South Hampshire Strategy Development Plan South Coast Corridor Multi-Modal Study Prepared for **Government Office for the South East** August 2002

Halcrow Group Limited

In association with:

Accent

Chris Blandford Associates

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South Coast Corridor Multi Modal Study South Hampshire Strategy Development Plan

Contents Amendment Record

This report has been issued and amended as follows:

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1 Introduction

1 Introduction

1.1.1

1.1 Background to the Strategy Development Plan

The South Coast Corridor Multi Modal study (SoCoMMS) is being undertaken on behalf of the Government Office for the South East (GOSE). The study has developed a transport strategy for the South Coast between Southampton and Thanet. This in turn will be an important element of the Regional Transport Strategy being developed by the South East Regional Assembly (SEERA).

1.1.2 The development of the transport strategy has made use of a strategic transport model, which has been specifically developed for SoCoMMS. The model represents an average hour between 0700 and 1900 with highway and rail network definitions. Travel forecasts have been developed for 2016 and 2030 for which, a range of transport measures have been tested, either in isolation or in combination. The model has been used to test highway, public transport and demand management initiatives. The use of the model has provided valuable information in establishing the composition of a strategy for the South Coast.

- 1.1.3 The transport strategy that has emerged includes a range of interventions:
 - local initiatives (public and private sector);
 - local public transport improvements;
 - strategic public transport improvements;
 - targeted road improvements;
 - freight initiatives;
 - safety and mobility initiatives; and
 - to provide balance demand management.
- 1.1.4 In order to provide further detail on the elements of the strategy, a series of Strategy Development Plans have been prepared. These include:
 - South Hampshire;
 - Chichester;
 - Arundel;
 - Worthing;
 - Brighton and Hove;
 - East of Lewes;

- Bexhill-Hastings; and
- Public transport.
- 1.1.5 The purpose of the strategy development plans is to investigate the performance of multi-modal measures at the local level. The plans will provide a feedback to the strategy development process by confirming the inclusion of key measures. The plans will provide greater detail on the measures and their appraisal. Where

appropriate, an AST is included within the strategy development plans.

1.2 The South Hampshire Strategy Development Plan

1.2.1 This Strategy Development Plan covers the area of South Hampshire. In particular, the Strategy Development Plan follows on from work undertaken as part of the M27 Integrated Transport Study.

1.2.2 The key issues to be considered as part of this strategy development plan are to:

- review schemes arising from the M27ITS study, checking consistency with emerging strategy being developed as part of SoCoMMS;
- identify a delivery plan for measures in the South Hampshire area;
- provide appraisal of priority elements from M27ITS;
- examine implications of demand management measures (workplace parking levies and cordon charges); and
- examine institutional arrangements and implications for operation and delivery of one strategy.

1.2.3 The key outputs from this strategy development plan will be:

- an implementation plan for the delivery of elements within the South Hampshire area;
- to provide an exemplar on charging policies which could be reviewed for use elsewhere in the corridor; and
- a paper on institutional arrangements.

2 Current Travel Conditions

2 Current Travel Conditions

2.1 Introduction

2.2.1

2.2.2

2.1.1 This section of the report outlines the current travel conditions within the South Hampshire area of the SoCoMMS corridor. This analysis draws on data collected from a wide range of sources from the local authorities, transport operators and other survey information.

2.2 Existing Travel Conditions

The M27 comprises a significant element of the SoCoMMS study corridor in that it carries the highest traffic volumes. The area was the subject of an independent multi-modal study, the M27 Integrated Transport Study (M27ITS). A review of current travel conditions was undertaken for the M27 study. This is briefly reported here, supplemented by additional data collected by SoCoMMS and information collated by Hampshire County Council.

The South Hampshire area has the highest car ownership levels along the South Coast corridor. There are 127 cars per 100 households compared to a national average of 99 cars per household. Car is the dominant mode in terms of commuting trips (over 70% of journeys are made by car). Monitoring data collected by Southampton City Council for movements into and out of the city centre shows that 10% enter by foot. This compares with 4% by rail, 20% by bus and less than 2% by pedal cycle.

