



**ATKINS**

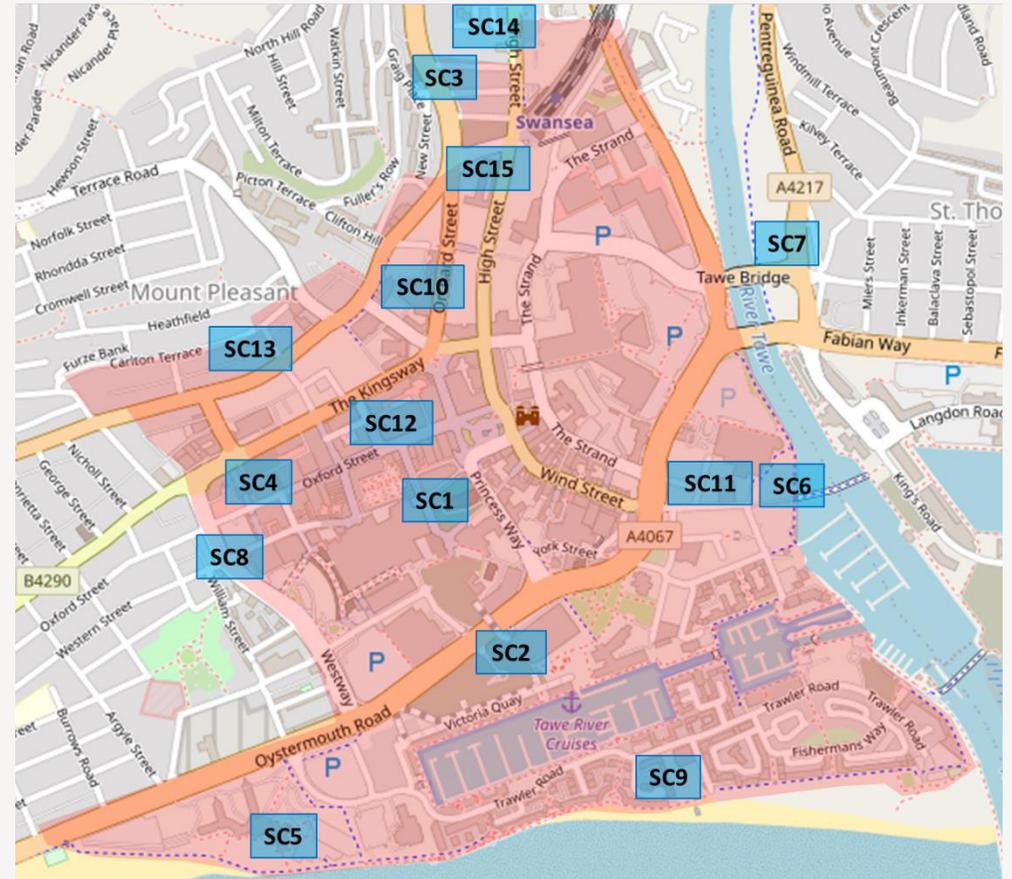
Member of the SNC-Lavalin Group



# Swansea Central Area Transport Strategy

# Purpose of Study

- › Swansea Council are currently promoting a comprehensive redevelopment and regeneration programme for the Swansea Central Area, and has commissioned Atkins to provide transport planning advice as part of developing a Swansea Central Area.
- › If there is no investment in a strategy that is fit for purpose then it could lead to Swansea being less attractive for investors, and development that is not accessible for sustainable use.
- › The approach to the study is to take a phased approach to:
  - › Identify the transport challenges and solution themes
  - › Present high-level considerations of impacts of options packages.
- › The study is focussed on supporting the regeneration programme for the central area, including a list of 15 strategic sites within the central area.
- › It is intended that any development within the identified central area, should either demonstrate how they are contributing to the strategy themes, or provide a financial contribution towards them.



# Approach to study

## Work Stage 1/1a

These two stages have been completed and involved the following key activities:

- Data review and interpretation
- Identify transport issues and challenges
- Develop key messages, themes and focus areas
- Identification of scenarios/options packages
- Development uncertainty

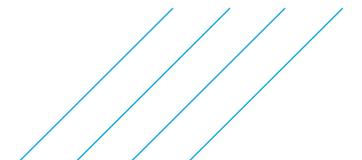


## Work Stage 2

This Work Stage centres around the consideration of the solutions' impacts. The two key activities associated with this Work Stage include the following:

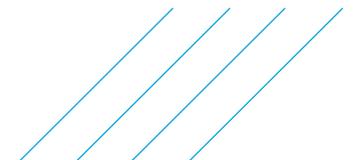
- Development of packages / options for improving travel to and from the central area.
- Appraisal of packages/options using an appropriate framework for appraisal.

