced from two to one.
- Deter pedestrians crossing the bus apron, segregation is provided by a combination of 1.1m railings to perimeters and full height glazing to bus stances.
- Dedicated one way taxi/car/van lane is provided between Vine Street and

"Partick Interchange is an important integrated transport hub for West Glasgow serving one of Scotland's busiest and most densely populated areas. SPT investment in Partick and the new facilities will significantly improve the bus passenger experience."

"The introduction of bespoke high quality shelters providing proper protection from the weather, real time passenger information displays, CCTV, and improved LED lighting as well as better provision for wheelchairs with high kerbs offering level entry to the buses, makes the station much more attractive and accessible to the whole community."

Charles Hoskins (SPT Senior Director)



interchange frontage to tie in with the recently completed public realm upgrade works by Glasgow City Council.

The existing unsightly bus shelters have been replaced by bespoke architect designed bus stances. The design solution created by lead design consultant Austin-Smith:Lord increases the number of stances by 20% to accommodate increased bus patronage associated with the recent opening of the Queen Elizabeth Hospital and anticipated growth resulting from recent and forecast development within the area.

The new bespoke bus stances are designed to current best practice and provide modern high quality waiting space that fully integrates lighting, CCTV, seating, and customer information technology. The extensive structural glazing is connected to an elegant steel framing creates a transparency that aids wayfinding and surveillance. As the roof is highly visible from neighbouring properties, the design deliberately creates an attractive curved profile which for stances 1-3 cantilevers out to accentuate their prominence within their surroundings and providing additional shelter at entrances. The cantilevered roof form is further emphasized by the integrating of continuous feature LED strip lighting to soffit edges.

Glazed aluminium framed auto doors at stances are activated on bus arrival by induction loops concealed within the bus apron slab. The internal height of the bus

Merkland Street to segregate the bus apron and reduce opportunity for conflict between buses and 3rd parties.

The design aim for the public realm:

- Clear, continuous and easily negotiated pedestrian route around the site perimeters providing access to each of the stances, the station and the taxi rank, local businesses and premises.
- One crossing point is introduced between the southern footpath and the enclosed island. This arrangement aims to deter pedestrians accessing the bus apron area.
- Continuous edge treatment (railings, landscaping and seating) between Morrison's car park and the southern

- footpath provides a quality edge treatment segregating pedestrians from the car park.
- Two pedestrian crossing points are introduced along the north of the site to facilitate pedestrian movement to and from Dumbarton Road; across Merkland Street and Vine Street, reducing traffic ingress and egress speeds.
- Increased cycle storage provision (private and rented) is included to the southern perimeter of the development in order to promote active travel.

The public realm linking the new bus station with the existing interchange and surrounding streets is dramatically transformed with the installation of new granite paving, seating, trees and lighting which is extended along the



Before Redevelopment



After Redevelopment



Before Redevelopment



After Redevelopment

stances is 3.2m, providing a sense of space not evident in similar installations. The curved glass ends to the stances make historical reference to the curved frontages of the much loved and fondly remembered Glasgow trams. The curved ends allied with the polished granite plinths achieve a perception of high quality. Whilst the design aim is to create a transparency through the stances, solid advertising panels are integrated within stances 1-3 providing a revenue stream for SPT.

The redevelopment of Partick Bus Station creates an attractive visual frontage to the Rail/Subway station building achieving an integrated multi modal transport solution. It is one of Glasgow's (and therefore Central Scotland's) busiest interchanges serving one of Scotland's most densely populated districts; connecting to the Riverside Museum, Glasgow Harbour, Glasgow University, Kelvingrove and bus routes to the new Queen Elizabeth Hospital. The project demonstrates SPT commitment to invest in the creation of a high quality of environment to meet today's passenger expectations and encourage bus travel as a main transport mode in the west of Scotland.



The key to project success was the performance of the bus apron to ensure bus movements could be accommodated. To mitigate the risk associated the proposed design not achieving SPT's operational requirements, extensive auto tracking was undertaken during the design process and validated by actual off site bus trials on a mock bus apron to the geometry proposed.

The development decluttered the existing bus station facility achieving an ease in wayfinding and providing a barrier free environment for pedestrians/passengers with sensory impairments. Real Time information is successfully integrated within the bus stances with voice address announcing bus arrival to assist visually impaired passengers. Extensive consultation was undertaken with the local accessibility panel in order that the designers could appreciate the issues that a variety of disabilities encounter. SPT also liaised closely with the local community during the construction stage who offered support and advice for the project throughout the process.

The design team were proactive in assisting SPT with value engineering throughout all project stages resulting in a reduction in project value from £3.28m to a final account figure of £2.21m.

From project outset, a significant emphasis was placed on improving safety in and around the bus station. The design achieves this by segregating bus movement from other

vehicles, segregating pedestrians from the bus manouvering area and creating improved road crossing points. New Lighting within the bus station and stances also promotes an improvement to public safety.

In order to maintain access to the Rail/Subway station and adjoining properties (residential and retail) and ensure routes from adjoining

streets were maintained necessitated a complex phasing strategy that was developed by Austin-Smith:Lord and executed by Principal Contractor Luddon Ltd.

The project was constructed in 11 months and delivered using NEC3 Option A form of contract which assisted in promoting a collaborative approach to delivery.