2.2.3 Traffic Flows Table 2.1 shows the 2001 AADT (Annual Daily Traffic Flows) for the key motorway and trunk road network within South Hampshire. This demonstrates the high traffic volumes, particularly between junctions 3 and 8, and between junctions 11 and 12 where flows exceed 100,000 vehicles per day. The M27ITS quotes that 33% of the traffic on the M27 uses it daily (or everyday), 25% uses it at least three times a week and the balance of 42% uses it less than three times a week. The study also notes that 67% of M27 traffic is local and less than 10% is pure through traffic (travelling the entire length of the M27). Further, 75% of those surveyed reside within the Southampton/ Portsmouth/ Havant area. Thus, the M27 mostly serves its immediate neighbourhood.

Location	2001	Stress	% HGV
		Factor	
A31 west of Cadnam	59,600	0.87	6
M27 Junction 1 – 2	68,700	0.70	7
M27 Junction 2 – 3	93,200	0.96	7
M27 Junction 3 – 4	105,700	0.90	11
M27 Junction 4 - 4a	Na		Na
M3 Junction 11-12	111,200	1.13	10
M3 Junction 12-13	110,100	1.00	10
M27 Junction 5 – 7	112,700	1.16	8
M27 Junction 7 – 8	104,300	1.01	7
M27 Junction 8 – 9	94,500	0.77	8
M27 Junction 9 – 10	85,600	0.69	9
M27 Junction 10 – 11	95,500	0.84	8
M27 Junction 11 – 12	107,600	0.94	7
M271 - South of M27 Junction 3	49,500	0.64	15
M271- North of M27 Junction 3	13,700	0.14	9
A27 Between A2030 – M27	111,400	1.56	Na
A27 Between A3(M) - A2030	123,800	1.21	5
A3(M) Between Junction 2 and	77,800	0.64	Na
Junction3			
M275 South of M27	79,500	0.73	3

Table 2.1: Motorway and Trunk Road AADTs, 2001 (Source Highways Agency)

The Highways Agency have provided an indicator called the Congestion Reference flow (CRF)(based on a procedure outlined in the Design Manual for Roads and Bridges Volume 5). This is used in comparison with the AADT to derive the stress factor for a link, which is used as a proxy for journey time reliability. Values greater than 0.75 are generally held to give cause for concern. Table 2.1 shows that sections of the M27 have stress factors greater than one. Work undertaken by Hampshire County Council indicates that in 2000, traffic flows on 40% of the Strategic Highway Network exceed the Congestion Reference Flow (CRF) level. These are:

- M27 north of Southampton;
- M3 from its junction with the M27 north;
- M27/A27 across the Portsmouth peninsular; and
- A32 on Gosport Peninsular.
- A326 at Marchwood

2.2.4

2.2.5

The M27 ITS documentation provided information concerning drivers' perceptions of the level of service offered by the M27. Only 5% felt levels of delay were unacceptable. 77% recognised the M27 to be congested, but felt delays were relatively short. 18% felt the M27 was not congested. According to the same study, "Almost half the respondents felt unsafe at times on the motorway, blaming high speeds, overtaking, aggressive driving, HGVs, congestion and poor visibility. The east-west alignment of the motorway gives rise to glare problems in the morning eastbound and the evening westbound."

2.2.6

Rail - The rail network within the area comprises:

- north-south links to London from Southampton and Portsmouth;
- an east-west route from Southampton to Havant (continuing on to Brighton);
- an east-west route from Fareham to Eastleigh; and
- a route from Southampton to Romsey and Salisbury.

2.2.7

The key interchange stations within the area are Southampton Central, Southampton Airport Parkway, Portsmouth & Southsea, Portsmouth Harbour and Havant. Data collected by the London Area Travel Survey for station entries to the key stations in South Hampshire is shown in table 2.2. This shows that during the day over 5,000 passengers entered Southampton Central station.

Station	Station Entries
Southampton Central	5,100
Southampton Parkway	1,220 * (0600-1600)
Portsmouth & Southsea	2,350
Fareham	1,700
Havant	2,640

Table 2.2: Station Entry Counts (Source LATS survey)

2.2.8

Bus- Bus services in the area are provided by a number of operators including First Southampton, First Provincial, Stagecoach, Solent Blue Line. Within the urban areas of Portsmouth and Southampton, bus has a good mode share with 9% and 13% of commuting journeys respectively per day. The urban areas generally have good bus coverage with high frequency services at peak towns. However, in suburban fringes and in the smaller towns bus services are less frequent.

