Maidenhead Bridge Proposed Work

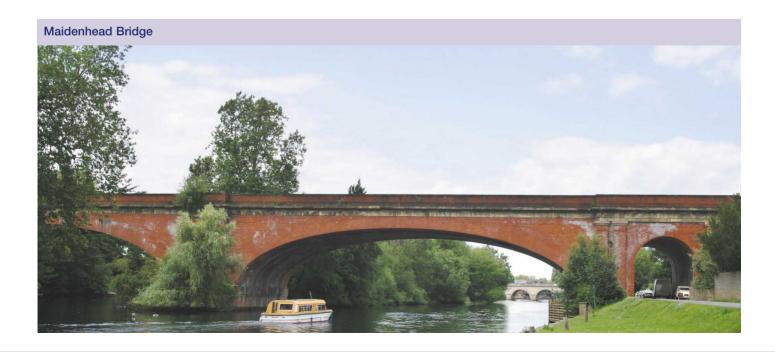


The Maidenhead Bridge over the River Thames at Maidenhead is a Grade II* listed structure. Installation of overhead electrification on top of the structure would be required. The design is being undertaken in conjunction with heritage specialists to help ensure that the impact on the structure is acceptable. Once installed, the gantries are likely to be visible on the bridge from viewpoints along the river and nearby.

As an example, electrification for the Heathrow Express involved the provision of overhead electrification over Wharncliffe Viaduct in Ealing.



Example of similar overhead electrification installations.



Maidenhead Stabling & Turnback



It is proposed that a stabling facility be provided for up to 6 Crossrail trains in the former goods yard to the west of Maidenhead station, immediately beyond the junction of the Bourne End Branch.

The proposals are to modify the track layout and train sidings at Maidenhead to enable Crossrail trains to be reversed with a new siding to be developed within the existing Network Rail sidings.

Six tracks would be laid out as single sidings. Between alternate tracks, a carriage-floor height platform would be provided to allow access to the trains for the drivers and to enable cleaning to take place. Two reversing sidings would be installed between the existing westbound Relief and realigned eastbound line tracks.

Staff accommodation and car parking would be needed. The road access from Silco Drive to the staff accommodation and car parking would be modified.

The likely environmental effects of the proposals are:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code with which all contractors would be required to comply and would be discussed with Windsor & Maidenhead Borough Council

- Operational noise from the use of the sidings
- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused. The Construction Code would require the establishment of a site management response system to ensure that should activities cause a nuisance, then measures would be taken to stop that nuisance and prevent it from happening again
- Lighting of the stabling area would be designed to control light pollution into the sky or toward adjacent buildings in accordance with current best practice

Proposed Stabling site

Proposed Station Improvements (1)



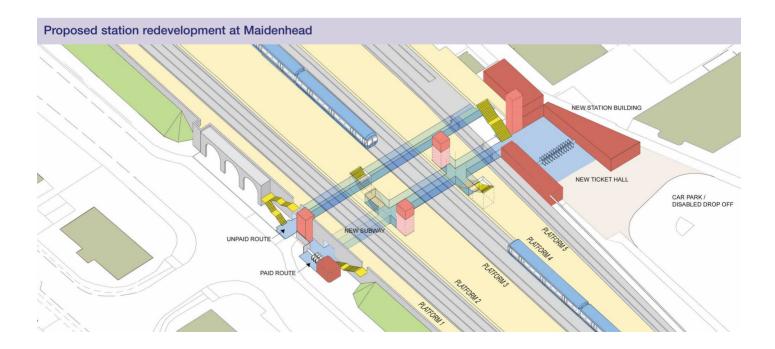


A range of improvements are being considered to help ensure that efficient station facilities are provided. These could include opportunities to improve the integration of the station with other types of transport and:

- Improved passenger access from Shoppenhanger's Road to the station ticket hall
- New ticket hall
- Rearranged forecourt

Crossrail propose to extend the existing platforms and provide a new terminating platform for Bourne End services (platform 6). There would be two reversing sidings located to the west of Maidenhead station.

Worksites are proposed within the existing station car park and along the railway boundary on the north side of the railway.



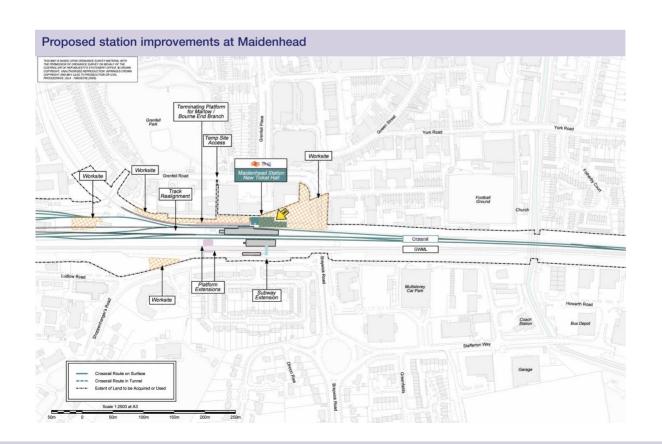
Proposed Station Improvements (2)





The likely environmental effects of the proposals are:

- Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code with which all contractors would be required to comply and would be discussed with the Royal Borough of Windsor & Maidenhead Borough Council
- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused. The Construction Code would require the establishment of a site management response system to ensure that should activities cause a nuisance, then measures would be taken to stop that nuisance and prevent it from happening again



Proposed Service Improvements



Crossrail would improve train services to and from Maidenhead by providing some journey time savings and a greater variety of journey opportunities.

Crossrail Maidenhead station would provide:

- Direct journey opportunities to central London
- 4 trains per hour during peak periods to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow Airport via an interchange at Hayes & Harlington

It is proposed that all Bourne End/Marlow services terminate in a new bay platform at Maidenhead. Passengers wishing to travel beyond Maidenhead would need to interchange. Peak hour through services from Bourne End would be withdrawn. Crossrail are working on options to keep the through service between Bourne End and Paddington.

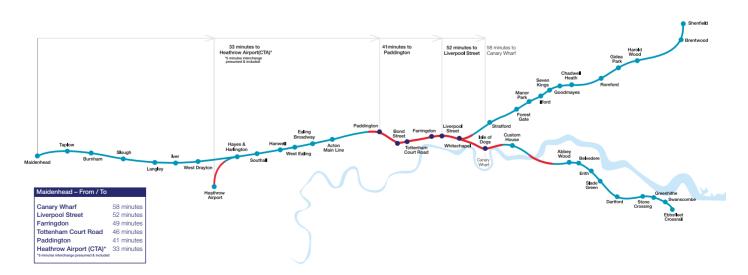
The diagram below highlights some of the journey times that would be possible by passengers travelling on Crossrail services to and from Maidenhead station. The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

During peak periods, it is proposed that Crossrail could enhance services by up to 1 additional train service per hour to and from Maidenhead.

With Crossrail operational, the total number of seats available on trains to central London from Maidenhead would increase by over a half, as a result of longer, more frequent trains.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.

Typical Crossrail journey times from Maidenhead



Taplow

Proposed Station Improvements



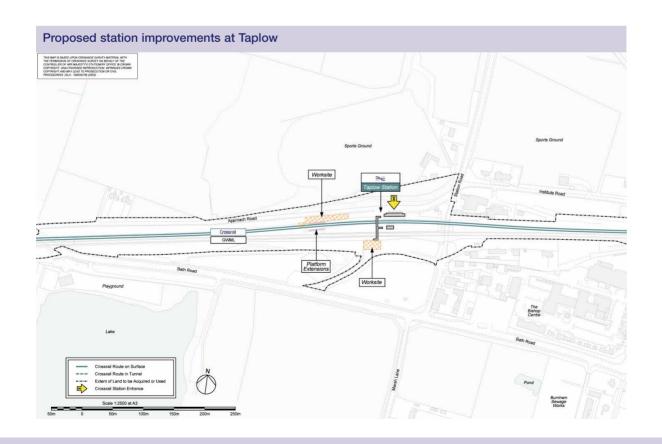


A number of minor improvements are being considered at Taplow, including new ticket machines and platform extensions.

Extensions of platforms 3 and 4 are proposed at the western end to cater for 10-car Crossrail trains.

No other major alterations to the station are proposed.

Overhead electrification would be installed along the route between Airport Junction and Maidenhead.