- › The focus of the first phase of the study was defining the challenge using existing information currently available, including:
  - › Existing demographics data;
  - › Central area parking study;
  - › Swansea Strategic Transport Model; and
  - › Existing planning policy documents.
- › The focus of the second phase of the study was to consider the potential performance of strategy packages, aligning with objective established following completion of phase 1.
- › Option packages have been developed with reference to the challenges identified at phase 1, and assessed using a multi-criteria assessment framework.
- › The output sets the context against which, future detailed development of options can be developed.



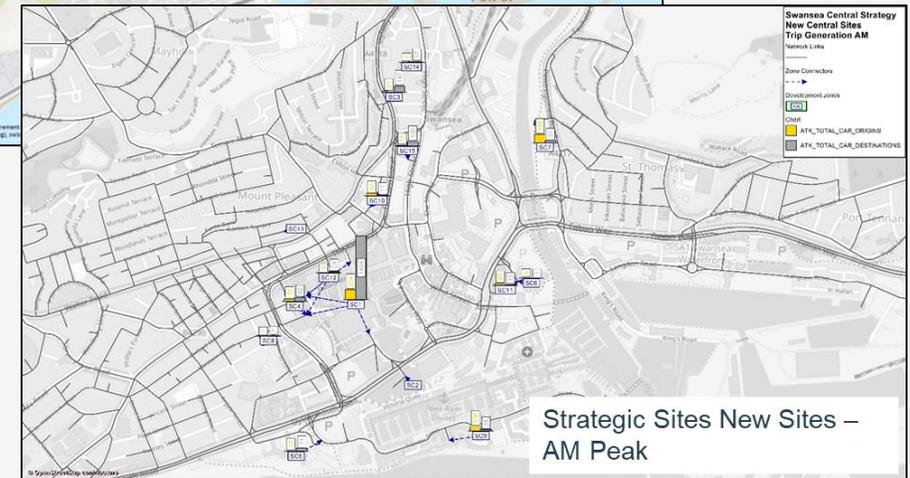
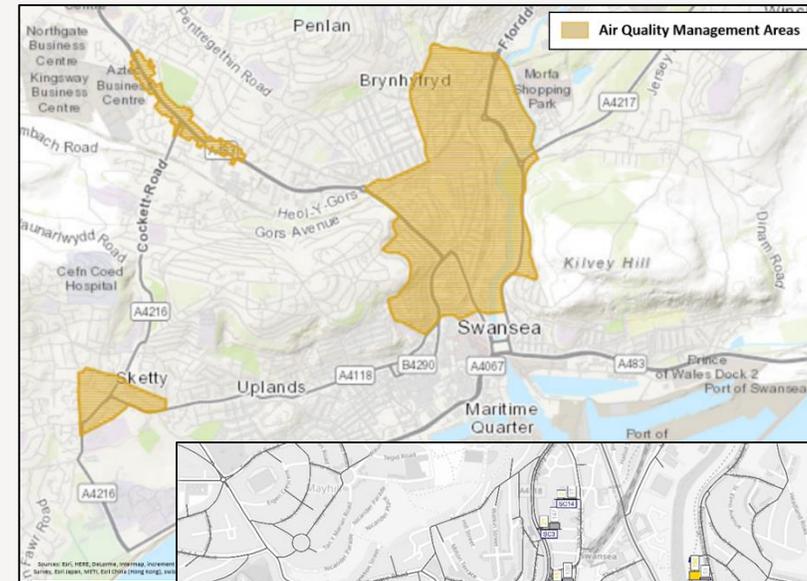
# Existing Conditions Summary

- › Strong policy focus to reduce the reliance on the private vehicle through strong placemaking principles, although it is recognised there is a need for strategic interventions across all modes.
- › Most dominant commuting trips to the central area originate from locations close to the centre of Swansea, though private vehicle remains the more dominant travel mode.
- › Swansea is considered a regional hub, with a notable proportion of people working in Swansea travelling from neighbouring authorities.
- › There is a good active travel network within the central area, though the cycle hire scheme lacks a central area presence.
- › There may be a gap in the Park and Ride provision to the west / north-west of the city.