2.2.9

The main bus corridors are as follows:

- Southampton to Totton, Lordshill, Botley (via Bitterne) and Fareham;
- Fareham to Gosport; and
- Portsmouth to Horndean and Leigh Park.

2.2.10

Ferry - The area has a number of domestic ferry services in the study area including links with the Isle of Wight, movements between Southampton and Hythe and movements across Portsmouth Harbour. Over 2.6 million passengers use the ferry services between Southampton and the Isle of Wight. White Horse Ferries operate the Southampton to Hythe passenger service, providing pedestrians and cyclists with access to the Waterside parishes and New Forest. The Hythe Ferry has 450,000 passengers per annum and this service is estimated to save the equivalent of some 4 million kms per year over the alternative road route from Hythe and the New Forest to Southampton. There are domestic ferry services at Portsmouth to Gosport and the Isle of Wight. These include a foot passenger service between Portsmouth Harbour and Ryde which has interchange with the rail services at each end. In addition there is also a vehicle ferry to the Isle of Wight which operates between Portsmouth and Ryde which carried 7.5 million passengers in 2000 and nearly 1 million vehicles.

2.2.11

Ports- Within the South Hampshire area are the ports of Portsmouth and Southampton which have substantial capacity geared to handling freight and passengers. Portsmouth handles over 3 million international sea passengers per year (16% of passengers passing through south coast ports). The port handles 0.9 million passenger vehicles per year (excluding Isle of Wight Ferries). By comparison, 0.3m passengers passed through Southampton.

2.2.12

Freight volumes on the M27 and in its vicinity are understandably high with 10% of traffic being HGV's. The main operation for Southampton port is the handling of freight. The port handles over 35 million tonnes per year making it the dominant port on the South Coast in terms of freight. In 1999 Southampton handled 53% of south coast freight while Dover handled 31% of freight. Portsmouth handles over 4 million tonnes of freight per year.

2.2.13

Deep sea container traffic is growing at 4%pa. This will place significant pressure on the rail network and promises to threaten the road network too if rail capacities are not improved.

2.2.14

10.5 million tonnes of non-bulk freight (associated with both the ports at Portsmouth and Southampton, 4.5 and 6.0 respectively) represents an estimated

16% of the non-bulk freight tonnage starting or finishing in Hampshire. Most of this traffic, therefore, is long distance (in 1996 only 37% of the freight passing through Portsmouth was destined for the South East).

2.2.15

Rail carries 30% of the containers through the Port of Southampton, but none of Portsmouth's freight. Apart from the container traffic through the Port of Southampton, significant flows include aggregates to Eastleigh and Botley, petroleum products to and from Fawley (most petroleum moves by pipeline), cars/vans to and from Southampton and Ford at Eastleigh, military materials to and from Marchwood Military Port, gypsum from the Port of Southampton, and steel products to Southampton.

2.2.16

Airports- Within South Hampshire is Southampton airport. It positions itself as the leading business airport for Central Southern England. Its passenger profile has a high business traveller focus. In 2000 there were 855,000 passengers using the airport (a growth of 40% since 1997), of which 219,000 were on European flights. In 2000 there were over 27,000 air traffic movements (ATM) at the airport. Over 73% of passengers arrive alone. In addition, 43% of all passengers passing through the airport originate from South Hampshire (including the Isle of Wight); 63% from the whole of Hampshire and 87% from Hampshire and surrounding counties. Southampton Airport is therefore essentially a business airport for local business professionals. 99% of its flights are scheduled services aimed at this market. Services operate to European centres such as Paris, Brussels, Amsterdam, Dublin and Frankfurt as well as domestic flights to the Channel Islands and within the UK. There is a very small freight operation at Southampton Airport.

2.3 Public Perceptions of Transport

2.3.1

Information collected by Hampshire County Council indicates that the key reason people use their car in South Hampshire is because it is quicker than other modes. This was stated by 70% of respondents compared to a Hampshire average of 60%. The second most common reason people gave for using the car in South Hampshire is because it is a convenient way of carrying passengers and goods where 40% were of this view compared to a Hampshire average of 30%.

2.3.2

In relation to the rail network local residents have identified journey times (36%), reliability (33%), train frequency (33%), ease of finding a seat (33%), ease of boarding/alighting (31%), convenience of station to house (31%) as either good or very good.