Taplow

Proposed Service Improvements



Crossrail would improve train services to and from Taplow station by providing direct journey opportunities and substantial new passenger capacity and crowding relief into central London.

Crossrail Taplow station would provide:

- Direct journey opportunities to central London
- 2 trains per hour during peak times to central London
- Substantial new passenger capacity and congestion relief into central London
- Access to Heathrow via an interchange at Hayes & Harlington station

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Taplow station.

With Crossrail operational, the total number of seats available on trains to central London from Taplow would increase by approximately a third as a result of the longer trains.

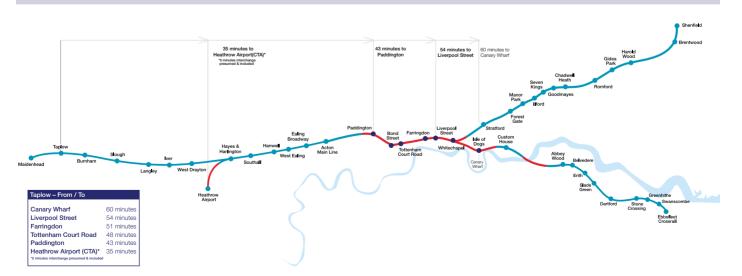
The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from Taplow



Burnham

Proposed Station Improvements









A number of minor improvements are being considered at Burnham, including new ticket machines, customer information facilities and platform extensions.

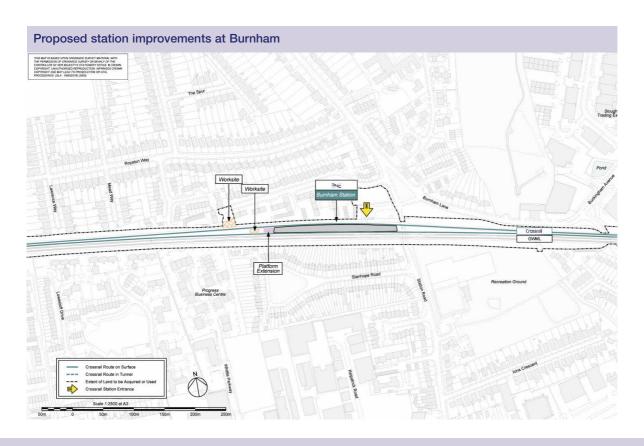
Burnham station has a single island platform between the Relief lines serving platforms 1 and 2. Extending the station platform at the western end to take new 10-car Crossrail trains is proposed.

No other major alterations to the station are proposed.

A worksite is proposed within the car park of Sandringham Avenue to the north-west of the station. Overhead line electrification would be installed along the route between Airport Junction and Maidenhead. These are relatively minor works.

The likely environmental effects of the proposals are:

Noise impact on buildings near the platform extensions due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code



Burnham

Proposed Service Improvements



Crossrail would improve train services to and from Burnham station by providing new direct journey opportunities to central London and substantial new transport capacity and crowding relief into central London.

Crossrail Burnham station would provide:

- Direct journey opportunities to central London
- 4 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow via an interchange at Hayes & Harlington station

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Burnham station.

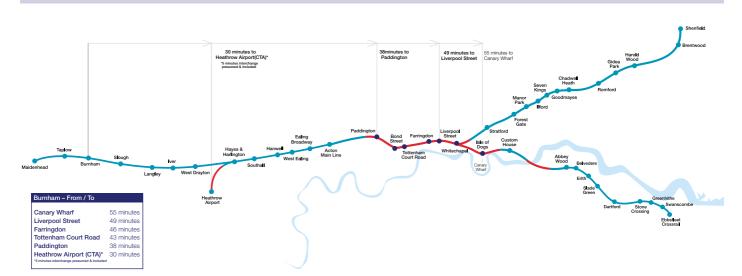
The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from Burnham



Slough to Burnham (1)

Proposed Work



William Street Bridge

No major work to William Street Bridge is anticipated. There may be a need to lower the tracks to provide adequate headroom clearance for overhead electrification. Minor work would be required to the parapets.



Stoke Poges Lane Bridge

Stoke Poges Lane Bridge is a narrow road bridge with a separate footbridge. Crossrail propose raising the structure and modifying the parapets.



Slough to Burnham (2)

Proposed Work

Farnham Road Bridge

No major work to Farnham Road Bridge would be required. There would be parapet renewal and the tracks would be lowered to provide adequate headroom clearance for overhead electrification. A temporary narrowing of the carriageway and temporary footway would be constructed.



Dover Road Bridge

Dover Road Bridge is dual carriageway. No major work to the bridge would be required. The tracks would be lowered. There would also be parapet work.



Slough to Burnham (3)

Proposed Work



Leigh Road Bridge

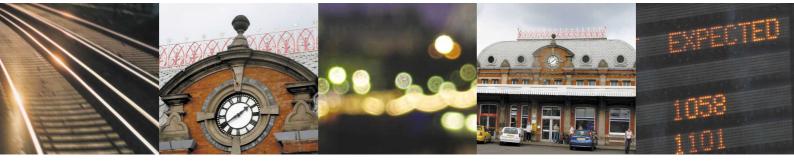
Leigh Road is carried over the railway in a south-to-north direction by means of a rail overbridge accommodating single lane traffic controlled by traffic signals. The bridge is made up of two spans of brick arch and brick wall parapets. Proposals include the reconstruction of the bridge, road widening and possible re-profiling of the road.



Slough

Proposed Station Improvements (1)





A range of improvements are being considered to ensure that efficient station facilities are provided. The design of Slough station is presently under consideration. The works proposed at Slough station include:

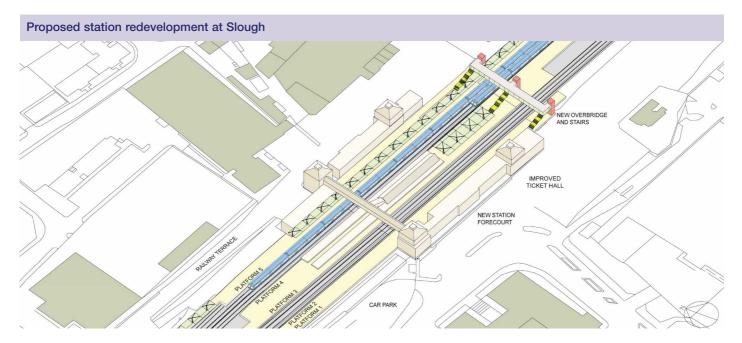
- Rearranged southern ticket hall with new ticket gates and ticket machines
- Improved northern entry to Platform 5
- Lift access to all platforms
- Improved passenger facilities
- Improved station access

Slough station has platforms on the Main and Relief lines, together with bay platforms for Windsor line trains and stopping services to Paddington. It is proposed to extend the Main and Relief line platforms to cater for 10-car Crossrail trains.

The Slough station footbridge may need to be modified to provide clearance for overhead electrification.

Architect's impression of Slough station redevelopment





Slough

Proposed Station Improvements (2)





The bay platform and associated tracks on the northern side of the station would be removed to allow for platform widening. A new siding is proposed between the running lines to the west of the station.

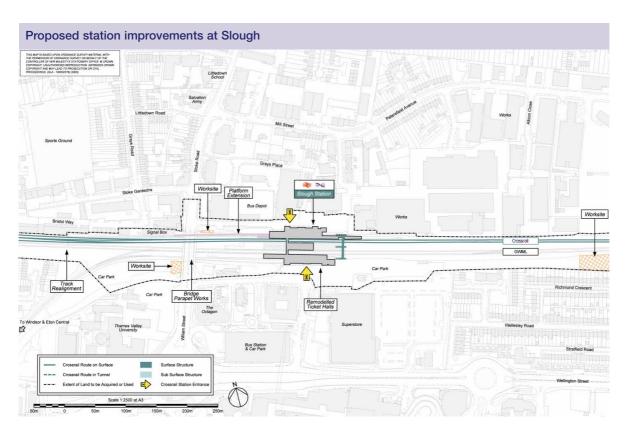
A new bay platform would be constructed for services terminating from Reading.

Overhead electrification would be installed along the route between Airport Junction and Maidenhead.

The unique character of this Grade II listed station is recognised and we would preserve it in line with modern safety requirements. Works to the station canopies to accommodate the overhead electrification could have an impact on the listed structure. The design is being undertaken in conjunction with heritage specialists to limit the impact.

The likely environmental effects of the proposals are:

Noise impact for nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code



Slough

Proposed Service Improvements



Crossrail Slough station would provide new destinations to central London.