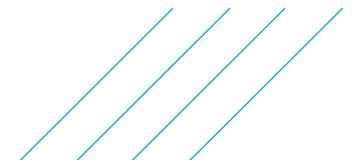
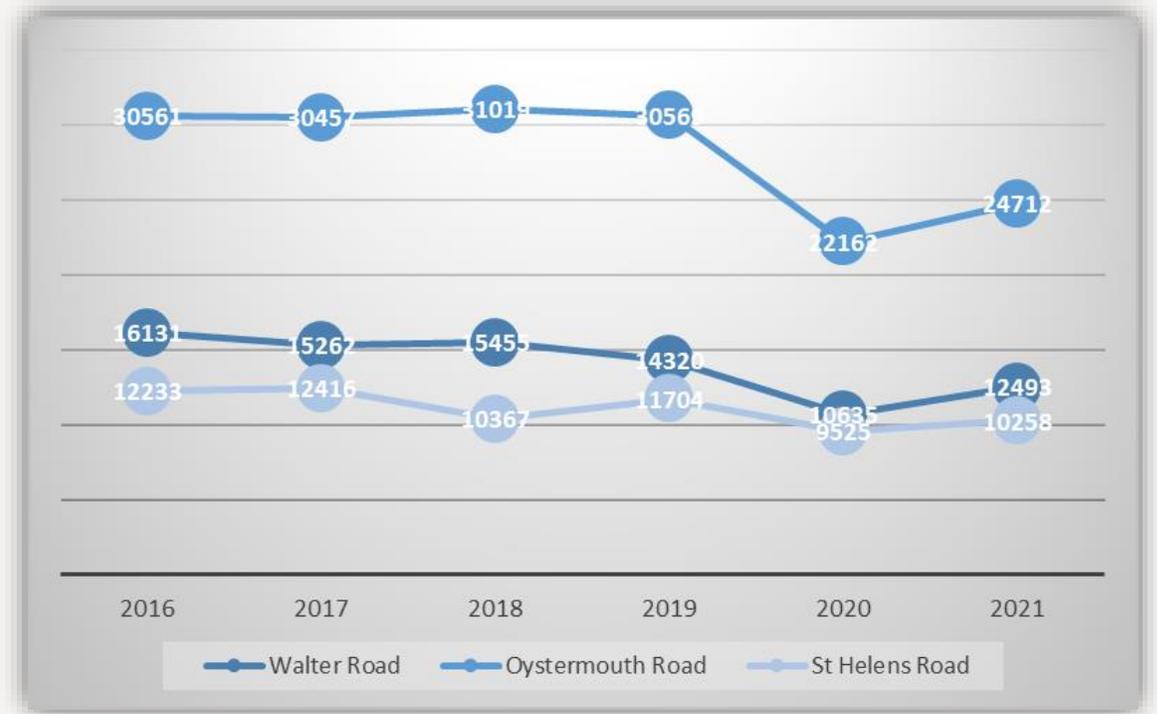
# Existing Conditions Summary

- › There are a number of congestion hotspots within the central area, such as Dyfatty signals and Fabian Way; this could be due to the high levels of through traffic rather than trips to or from the centre.
- › The strategic sites are forecast to attract a significant volume of traffic to the central area, exacerbating congestion on corridors already under pressure.
- › There is an Air Quality Monitoring Area (AQMA) partly within the central area.
- › Emissions limits within the AQMA have not been breached for a number of years.
- › There is spare parking capacity within the central area on a typical weekday, with competitive parking prices that do not dis-courage private vehicle use for the central area.
- › A number of car parks observed to be at capacity for a high proportion of weekends across the year.