- 2.3.3 The poorest aspects of the rail network (based on peoples perceptions) were fares (47% rating them as poor or very poor), cost of parking at station (32%), ease of parking at station (30%) and facilities at stations (28%).
- 2.3.4 In relation to the bus network, local residents have identified convenience of bus stop to home (55%) and ease of finding a seat (44%) as either good or very good. The poorest aspects of the bus network (based on peoples perceptions) were shelter/waiting facilities (39% rating them as poor or very poor), cost (33%) and service frequency (27%).

2.4 Views of the Business Community

- 2.4.1 Information collected by Hampshire County Council on business reactions to the transport network indicates that they are generally satisfied with the transport network. 76% consider the existing infrastructure to be good or very good for distribution. 68% of companies surveyed, across all business sectors, cite traffic congestion as the key transport issue for their business.
- 2.4.2 Road transport is the principal means of transporting goods for most companies (73%). 13% of companies make use of air transport, 11% use the sea and 3% use rail as a means of transporting goods. 40% of survey respondents indicated that the main reason for choosing a particular mode of transport is the destination of the journey. 80% of respondents would not pay for improvements, which would save time in distribution.
- 2.4.3 84% of respondents would not consider paying for or contributing to measures to reduce commuting or business journey times. 72% of businesses do not offer any staff travel schemes or incentives.

2.5 Problems and Issues Identified by SoCoMMS

- 2.5.1 As part of the SoCoMMS study a review of transport problems and issues within the corridor was undertaken, This was based on a review of local authority documents and a series of workshops which were held with key stakeholders. Within the Hampshire area the transport features that were considered to be working well included:
 - Southampton to ferry-free bus (West Quay- City Council and Red Funnel);
 - the improving cycle network;
 - the M27 generally functions well outside of the peak periods;

- Portsmouth/Gosport ferry;
- ROMANSE system;
- South Hampshire rapid transit;
- public transport for people with disabilities improving;
- Local Authorities working well together in Hampshire; and
- increased funding available to local authorities.
- 2.5.2 **Congestion-** From examination of the Local Transport Plans, comments made at study workshops and information from other sources, it is apparent that major urban congestion problems are experienced in Southampton, Fareham, Gosport, Portsmouth. Within the South Hampshire area key problem locations include:
 - flows on the M27 are approaching capacity in peaks, particularly on the sections between Junctions 3 to 7 and 9 to 12. The congestion on these sections is compounded by the local topography;
 - the M27 motorway intersections are heavily congested in the peak periods;
 and
 - the section of the A27 between the A2030 and A3(M) is 4 lanes in each direction with heavy traffic flows but suffers from a large amount of weaving between traffic lanes and the presence of slow vehicles.
- 2.5.3 Throughout the study area there is public concern about the impact that increasing car use is having on the environment. These impacts are at a variety of levels and include increased noise, air pollution, reduced air quality and associated health problems. Rising traffic levels and associated congestion, pollution and severance increasingly threaten the quality and special character of the area's towns, villages and countryside.
- 2.5.4 **Public Transport-** The study team sought to identify why people did not use public transport. Many have expressed the view that there has been a lack of investment in the infrastructure, particularly rail. The image of poor quality is reflected through all aspects of the system, from the condition and cleanliness of existing rolling stock, the perceptions of the appropriateness of future rolling stock, the image in terms of journey speed, travel costs, service availability, ticketing systems and passenger information.
- 2.5.5 Directly related to the issue of service quality, conditions at stations were also raised as a matter of considerable concern. The main concerns relate to passenger

comfort, personal safety and car parking facilities. Issues related to rail accessibility have been raised both in the context of initial access to the rail system and secondly in terms of the level of accessibility that the rail network offers, once it has been accessed. These two issues, although different, are interlinked as willingness to initially access the system is, to some extent, dependent of its usefulness.

2.5.6

In relation to buses, the major failings were identified as the lack of service availability in the evenings and at weekends. The limited extent to which the bus service penetrates into the community, particularly in more rural areas was also raised. In addition, issues related to the high cost of travel and the inflexibility of the current deregulated operational regime and finally the general lack of facilities, in terms of passenger comfort, passenger information and bus prioritisation were also identified.