Crossrail Slough station would provide:

- Direct journey opportunities to central London
- 4 trains per hour during peak periods to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow Airport via an interchange at Hayes & Harlington station

The diagram below highlights some of the journey times that would be possible by passengers travelling on Crossrail services to and from Slough station.

With Crossrail operational, the total number of seats available on trains to central London from Slough would increase by nearly a half as a result of the longer trains.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.

Typical Crossrail journey times from Slough



Langley to Slough (1)

Proposed Bridge Works



Trenches Bridge

Trenches Bridge would be reconstructed as a combined footbridge/cycleway. The bridge would be closed for approximately 2-3 weeks during the construction period. The plans would take account of the traffic assessment studies carried out as part of the overall Environmental Impact Assessment and would also take account of advice from relevant highway authorities.

A worksite would be located north-east of the bridge. Access to the worksite would be from the west through an industrial site, via Waterside Drive.



Church Lane / St Mary's Road Bridge

Church Lane (St Mary's Road) Bridge would be partially reconstructed. A temporary highway bridge controlled by temporary traffic lights would be provided during the works. The plans would take account of the traffic assessment studies carried out as part of the overall Environmental Impact Assessment and would also take account of advice from relevant highway authorities.

A worksite is proposed to the south-west of the bridge.



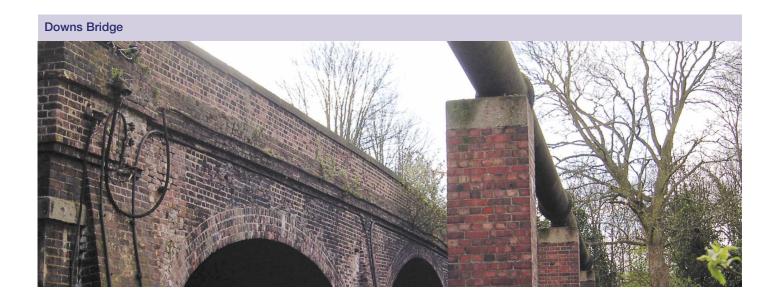
Langley to Slough (2)

Proposed Bridge Works



Downs Bridge

Downs (Middlegreen Road) Bridge would be reconstructed to provide clearance for overhead electrification. Both brick arches would be removed to give the required clearance. The existing brick arches would be replaced with pre-cast concrete arches. The proposals include parapet work. It is proposed that the areas north-west and south-west of the bridge would be used for working and storage areas. Road closure is expected to last approximately 3-6 months. A worksite is proposed on the northside of the bridge.



Uxbridge Road Bridge

No significant works to Uxbridge Road Bridge would be required. Minor work to the parapets are proposed. Temporary closure of the footways with pedestrians diverted to the opposite side may be required during this work.



Langley to Slough (3)

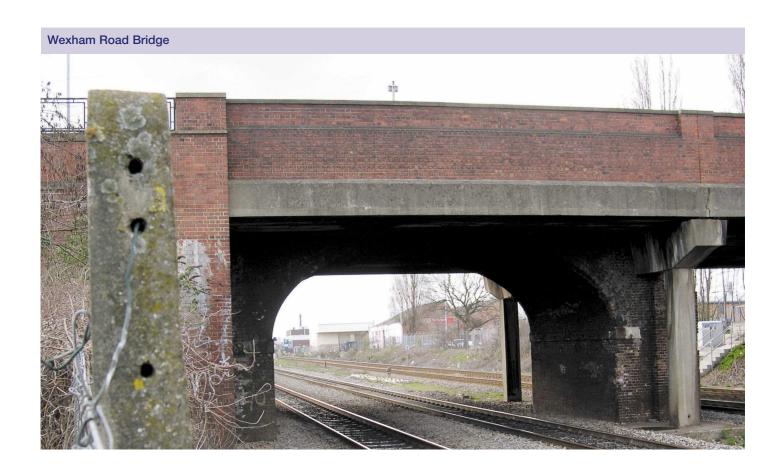
Proposed Bridge Works



Wexham Road Bridge

Wexham Road Bridge would require reconstruction of the southern arch. Temporary road closure would be required during construction.

Two worksites are proposed at the north-west and south-west of the bridge.



Langley

Proposed Station Improvements





As part of the development of Crossrail at Langley station, a number of minor improvements are being considered including:

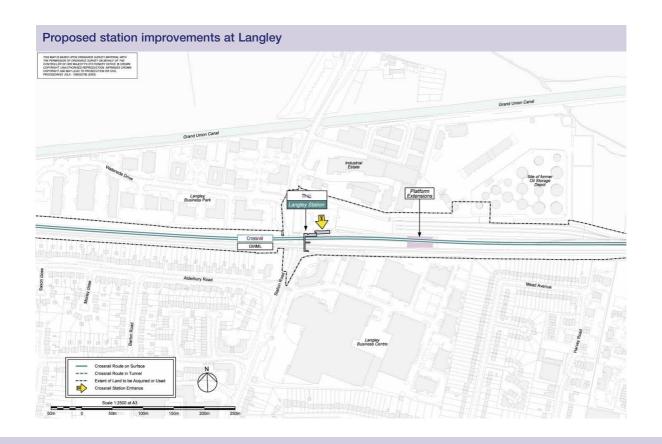
- New ticket machines
- Improved customer information facilities
- Improved passenger facilities
- Improved staff facilities

It is proposed to extend the Relief line platforms at the eastern end to cater for the 10-car Crossrail trains.

No other major alterations to the station are proposed.

A worksite is proposed within the vacant oil terminal land on the northern side of the station. Access would be off Station Road.

Overhead line electrification would be installed along the route between Airport Junction and Maidenhead. These are relatively minor works.



Langley

Proposed Service Improvements



Crossrail would improve train services to and from Langley station by providing journey time savings and a greater variety of new destinations.

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Langley station.

Crossrail Langley station would provide:

- Direct journey opportunities to central London
- 4 trains per hour during peak periods to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow Airport via an interchange at Hayes & Harlington station

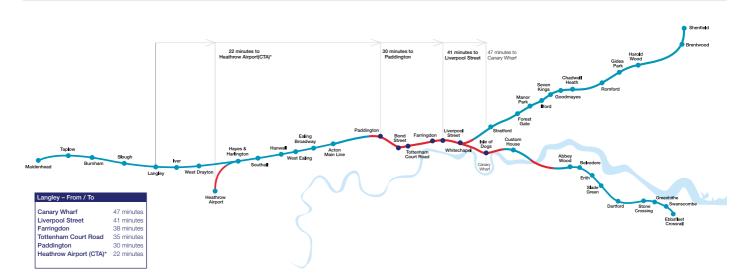
The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from Langley



Iver to Langley

Proposed Bridge Works



Dog Kennel Bridge would need to be replaced with a new bridge to the west with an increased span for the 5-track railway.

Dog Kennel Bridge



Chequer Bridge

A new underbridge would be constructed on the north side of the existing Chequer Bridge to take an additional track. The embankment between Chequer Bridge and Dog Kennel Bridge would be widened, requiring permanent acquisition of a narrow strip of adjacent open land. Temporary road closures are likely to be needed during the night and Sunday possessions.

Phasing of construction works at this location would require integration with work on adjacent bridges so as to limit disruption to the local road network. A worksite is proposed to the north of the existing bridge.



Iver

Proposed Station Improvements





As part of the development of Crossrail at Iver station, a number of minor improvements are being considered including a new ticket office and new passenger facilities improvements.

Extending the station platforms at the western end of Iver station is proposed. Platforms 3 & 4 would be extended to provide for new 10 car Crossrail trains. A new platform (platform 5) would be built.

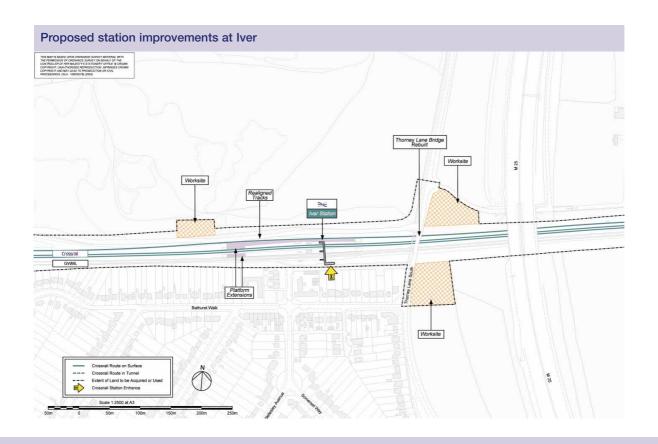
No other major alterations to the station are currently proposed.