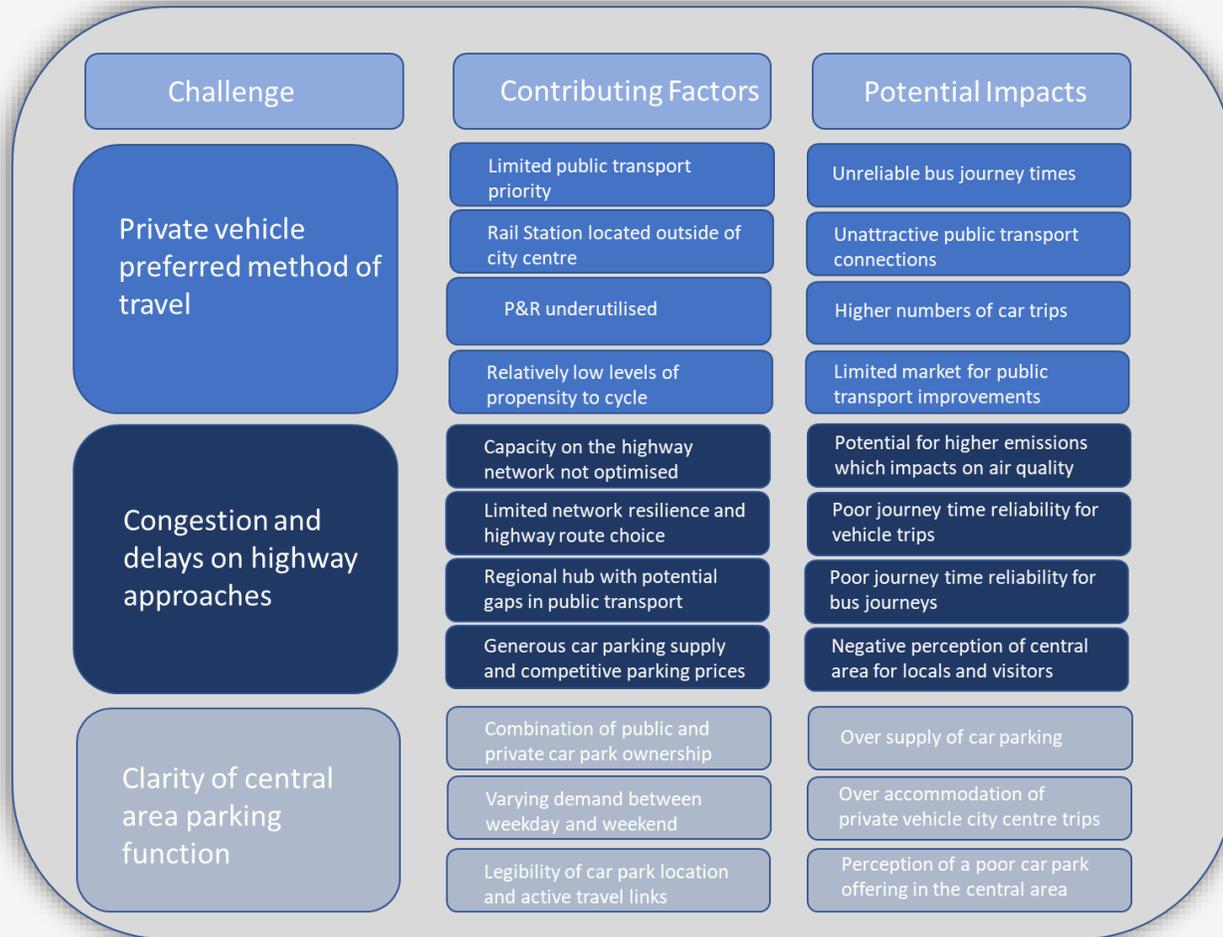


# Travel Demand Uncertainty

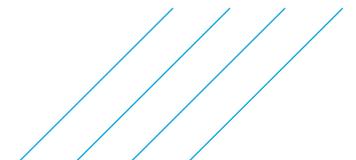
- › Considered a live document, that can be updated prepared during a time of significant uncertainty in travel patterns, due to the Covid-19 pandemic.
- › It is apparent that vehicular traffic is generally increasing; though not yet back to pre-Covid levels.
- › It is also noted that there is an apparent increase in cycle usage across Swansea, with an increase of up to 500 cyclists a day between 2017 and 2021/2021 captured cycling along the Swansea promenade.
- › There is uncertainty as to whether levels will continue to rise as the 'new normal' is approached, with the Welsh Government stating a target of 30% of the work force to continue working from home, with the government are currently developing a national remote working strategy.