2.5.7

The issues faced by cyclists have received much prominence within both the study workshops and Local Transport Plans. Additionally, local authorities, together with Sustrans are doing much to develop the local and national cycle networks within the corridor. The generally flat terrain within the coastal towns, together with their compact size, offers ideal conditions for cycling. Cycling is healthy, cheap and environmentally friendly, and particularly suited to short journeys (such as the journey to work, the shops and school).

2.5.8

There are, nonetheless, still a significant range of problems that need to be addressed if cycling is to become a pleasurable experience for all. In terms of general comments most concerns revolve around general road safety issues and the non-availability of secure parking.

2.5.9

Potential cyclists are deterred by the unpleasant environment of the existing road network. There are currently real and perceived road safety problems associated with cycling due to a general lack of dedicated facilities and infrastructure. Cycling is considered dangerous on rural roads due to driver behaviour and associated traffic speeds. Workplace facilities for cyclists (secure parking, showers, and changing and storage facilities) are generally limited. There is still generally a lack of good quality, covered parking facilities within town centres and in the vicinity of local facilities. In many areas, whilst a national network is being developed, there are few, inconsistent or incomplete purpose built local links for cyclists.

2.5.10

Transport Integration- In the preceding sections it has been seen that there are severe congestion problems on the roads within the study area, brought about through high dependency on the car. In addition, public transport services are inadequate to provide a viable alternative to the car. In the case of the latter, however, many of the identified deficiencies might be addressed if there was sufficient funding, political will and a desire from the general populace to change behaviour.

2.5.11

A key theme that has underlined many of the problems has been the inability of public transport to compete with the car, both in terms of its ability to penetrate into rural areas and its inability to provide a seamless travel alternative between origin and destination.

2.5.12

For this to be overcome, a much more integrated transport strategy is needed, recognising that all modes of transport will have their place within any future solution. The key to success lies in providing a fully integrated system, making best use of the private car, the taxi, community transport, the bus, the train, cycling and walking and linking each to the other through fully developed facilities that allow for good interchange. To promote the use of railways, for example, it is important for the passenger to have a seamless journey. This requires trains that connect with other trains, buses, taxis and cars at interchange points that are comfortable, welcoming and informative. Transport integration issues have featured strongly in all the workshop sessions that have been held.

2.5.13

At the current time, the car plays a significant role in many people's day to day travel patterns and, apart from interchange between the car and walking, there is very little opportunity (or indeed desire) to interchange between the car and public transport. Established facilities that do exist are limited to the park and ride scheme in Winchester and car parks at railway stations.

2.5.14

A preferred solution, wherever possible, is to encourage travellers to access public transport services through use of non-car-based modes. This approach has significant advantages in that it reduces the need for costly and environmentally intrusive car parking and it can strengthen the overall viability of local bus services. For such an approach to be attractive, however, good interchange facilities have got to be provided at all points where passengers change mode, i.e. at the bus stop near to the origin, at the origin and destination railway stations and near to the final destination.

- 2.5.15 The overall problems of interchange, through the majority of the south coast corridor are summed up as follows:
 - Poor physical interface Excessive distances between rail stations and closest bus stops or cycle parking being sited an inappropriately long distance from a rail station platform.
 - Difficult access Many station accesses are situated on congested parts of the county's road network. In many cases mobility by car has been put before convenient, attractive and safe access for other modes such as walking, cycling and buses.
 - Lack of parking spaces.
 - Poor connectivity Onward journeys are often disadvantaged by a lack of co-ordinated timetabling between and often within modes.
- 2.5.16 The Airports The Operator's Perspective- From discussions with the management team at Southampton airport and examination of the Southampton Airport Access Strategy, the key landside transport problems and barriers to increasing current levels of public transport usage by passengers are as follows:
 - The 'time sensitive / cost insensitive' nature of business passengers.
 - The current lack of pubic transport to meet early morning and late evening flight times.
 - The scattered residential locations of passengers, often in country areas with little public transport access.
 - The need to negotiate the bridge over the rail tracks at Southampton Airport Parkway rail station.
 - There is also a concern over the lack of regular trains arriving at Southampton Airport Parkway rail station early enough in the day to allow business passengers to take early morning flights from the airport.
- 2.5.17 The main obstacles to implementing a staff related company travel policy for those working at BAA Southampton and its business partners are given below:
 - The work shift patterns of staff particularly those who start very early and those who finish very late – which makes public transport usage an unrealistic option due to lack of available services and concerns over personal security.
 - The diverse range of residential locations of staff, many of whom live in areas not well served by public transport.