Work on the station platforms would be coordinated from a temporary worksite to the north of the station approach road on the north site of the tracks and to the east of Thorney Lane South, south of the tracks.

Overhead line electrification would be installed along the route between Airport Junction and Maidenhead. These are relatively minor works.

The likely environmental effects of the proposals are:

Noise impacts on nearby buildings from construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code



Iver

Proposed Service Improvements



Crossrail would improve train services to and from Iver station by providing a greater variety of new destinations into central London and substantial new passenger capacity and crowding relief into central London.

Crossrail Iver station would provide:

- Direct journey opportunities to central London
- 2 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow via an interchange at **Hayes & Harlington station**

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Iver station.

With Crossrail operational, the total number of seats available on trains to central London from Iver would almost double as a result of the longer trains.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

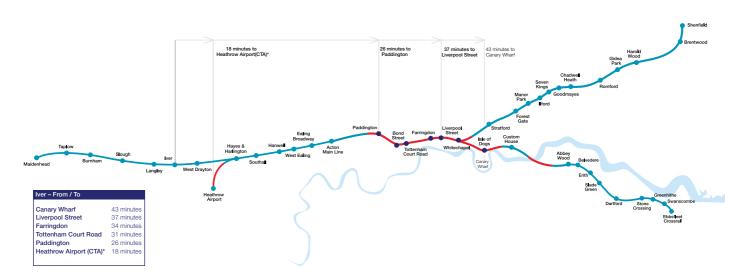
Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Iver station at present

Typical Crossrail journey times from Iver



West Drayton Stabling



West Drayton Yard currently has EWS sidings and a former coal depot. Crossrail propose to develop train stabling within the yard to accommodate up to 22 (10-car) trains during off-peak hours and overnight.

The access road into the depot would need to be realigned in order to accommodate the proposed layout.

A bridge over Fray's River would be required for the realigned access road and additional tracks. The existing level crossing over the Colnbrook branch would be kept and upgraded.

This could be a worksite for electrification works during the construction period.

The likely environmental effects of the proposals are:

- Noise impact on nearby buildings due to construction.

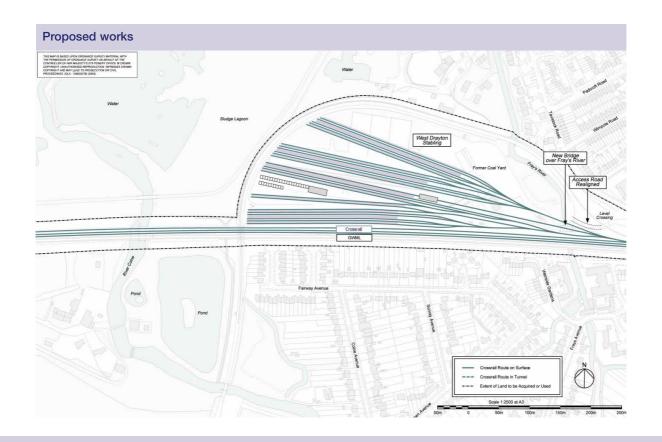
 These would be mitigated using best practicable means to control noise at source
- Operational noise from the use of the sidings. The new sidings would be distanced from most buildings on the north side (Tavistock Road) and those located to the south

- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused
- The lighting of the stabling area would be designed to control light pollution into the sky or upon buildings in accordance with current best practice

West Drayton to Langley Loop

Currently along the Great Western Main line there are Main and Relief lines. Freight trains can use additional sections of track between Langley and West Drayton (Langley and West Drayton Loop lines). The track is in two parts, the first section is between Langley and Chequers Bridge and the second section is between Dog Kennel Bridge and West Drayton station.

To enable an overtaking track for the non-stop Crossrail service, a small width of land would be needed on the north side of the railway to install a fifth track linking the existing goods loop east of Langley station with the loop commencing immediately east of Dog Kennel Bridge.

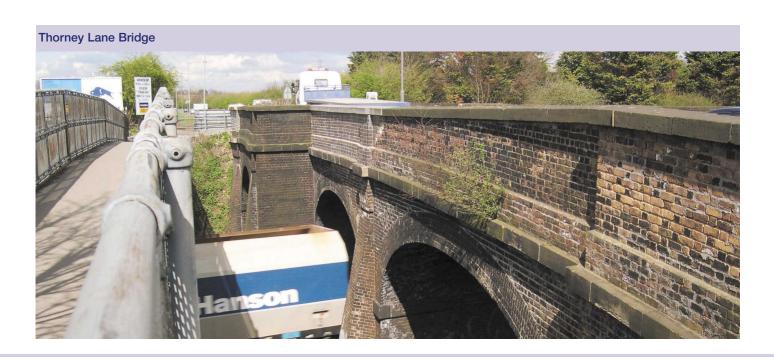


West Drayton to Iver Proposed Bridge Works



Thorney Lane Bridge would be reconstructed to accommodate overhead electrification. These plans would take account of the traffic assessment studies carried out as part of the overall Environmental Impact Assessment and would also take account of advice from relevant highway authorities.

If Thorney Lane footbridge is retained, the parapets would need to be replaced.



West Drayton

Proposed Station Improvements (1)



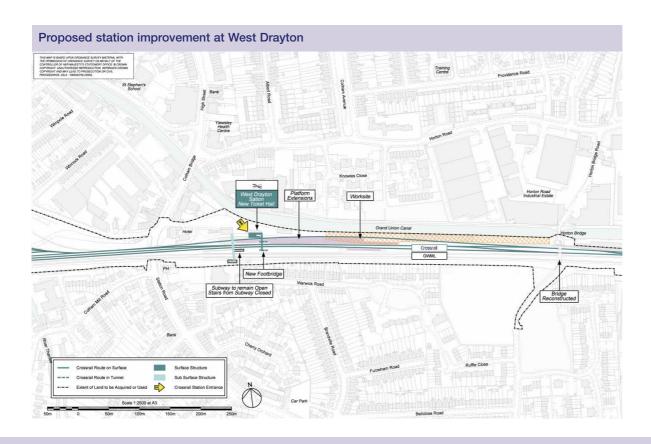


Crossrail is expected to result in increased passenger demand to and from the station. Improvements are being considered to ensure that efficient station facilities are provided. This would include:

- Ticket hall reconstruction to provide modern facilities
- New ticket gates and ticket machines
- Lift access to all platforms
- Passenger facilities including disabled parking and toilets
- Staff facilities
- Reconstruction of platforms 4 & 5
- Extension of westbound relief platform (platform 3)
- Station forecourt bus stop

Overhead line electrification would be installed along the route between Airport Junction and Maidenhead. These are relatively minor works.

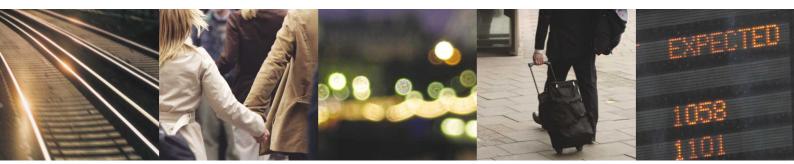
A worksite is proposed between the railway line and the Grand Union Canal with access off Station Approach and the High Street.



West Drayton

Proposed Station Improvements (2)





Platforms 3, 4 & 5 would be extended at the eastern end to cater for 10-car Crossrail trains.

The following demolition works would be required:

- Building to east of existing station ticket office
- Existing access stairs from subway to platforms 2, 3 and 4
- Platform building over subway stairs on platforms 2, 3 and 4
- Platform buildings and canopies on platform 4

The likely environmental effects of the proposals are:

- Noise impact on nearby buildings from construction.

 These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code
- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused

West Drayton

Proposed Service Improvements



Crossrail would improve train services to and from West Drayton by providing journey time savings and a greater variety of new destinations.

Crossrail West Drayton station would provide:

- Direct journey opportunities to central London
- 6 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London
- Access to Heathrow Airport via an interchange at Hayes & Harlington station

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from West Drayton station.

With Crossrail operational, the total number of seats available on trains to central London from West Drayton would increase five fold as a result of longer, more frequent trains.