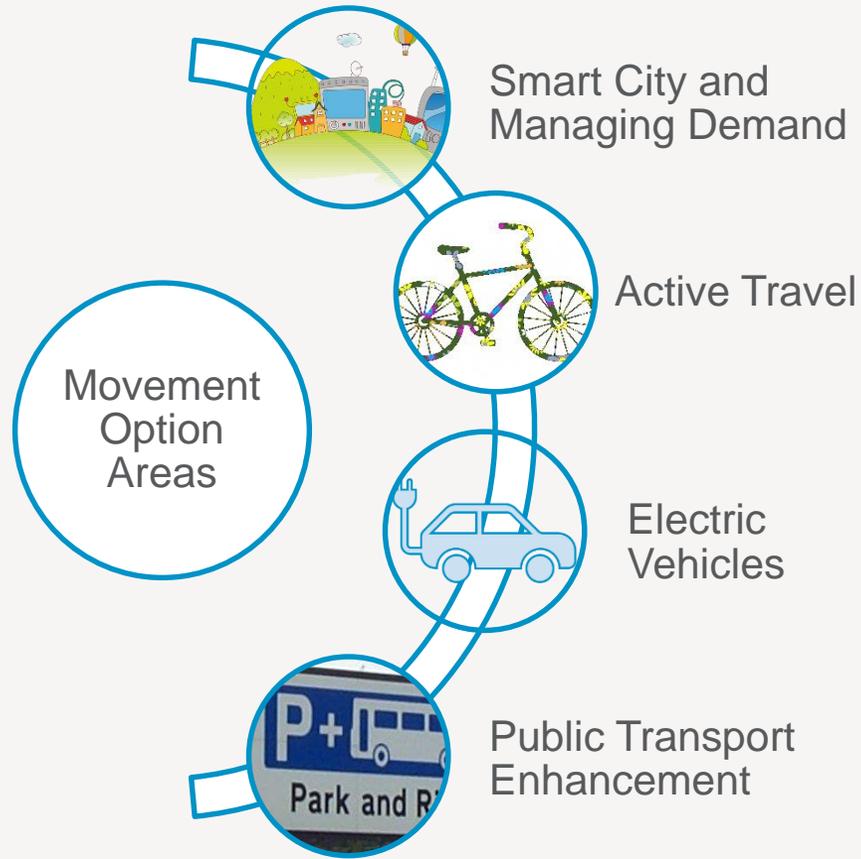
# Defining the Challenge



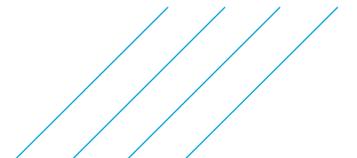
- › The review of the baseline has informed an understanding of the current and potential future movement challenges within the centre of Swansea to be understood.
- › Consideration has been given to the contributing factors that lead to the presence of the key movement challenges.
- › The key transport challenges have potential impacts on movement to, from and within the centre of Swansea.
- › Understanding these challenges, contributing factors and potential impacts allows opportunities for developing a strategy to accommodate and facilitate the regeneration of the city.



# Movement opportunities



- › There is a strong policy background in placemaking within Swansea, and both regional and local policy supports a reduction in the reliance on the private vehicle.
- › There is an opportunity to embed environmental considerations into the development of measures to incentivise cleaner vehicles (EV charging) or Urban Parks within the central area.
- › Swansea is a regional employment hub, and there may be opportunities to enhance cross county transport linkages, including incentivising rail as part of a regional transport system (Swansea Bay Metro).
- › Commuting trips into the central area originate from neighbouring wards, providing the opportunity to increase the penetration of the active travel market in these areas.
- › There is a good network of established cycle routes within the central area, providing the opportunity to focus on route quality and increasing the propensity to cycle.
- › There are opportunities to capitalise on the digital transformation in the area through Swansea Bay City Deal funding.



# The setting of Objectives



Maintain and improve access to local bus network, including Park and Ride



Increase Active Travel trips into and around the centre

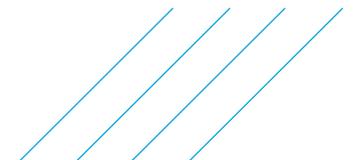


Minimise the impact of motorised traffic in the city centre



Enhance the experience of residents of, and visitors into the city centre

- › It is considered that at this stage, potential measures could be centred on a multi-modal approach; this meaning that vehicles will not necessarily be assumed to be disadvantaged, however careful management is required to allow the regeneration of Swansea to be realised in a way that provides movement opportunities for a variety of users.