- The requirement of airline crews to reside within 45 minutes of the terminal.
- 2.5.18 **Ports-** The key issues raised by the port operators can be summarised as follows:
 - The roads linking the ports with the M25, and for Portsmouth and Southampton the M27 and M3 / A34, are the most important arteries.
 - Port related traffic is thought to make little use of other roads within the south coast corridor, although limited data is available.
 - The ports have a degree of dependence on the corridor's road infrastructure, but more for workers' access over short distances than for the longer distance movement of passengers and cargo.
 - Rail services are important for Southampton for the carriage of containers and trade cars.
- 2.5.19 In terms of their immediate impact on the south coast transport corridor, the most significant factor is that the ports are very substantial providers of direct and indirect jobs. The ports therefore generate significant work based travel demand. At both Southampton and Portsmouth the ports and maritime sectors are seen as the largest single source of local employment.

3 Transport Model Development

3 Transport Model Development

3.1 Introduction

3.1.1

3.2.1

3.2.2

3.2.3

The modelling of schemes in relation to the South Hampshire area has been undertaken in two ways. There is a strategic transport model which covers the full area of the south east of England and allows wider traffic diversions to be assessed. Secondly a local model was developed for the South Hampshire area as part of the M27ITS which looks at local issues. The latter was made available by GOSE. This section outlines the models that have been developed.

3.2 Strategic Model

A strategic transport model has been developed for the SoCoMMS study with the aim of testing a range of schemes, policy measures, and strategies within the study area. The model is multi-modal in nature in that it has representations of the highway, rail and interurban bus/coach networks. The model operates within the EMME/2 software.

The SoCoMMS model has been developed from a range of existing sources. The highway model has been developed from SERTM (South East Regional Traffic Model), ORBIT (a multi-modal study investigating orbital movements around London) and local models developed for other multi-modal studies (e.g. the Access to Hastings study and M27 Integrated Transport Study). The rail element of the model has been developed from data obtained from the DTLR (Department of Transport, Local Government and the Regions). The network databases have been developed in a Geographic Information System (GIS). The model covers an area from the south coast to London and the river Thames (northern boundary) and Wiltshire / Dorset (western boundary).

The model has been used to test a range of transport interventions including road schemes, rail measures, and demand management. The model has sub-models which allow the following to be included:

- Trip diversion;
- Modal transfer;
- Trip generation; and
- Trip suppression.

3.2.4 The development of the Strategic Model is outlined in the Strategic Model Development Report.

3.3 Local Traffic Model

- 3.3.1 A local SATURN model was made available to the study team. This was developed by the M27ITS study and covers the area between Cadnam and Havant. The SATURN model allows more detailed representation of junction conditions to be represented. The model represents traffic in the morning peak hour between 0800 and 0900.
- As outlined above, the choice of the SATURN model is to allow junctions to be modelled in more detail. The network definitions includes:
 - Link lengths; and
 - Speed flow curves.
- 3.3.3 The junction descriptions include:
 - Junction type (priority, roundabout or traffic signal);
 - Number of lanes on each entry arm;
 - Saturation flows by turn;
 - Traffic signal timings; and
 - Gap acceptance parameters.

Future Travel Conditions

4 Future Travel Conditions

4.1 Introduction

4.1.1 This chapter provides a review of local travel conditions in the future assuming there are limited transport interventions. The next section outlines the implications of the regional planning guidance. This is followed by a review of land use and network assumptions. The implications for travel demands in the area are then discussed.