During peak periods it is proposed that Crossrail could enhance services by up to 2 additional train services per hour to and from West Drayton.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

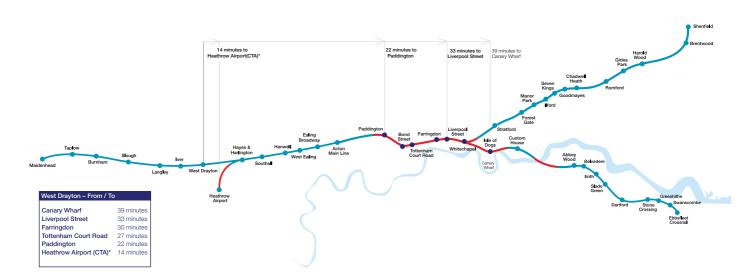
Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





West Drayton station at present

Typical Crossrail journey times from West Drayton

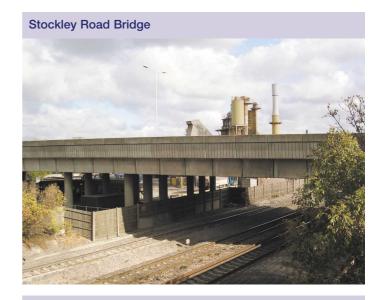


Stockley Flyover to West Drayton Proposed Bridge Works



Stockley Road Bridge

No major work would be required to Stockley Road Bridge, but there would be minor work to the parapets.



Old Stockley Road Bridge

Old Stockley Road Bridge is located to the west of Stockley Road Bridge. It is proposed to demolish the bridge and divert all traffic to Stockley Road Bridge permanently. A pedestrian/cycle path connection would be made north of the canal adjacent to Stockley Road. Alternative proposals could include retaining the bridge in its current location as a pedestrian and cycle way.



Horton Road/ Kingston Lane Bridge

Horton Road/Kingston Lane Bridge is a foot and cycle bridge that would be reconstructed. This would require temporary closure of the crossing and diversion of pedestrian and cycle traffic.



Stockley Flyover (Airport Junction)

Proposed Works



The existing flyover carries Heathrow Express trains heading for Paddington from the Heathrow tunnel over the two Main line tracks on a reinforced concrete structure with reinforced soil ramps.

To enable Crossrail's proposed services from Heathrow Airport to return to London, the Stockley Flyover would need to be widened and extended by construction of a new reinforced concrete structure in keeping with the existing flyover. This would allow the new Crossrail track to cross over both of the Relief lines then descend on a new ramp to a new connection to the existing tracks west of Hayes and Harlington station.

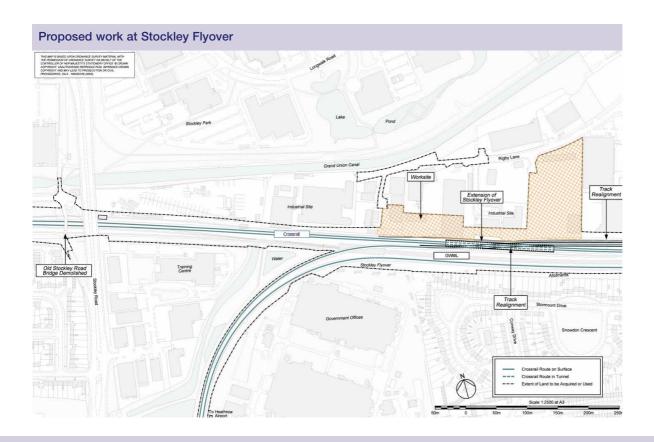
To provide space for the flyover extension and ramp, it would be necessary to move the existing Goods line to the north, outside of the existing railway boundary.

Temporary worksites would be located to the north of the flyover.

The likely environmental effects of the proposals are:

- Noise impact on nearby buildings on the southside due to construction. These would be mitigated using best practicable means to control noise at source
- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused

Crossrail acknowledge the environmental importance of the Stockley pond area to the west of the flyover which would be reflected in construction activity as appropriate.



Heathrow

Proposed Service Improvements



The Crossrail service from Heathrow Airport would replace the Heathrow Connect service to Paddington, with a more frequent service that stops at Hayes and Harlington, Southall, West Ealing, Ealing Broadway, Paddington and into central London.

Crossrail would run beyond Paddington to directly serve the West End, City and Canary Wharf. This would substantially reduce journey times for existing Heathrow passengers.

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Heathrow Airport.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

The Crossrail service to Heathrow is under consideration and subject to agreement with British Airways Authority Plc (BAA).

Crossrail could fit in effectively with the existing rail network enabling commuters and tourists to benefit from fast and efficient travel into and across London. Current services to Heathrow Airport – BAA plc Heathrow Express

A fast non-stop 4 train per hour service in each direction between Paddington and Heathrow Airport. Heathrow Connect, which is proposed to be introduced in the next 6 months, would provide a 2 train per hour service connecting Paddington to Heathrow Airport via local stations including Ealing Broadway, Southall and Hayes and Harlington

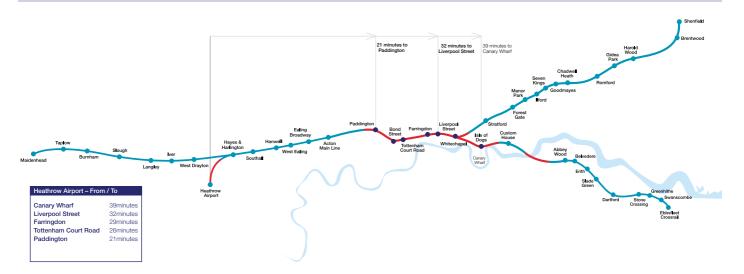
Proposed Crossrail services to Heathrow Airport

4 trains per hour in each direction between Paddington and Heathrow Airport replacing the 2 trains per hour Heathrow Connect. Crossrail services to and from Heathrow Airport would call at local stations into central London. The 4 trains per hour Heathrow Express fast service would remain

This corridor would provide significant journey time savings to the West End, City and Docklands. Crossrail services to Heathrow Airport would increase service frequencies and attract passengers from Underground services, thereby providing crowding relief.



Typical Crossrail journey times from Heathrow



Hayes & Harlington

Proposed Station Improvements (1)





A range of improvements are being considered to help ensure that efficient station facilities are provided. These could include opportunities to improve the integration of the station with other types of transport. Redevelopment of the station is proposed. This would include:

- Creation of an important interchange for services to Heathrow Airport
- New ticket hall, footbridge, stairs and lifts to platforms
- Station canopies

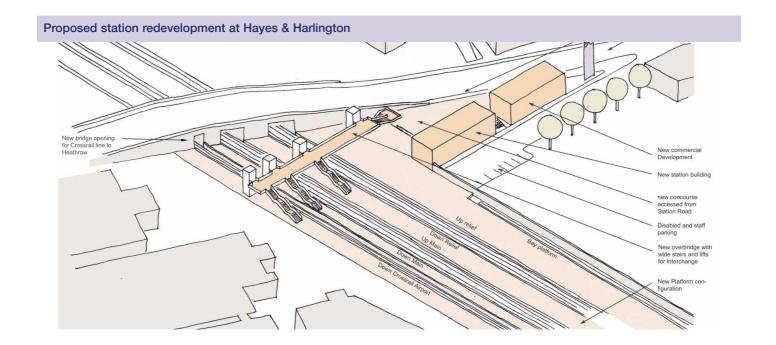
It is proposed to extend the platforms to provide for 10-car Crossrail trains.

A new bridge would be required east of the station to carry the Crossrail tracks towards Heathrow over the Grand Union Canal.

A new platform would be constructed on the south side, within the existing station car park for Crossrail services to Heathrow Airport. This additional track would necessitate a new span under Station Road. In order to construct the new span, a temporary bridge would be constructed to the west of Station Road. Traffic would use the temporary bridge during construction.

West of Hayes and Harlington station, Crossrail trains to Heathrow would connect into the existing westbound Airport track to Heathrow Airport.

Worksites would be located on the station forecourt, car park and on land immediately west of Station Road Bridge.