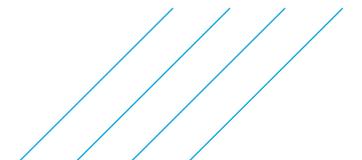


# Option Package 1 – Active Travel Improvements Programme

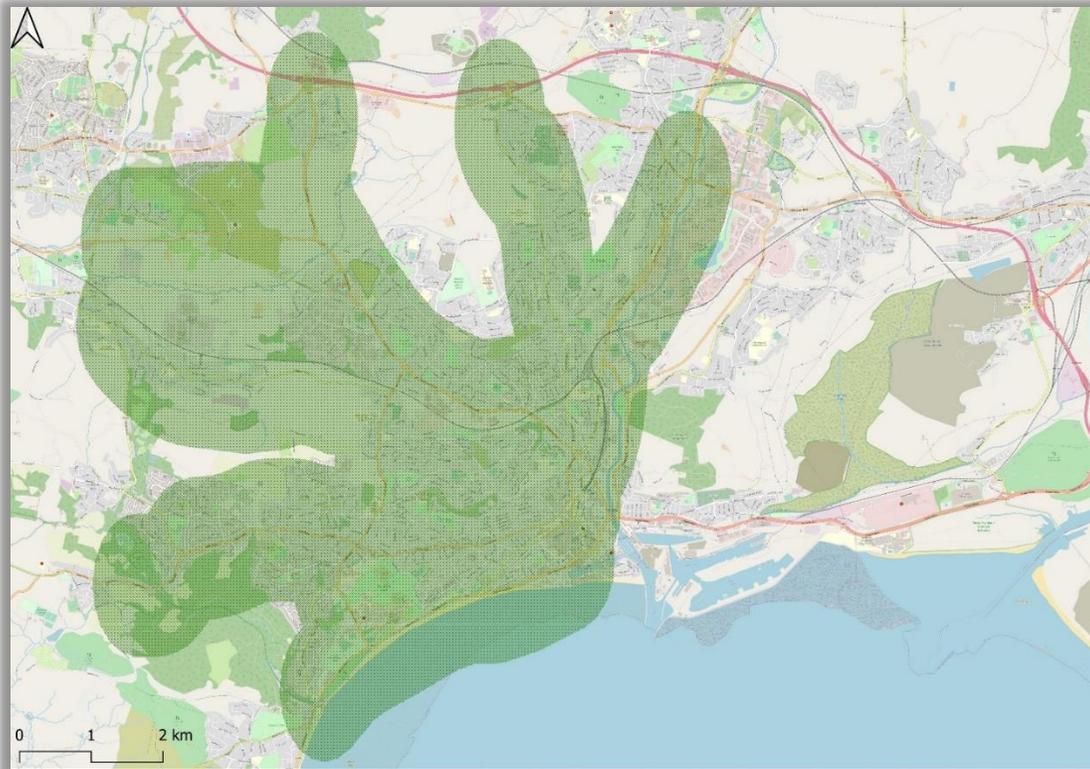


- › The options package is intended to encourage the use of active travel to / from and within the central area. It could include measures such as:
  - › Enhancing the cycle hire network within the central area;
  - › Improving the quality of active travel infrastructure;
  - › Consideration of Park and Cycle sites;
  - › Provision of end of journey active travel facilities at all developments.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✓
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓

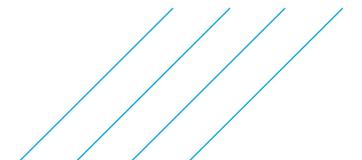


# Option Package 2 – Park & Ride

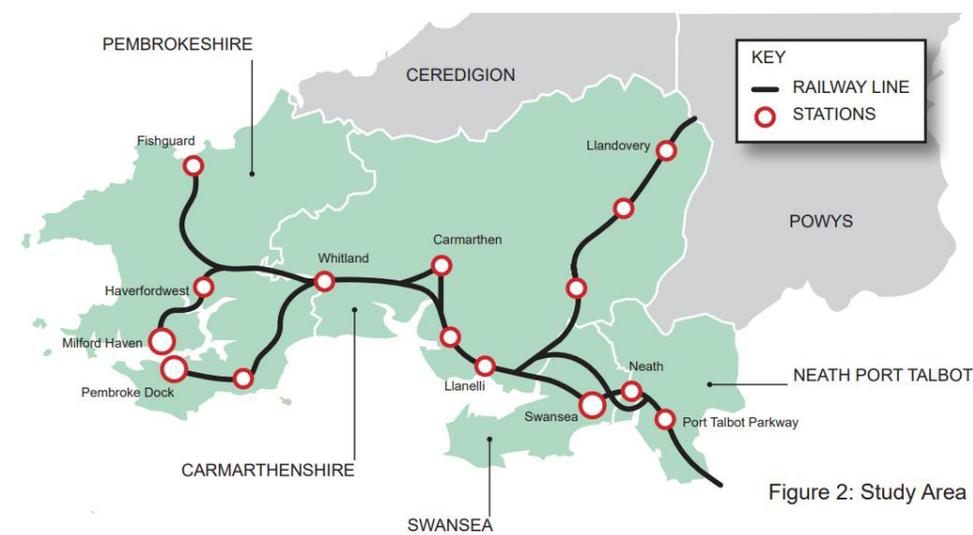


- › The options package is intended to encourage the use of Park & Ride to / from the central area, in order to reduce vehicular traffic, and will include:
  - › Review of existing sites and corridors to maximise utilisation and efficiency;
  - › Consider demand for an alternative site to serve the northern / western sectors of the city;
  - › Consideration of the South-West Wales Metro.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✓
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓



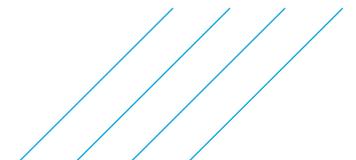
# Option Package 3 – South Wales Metro



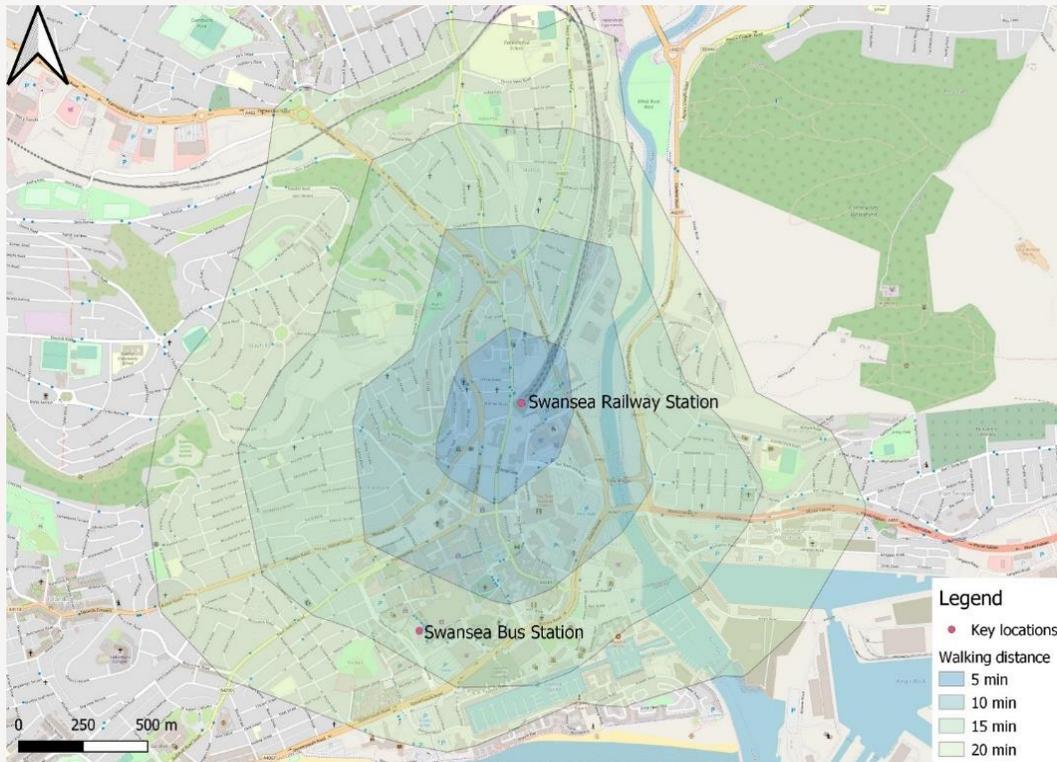
Led by Transport for Wales.  
For more information see:  
<https://gov.wales/sites/default/files/c-consultations/2021-03/information.pdf>

- › The options package will be developed in partnership with Transport for Wales, with Swansea Council facilitating the programme in the central area where possible.
- › Measures will be explored that intercept traffic to /from the central area of Swansea.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✗
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓

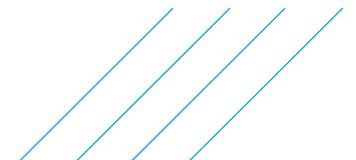


# Option Package 4 – Public Transport Interchanges



- › The options package will encourage multi-modal trips, to reduce the dependence on the private car.
- › There are potential improvements that will lead to the capture of trips outside of the central area (e.g. improvements to interchanges in Gorseinon) as well as measures to provide greater integration between the central area public transport hubs of the bus station and rail station.
- › Measures will be explored that intercept traffic to /from the central area of Swansea.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✓
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓

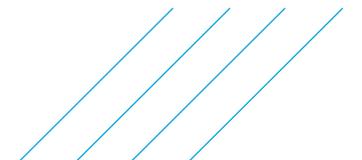


# Option Package 5 – Highway Improvements

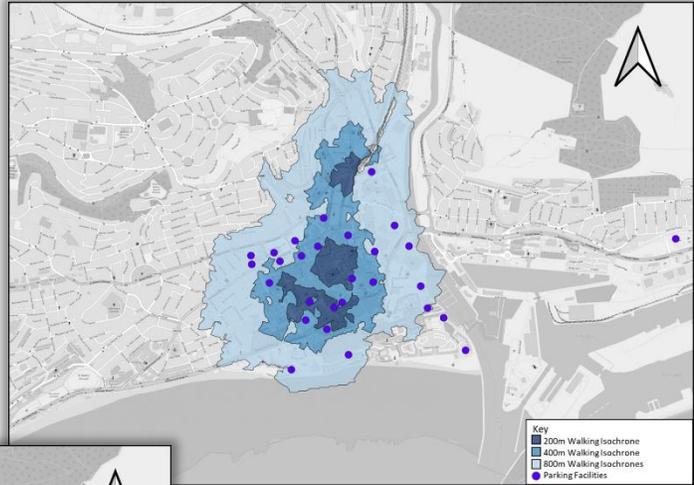
- › The options package will improve the efficiency of the highway network on the approach to the central area, to ensure that private vehicle users can still access goods and services. However the focus will be on improving efficiency rather than large scale capacity increases.



Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✘
Increase active travel trips into and around the centre.	✘
Minimise the impact of motorised traffic in the city centre.	✔
Enhance the experience of residents and visitors of the city centre.	✔

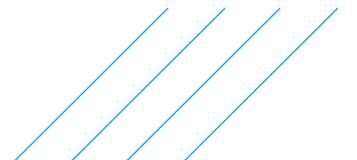


# Option Package 6 – Swansea parking Strategy



- › The options package will redefine the car parking offering within the central area and immediate vicinity, through a combination of
  - › Car park fare structure;
  - › Revision of parking provision type (long stay / short stay);
  - › Increase in electric vehicle charging points; and
  - › Redefining the central core parking boundary for new development.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✗
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓

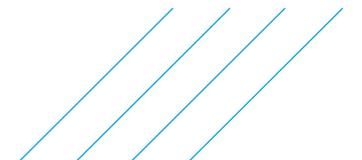


# Option Package 7 – Smart / Green network development



- › The options package will develop a number of smart initiatives, including:
  - › Rapid Charging Hub concept;
  - › Enhance real-time bus information for passengers;
  - › Consider the use of greener fuelled bus services
  - › Consider vehicle actuated bus priority; and
  - › Consider future-proofing the central area network for automated vehicles.

Options package alignment with established objectives	
Maintain and improve access to the local bus network, including Park & Ride.	✓
Increase active travel trips into and around the centre.	✗
Minimise the impact of motorised traffic in the city centre.	✓
Enhance the experience of residents and visitors of the city centre.	✓



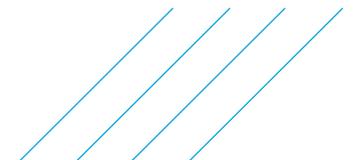
# Option Package Appraisal



## WeITAG benefits assessment framework

Potential Significant Beneficial Impact (++++)	—————	Score of 3
Potential Moderate Beneficial Impact (++)		
Potential Slight Beneficial Impact (+)	—————	Score of 2
No Likely Notable Impact (0)		
Potential Slight Adverse Impact (-)	—————	Score of 1
Potential Moderate Adverse Impact (- -)		
Potential Significant Adverse Impact (- - -)		

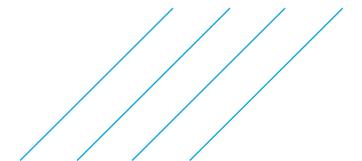
- › The impact of each of the options considered in the context of a range of assessment criteria. The assessment uses a multi-criteria assessment framework (MCAF) to identify and quantify the performance:
  - › Study Objectives;
  - › Social and Cultural; and
  - › Policy Context
- › Reference is made to the scoring criteria recommended in WeITAG 2017, which makes use of a seven-point scale to provide a score using a combination of qualitative and quantitative inputs. However due to the high-level strategy nature of this study, the scoring has been rationalised into a three point scale, using a qualitative assessment.



# Option Package Appraisal

The Results of the MCAF for each Options Package, presented as green for the higher scoring elements, and red as the poorer scoring elements, shows that each package will result in a positive impact on the movement context within the central area.

Options Package	Work Stage 1 objectives	Social & Cultural	Policies and Studies	TOTAL
Options Package 1	Green	Green	Yellow	Green
Options Package 2	Green	Yellow	Yellow	Green
Options Package 3	Green	Green	Yellow	Green
Options Package 4	Green	Yellow	Yellow	Green
Options Package 5	Yellow	Green	Red	Yellow
Options Package 6	Red	Yellow	Red	Yellow
Options Package 7	Yellow	Green	Yellow	Green

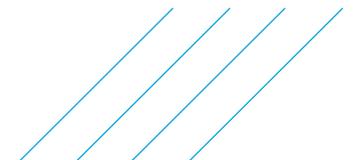


# Transport Strategy Benefits

- › The Transport Strategy provides a framework from which specific projects and initiatives can be developed, providing the over-arching vision for transport in the central area.
- › Specific projects will require case-by-case cost estimation, with funding being required from the Strategic Regeneration Project and/ or Specific Capital Grant applications via a range of funding avenues.
- › The Transport Strategy does not substitute specific Transport Assessments for each individual development/project, however it provides improvement themes that each project should either contribute towards or demonstrate compliance with.
- › The outputs of the Transport Assessment will be used to accurately predict the impact on the council's transport infrastructure and the Transport Strategy will provide the overarching framework through which those impacts can be negated.

## Next Steps

- › We are in the process of engaging with Transport for Wales, to use the Strategic Transport Model, developed in collaboration with our officers, to develop and analyse specific measures within the option packages of this strategy. The strategic model includes both vehicular and public transport forecasts.
- › As specific measures are identified, reference will be made to the themes within the Transport Strategy's Option Packages to underpin our future Capital Grant bids.





**ATKINS**

Member of the SNC-Lavalin Group



Thank you