Hayes & Harlington

Proposed Station Improvements (2)



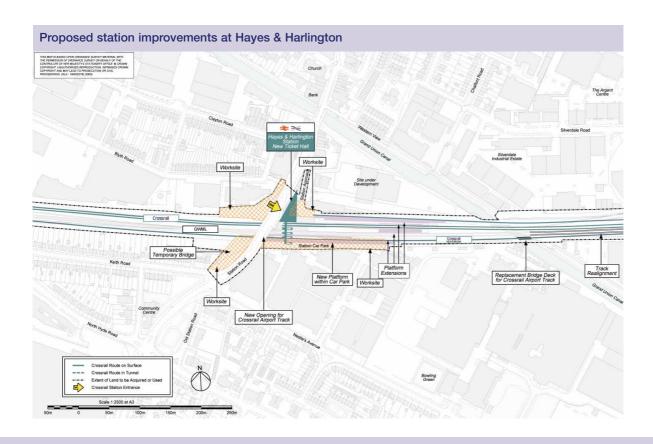


The likely environmental effects of the proposals are:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code

There would be consultation with local authorities to ensure that suitable traffic management is introduced to limit impact during construction and consideration would be given to local authority policies and the road network in the area to reach an acceptable solution.

The Crossrail scheme for Hayes and Harlington station may be adjusted to incorporate proposals from the local authority, Transport for London (TfL) and British Airways Authority (BAA).



Hayes & Harlington Proposed Service Improvements



Crossrail would improve train services to and from Hayes & Harlington Station by providing journey time savings and a greater variety of new destinations.

Crossrail Hayes & Harlington station would provide:

- Direct journey opportunities to central London and Heathrow Airport
- 10 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London

The diagram below highlights some of the journey times that would be possible travelling on Crossrail services to and from Hayes and Harlington station.

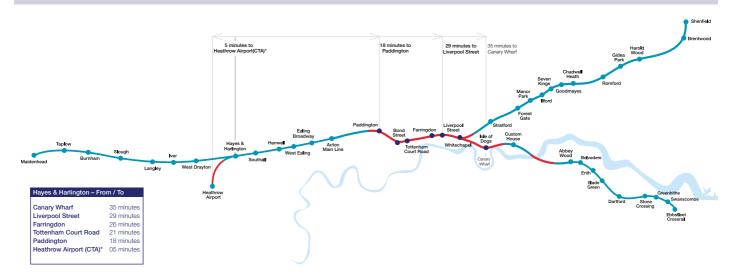
With Crossrail operational, the total number of seats available on trains to central London from Hayes & Harlington would nearly double as a result of longer, more frequent trains.

During peak periods, it is proposed that Crossrail could enhance services by up to 6 additional train services per hour to and from Hayes & Harlington.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.

Typical Crossrail journey times from Hayes & Harlington



Southall Main Line Underpass

Proposed Works





To enable Crossrail's proposed services to access the branch to Heathrow Airport there would need to be a new underpass for the Main lines west of Southall station.

It is proposed that the Main line tracks would be moved southward. There would be a cut-and-cover tunnel (dive under) with approach ramps west of Southall station to carry the Main line tracks. This moves them closer to Spencer Street properties.

Crossrail trains would cross over on top of the cut-and-cover tunnel and the Main line services (fast intercity and Heathrow Express) would travel through the tunnel.

A footbridge would replace the subway linking White Street and Spencer Street.

New bridges would be required to carry the Main lines and the Crossrail track towards Heathrow over Brent Road and the Paddington Branch of the Grand Union Canal. Part of the bridge carrying the railway over the Grand Union Canal west of the Hayes-by-Pass would also need to be rebuilt. Some strengthening work would be required for one of the piers of the Hayes Bypass (A312).

Temporary worksites would be located at Southall West sidings and Brent Park industrial estate, including the railway land between them. The worksite at the industrial estate would require demolition of a warehouse. Access to the worksites would be via Southbridge Way and Brent Road. A temporary worksite would be located within Spencer Street play area and would be reinstated on completion of works.

The likely environmental effects of the proposals are:

- Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source
- Operational noise as a result of moving the railway lines closer to properties on Spencer Street. The Main lines would be in the cut-and-cover tunnel at this point, which would substantially reduce the noise impact from these trains. The Crossrail lines would cross over the top of the tunnel, but the electrically powered trains of a modern design would be substantially quieter than the diesel trains that run on the Main lines and could even result in less noise
- Dust impact on nearby buildings during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused

Southall

Proposed Station Improvements (1)







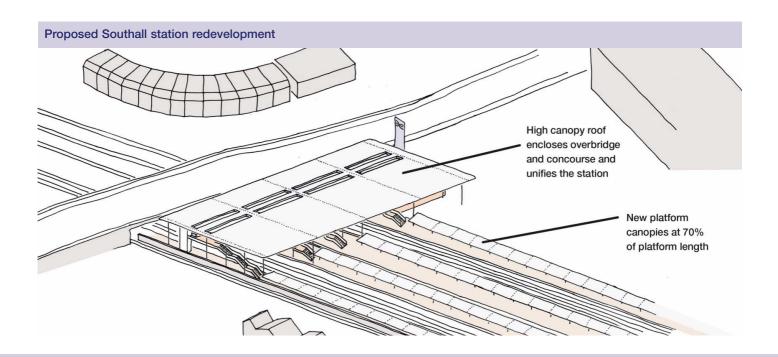


Improvements are being considered to ensure that appropriate station facilities are provided. These could include opportunities to improve the integration of the station with other types of transport. Design is currently under consideration for redevelopment of the station.

Proposals include:

- Ticket hall located north of platform 4 with access from South Road
- Island platform widened
- Platform shelters
- Lift access to all Crossrail platforms
- Refurbishment of staff accommodation
- Main lines diverted to the south

Extension of all the platforms to provide for 10-car Crossrail trains is proposed.



Southall

Proposed Station Improvements (2)





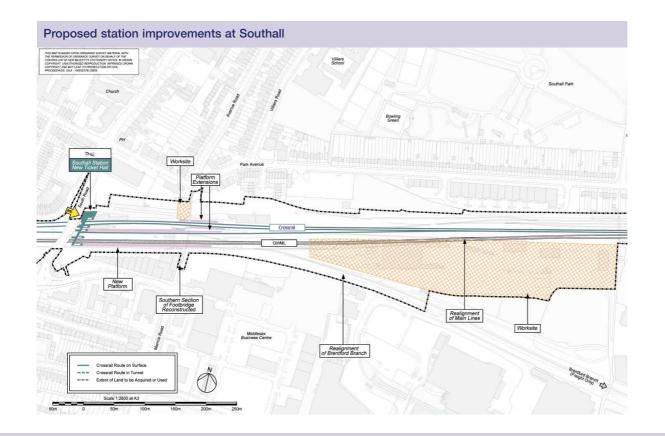
The Main line tracks would be moved southward behind platform 1.

Temporary worksites are proposed at Southall East sidings and Southall West sidings. The existing east bound Main line track through the station would be removed and island platform 2 and 3 widened. A west bound Crossrail Airport line would be installed on the alignment of the current west bound Main line track. The Crossrail trains travelling to Maidenhead would continue on the Relief lines, stopping at the existing westbound Relief platform (platform 3) at Southall. The Crossrail trains travelling to Heathrow Airport would stop on the other side of the island platform at Southall station.

The proposed redevelopment of the Southall Gas Works site is not part of Crossrail. However, Crossrail is aware of the proposed redevelopment scheme and would take these proposals into account.

The likely environmental effect of the proposals is:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code which all contractors would be required to comply with and would be discussed with the London Borough of Ealing



Southall

Proposed Service Improvements



Crossrail would improve train services to and from Southall station by providing journey time savings and a greater variety of new destinations.

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Southall station.

Crossrail Southall station would provide:

- Direct journey opportunities to central London, Heathrow Airport and the west
- 10 Crossrail trains per hour during peak times to central London
- Substantial passenger capacity and crowding relief into central London

With Crossrail operational, the total number of seats available on trains to central London from Southall would treble as a result of longer, more frequent trains.

During peak periods, Crossrail propose to enhance services by up to 6 additional trains per hour to and from Southall.

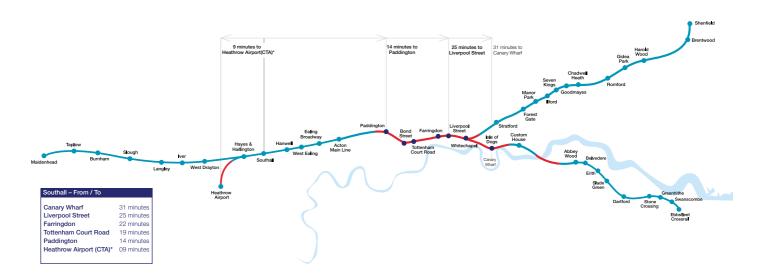
The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services. As a result of the first round of public consultation, Crossrail explored alternative service patterns on the Great Western corridor, which included serving Southall station. Crossrail is now proposing a 10 train per hour (peak) service.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from Southall



Hanwell

Proposed Station Improvements





At Hanwell, a number of minor improvements are being considered including passenger facility improvements and safety and security improvements.

It is proposed that the station platforms are extended at Hanwell at the western end. It is likely that the extensions would be on piled foundations.

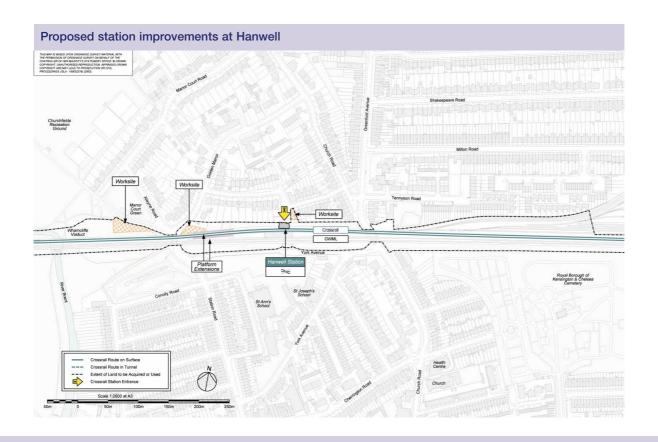
No other major alterations to the station are currently proposed.

Space would be required for a contractor work and storage area during construction of the platform extensions.

The likely environmental effect of the proposals is:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code

The works to this station are limited. The unique character of this Grade II listed station is recognised and we would seek to preserve it, in line with modern safety requirements.



Hanwell

Proposed Service Improvements



Crossrail would improve train services to and from Hanwell station by providing journey time savings and a greater variety of new destinations.

Crossrail Hanwell station would provide:

- Direct journey opportunities to central London, Heathrow Airport and the west
- 2 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London

As a result of the first round of public consultation, Crossrail explored alternative service patterns on the Great Western corridor, which included serving Hanwell station. Crossrail is now proposing a 2 train per hour (peak) service.

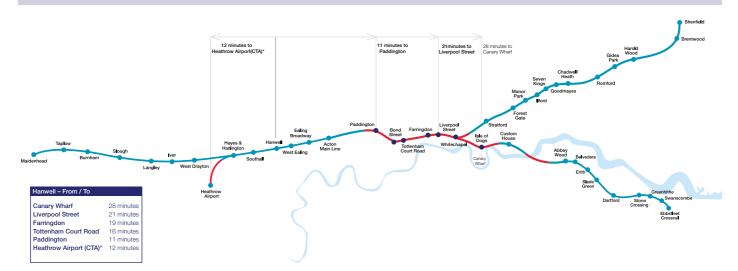
The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Hanwell station.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from Hanwell



West Ealing

Proposed Station Improvements





The design of West Ealing station is presently under consideration. Proposed changes would include:

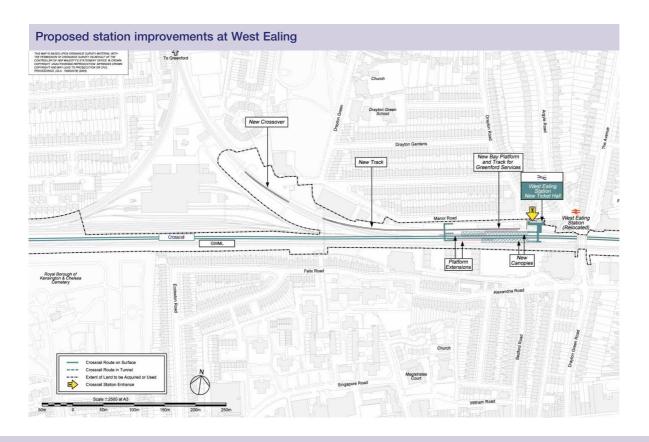
- Ticket hall with access from Manor Road
- Provision of a terminus platform for the Greenford Shuttle
- Construction of an over-bridge with stairs and lift
- Relief line platforms 3 & 4 extended to the west to take Crossrail 10-car trains
- Remodelling of Greenford Branch Junction
- Additional platform canopies and shelters

In order to provide train paths for Crossrail services on the Relief lines, Crossrail propose to stop the Greenford to Paddington services at West Ealing station. A shuttle service would run between Greenford and West Ealing at a frequency of up to 4 trains per hour. Passengers would need to change trains at West Ealing for Crossrail services to central London and eastern destinations.

Stopping the Greenford to Paddington services would require platform and track work and a worksite would extend northwards along the railway towards Greenford.

The likely environmental effects of the proposals are:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code



West Ealing

Proposed Service Improvements



Crossrail would improve train services to and from West Ealing by providing journey time savings and a greater variety of new destinations.

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from West Ealing station.

Crossrail West Ealing station would provide:

- Direct journey opportunities to central London, Heathrow Airport and the west
- 4 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London

With Crossrail operational, the total number of seats available on trains to central London from West Ealing would increase by over a half as a result of longer trains.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

As a result of Public Consultation Round 1, Crossrail explored alternative service patterns on the Great Western corridor, which included serving West Ealing station.

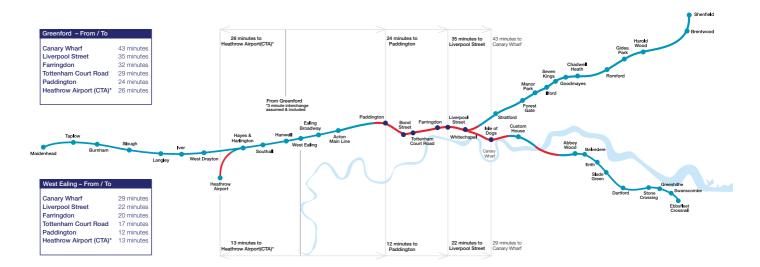
Crossrail is now proposing a 4 train per hour (peak) service.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Typical Crossrail journey times from West Ealing & Greenford



Ealing Broadway

Proposed Station Improvements (1)





Crossrail propose to redevelop Ealing Broadway station to provide a new high quality interchange between Crossrail, First Great Western Link and London Underground services. This would include:

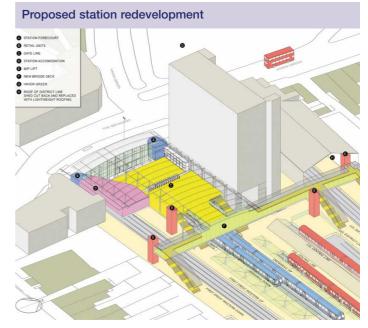
- New ticket hall south of the existing tower block
- Upgrade of the existing station forecourt
- Deck structure providing access to platforms
 1, 2, 3 and 4 and links to the Central and
 District lines
- Lifts to create step free access from the street to platforms
- Extension of platforms 1 to 4 at their eastern end to provide for 10-car Crossrail trains

The existing ticket hall and passenger routes would stay open during the construction of the new station. The construction works would obstruct the station forecourt and require temporary walkways for pedestrians and station users.

The platform level kiosks would have to be repositioned to allow the construction of the overbridge and vertical circulation.

Design of Ealing Broadway station would allow for any future proposals by Transport for London (TfL) for new bus facilities.





Ealing Broadway

Proposed Station Improvements (2)





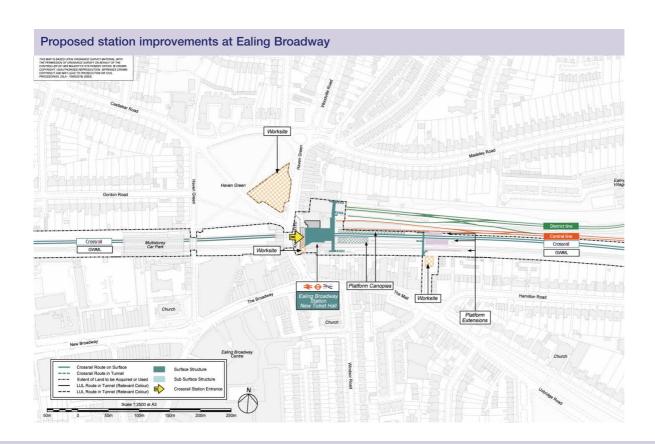
Construction of the station redevelopment would be co-ordinated from temporary worksites on Haven Green, on the south side of the Great Western Main Line corridor in the vicinity of College Court and within the forecourt and car park of the station on The Broadway.

Once construction is complete the land would be reinstated.

The likely environmental effect of the proposals is:

Noise impact on nearby buildings due to construction. These would be mitigated using best practicable means to control noise at source. These means would be incorporated within the Crossrail Construction Code There are a number of high quality mature trees surrounding the proposed Haven Green temporary worksite. As part of the current proposals, the trees would be kept

There would be consultation with local authorities to help ensure that suitable traffic management is introduced to limit impact during construction. Consideration would be given to local authority policies and the road network in the area to reach an acceptable solution.



Ealing Broadway

Proposed Service Improvements



The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Ealing Broadway station.

Crossrail would improve train services to and from Ealing Broadway Station by providing journey time savings and a greater variety of new destinations.

Crossrail at Ealing Broadway station would provide:

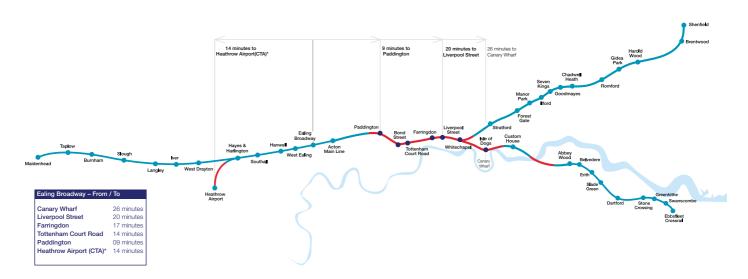
- Direct journey opportunities to central London, Heathrow Airport and the west
- 10 trains per hour during peak times to central London
- Substantial new passenger capacity and crowding relief into central London
- Interchange with First Great Western Link services
- Interchange with London Underground services

During peak periods it is proposed that Crossrail would enhance services by up to 4 additional train services per hour to and from Ealing Broadway.

With Crossrail operational, the total number of seats available on trains to central London from Ealing Broadway more than doubles as a result of longer, more frequent trains. The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.

Typical Crossrail journey times from Ealing Broadway



Acton Main Line

Proposed Service Improvements



Crossrail would improve train services to and from Acton Main Line station by providing journey time savings, a greater variety of new destinations with increased passenger capacity and crowding relief for journeys into central London.

Crossrail Acton Main Line station would provide:

- Direct journey opportunities to central London, Heathrow Airport and the west
- 4 trains per hour during peak periods to central London

As a result of Public Consultation Round 1, Crossrail explored alternative service patterns on the Great Western Corridor, which included Acton Main Line station. Crossrail is now proposing a 4 train per hour (peak) service.

The diagram below highlights some of the journey times that would be possible by travelling on Crossrail services to and from Acton Main Line station.

With Crossrail operational, the total number of seats available on trains to central London from Acton Main Line would more than double as a result of the longer trains.

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services.

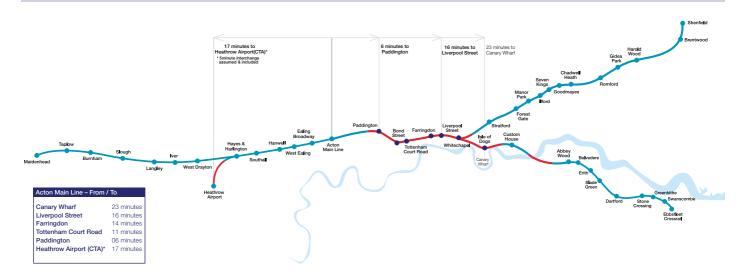
Crossrail has commissioned Transport Assessment (TA) reports for all stations it would serve. The TA reports would include an assessment of transport provision around each station and an appraisal of the impact of the extra passenger demand generated and how those passengers would access the station.





Acton Main Line station

Typical Crossrail journey times from Acton Main Line



Old Oak Common Depot

Proposed Work



Crossrail trains would be stabled within Old Oak Common Depot on new Crossrail sidings. An area for the stabling sidings has been identified to the north of the existing First Great Western depot at Coronation Sidings, to stable up to 12 (10-car) Crossrail trains during off-peak hours and at night.

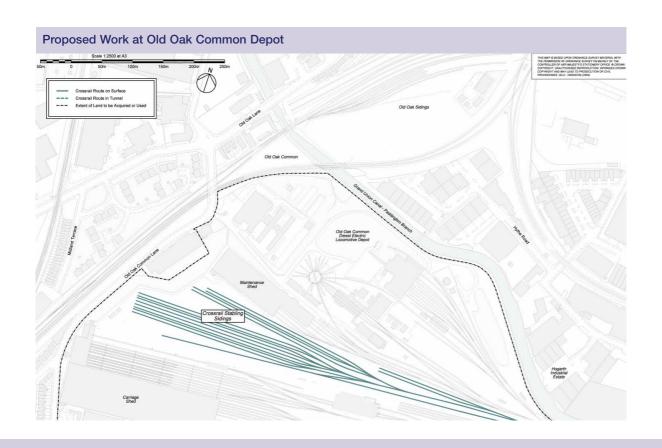
A carriage washing facility would also be required.

Construction of the sidings would be co-ordinated from a temporary worksite within Old Oak Common Depot.

The site would be cleared, buildings erected, tracks laid and overhead electrification and walkways constructed.

There would be additional track work associated with facilities used by First Great Western Link and by EWS.





Electrification Work



Crossrail's trains would be electrically powered.
Crossrail therefore proposes to 'electrify' the Great
Western Main Line between Airport Junction and
Maidenhead. This would involve the installation of
masts and gantries to support the overhead lines and
construction of line side sub-stations.

The overhead lines and their supports could be visible from areas adjoining the track, although long sections of the track are well screened by mature trees, particularly at Maidenhead. The visual effects are not likely to be significant along most of the route.

Electrification could require works to bridges to provide clearance for the overhead lines and to modify parapets to ensure safety. These would range from minor works to the reconstruction of bridges.

The works proposed are described on the relevant display panels.

The electrically powered Crossrail trains would be quieter than the existing diesel trains. Crossrail would replace some of the diesel services. This would have the effect of improving the overall operational noise levels in the rail corridor.

The likely environmental effects of the proposals are:

- Noise impact due to construction. These would be mitigated using best practicable means to control noise at source
- Dust during construction. Appropriate dust mitigation techniques would be incorporated within the Crossrail Construction Code in order to reduce the risk of a dust nuisance being caused
- Traffic management impact due to the construction work. Crossrail would take account of the traffic assessment studies carried out as part of the overall environmental impact assessment and would take into account advice from relevant highway authorities





Great Western CorridorProposed Service Improvements



Crossrail services to the Central Area

- 4 trains per hour from Heathrow Airport to central London
- 4 trains per hour from Maidenhead to central London
- 2 trains per hour from West Drayton to central London

First Great Western Link

- 2 trains per hour from Reading calling at Twyford, Maidenhead, Slough, Hayes and Ealing Broadway to Paddington
- 2 trains per hour from Reading calling at Twyford, Maidenhead and terminating at Slough

The Greenford Branch has an increased level of service in the peak hours to compensate for withdrawal of through trains to Paddington.

Crossrail are considering options for serving the Henley and Marlow branches.



Summary of services to central London per hour:

Station	Peak		Off Peak	
	Crossrail	Other Services	Crossrail	Other Services
Acton Main Line	4		2	
Ealing Broadway	10	2	8	2
West Ealing	4	4 Greenford	4	2 Greenford
Hanwell	2		2	
Southall	10		8	
Hayes & Harlington	10	2	8	2
Heathrow Airport (CTA)	4	4 HEX	4	4 HEX
West Drayton	6		4	
lver	2		2	
Langley	4		2	
Slough	4	2	4	2
Burnham	4		2	
Taplow	2		2	
Maidenhead	4	2	4	2

The Crossrail timetable and service pattern would be set by the relevant railway bodies in consultation with the train operating company responsible for operating Crossrail services. Currently no trains call at Acton Main Line, West Ealing, Hanwell, Iver and Taplow on Sundays. Crossrail hopes to provide a consistent service with a 7-days a week service at all stations it serves.

Heathrow Airport Access

Proposed Service Improvements