4.2 Regional Planning Guidance

4.2.1 The recently published RPG9 for the South East (March 2001) covers the period up to 2016 and sets out the framework for the long term future of the South East. The main principles that govern the continuing development of the region include the following:

- Urban areas should become the main focus for development through making them more attractive, accessible and better able to attract investment.
- Greenfield development should normally take place only after other alternatives have been considered and should have regard to the full social, environmental and transport costs of location.
- Access to jobs, services, leisure and cultural facilities should be less
 dependent on longer distance movement and there should be increased
 ability to meet normal travel needs through safe walking, cycling and
 public transport with reduced reliance on the car.
- Transport investment should support the Mayor of London's Spatial
 Development Strategy, maintaining the existing network, enhancing access
 as part of more concentrated forms of development, overcoming
 bottlenecks and supporting higher capacity and less polluting modes of
 transport.
- 4.2.2 Policies H1 and H2 of RPG9 set out the housing requirement for London and the South East between 2001 and 2006. The policy indicates that within Hampshire, some 6,000 new homes are needed each year.
- 4.2.3 In addition, South Hampshire has been identified as a Priority Area for Economic Regeneration (PAERs). Each PAER has its own distinctive set of problems and

will need individually tailored strategies. The following are located within the study area:

South Hampshire, Southampton and Portsmouth (Policy RE7)

Key Issues

- Local deprivation
- Skills mismatch between new industry's job requirements and unskilled resident workforce

Key Priorities

- Skills enhancement
- More affordable housing in prosperous suburban areas and areas easily accessible to new employment areas
- Maximise economic potential
- Make best use of available land and communications infrastructure
- Maximise potential for urban renaissance
- Promote mixed communities in suburban areas
- Enable social inclusion
- Target funding and assistance to tackle deprivation and enhance skills
- Ensure multi modal access in a north and south direction to the port to allow better service to inland markets beyond the South East

4.3 2016 Land Use Assumptions-

4.3.1 Throughout the development of the SoCoMMS Reference Case we have, as far as possible, attempted to maintain consistency with the other multi-modal studies which are proceeding simultaneously. In so doing, we have used the latest TEMPRO projections as control totals at the County level for those counties in the study area which fall into the South East Region. These County totals were prepared by HETA for use in the SERAS Reference Case and have been used to maintain consistency with SERAS, despite the reservations of some of the County Authorities about these totals.

4.3.2 However, the notable difference between the SoCoMMS methodology used and that used for SERAS is the manner in which the district distributions for

population, workforce, households and employment have been derived¹. We felt that the narrower study area of SoCoMMS necessitated more of a policy-related focus at the level of the individual districts, as it was thought that variations between Districts within the Counties are likely to have an impact on the study outcomes. Thus, in order to determine distributions across the Counties, reference has been made to the relevant County Structure Plans which set out housing allocations for each of the districts. We have also consulted the County authorities to obtain their views on the distribution of these figures between the respective districts in their area.

- 4.3.3 Consultation with the Counties on the district distribution of the TEMPRO totals was undertaken in two phases. In the first instance letters were sent out following the land use planning workshop, requesting the population and employment figures which underpin the respective Structure Plan dwelling allocations to 2016 (where relevant). Housing and employment land monitoring reports were also requested.
- 4.3.4 In most cases, the levels of response from the Counties to this first round of consultation was good, although two broad issues emerged:
 - In general, the Structure Plan time horizons were to 2011 rather than to 2016; and
 - The County baseline figures and the projected growth figures were not always compatible with the TEMPRO County totals.
- 4.3.5 Although there was some level of variation between the levels of information supplied by the Counties, the approach adopted for each County was similar. For the assembly of the household, population and employment datasets, this broadly consisted of the following:
- 4.3.6 For **household growth**, based on the housing and employment land monitoring reports, an estimate of the completions to 1998 was obtained. This was fed into the baseline information and allowed us to calculate outstanding commitments (levels of housing growth) for the remainder of the Structure Plan period. Where the Structure Plan time horizon was to 2011, it was assumed that the distribution

¹ The SERAS Planning Reference Case derived district distributions by dividing the TEMPRO county trend-based totals by the TEMPRO county policy based totals to achieve a factor. This factor was then applied to each of the TEMPRO trend based totals at the district level so as to derive a policy based total for each of the districts.

of dwelling growth implicit in the Structure Plan would continue to 2016 unless the County indicated otherwise. This permitted us to arrive at an estimate as to the distribution of future household growth between the districts in each county. This distribution was applied to the TEMPRO county level growth figure. When added to the TEMPRO 1998 base year figures, this yielded a distribution for 2016.

4.3.7

For **population growth**, where the county provided population growth figures, a similar approach to that described above was adopted, applying the County distribution to the TEMPRO County control total. Where the county did not provide population data, a similar distribution to that applied to household growth was applied to the TEMPRO population growth figure with the distribution for 2016 calculated as described above. For **workforce** totals a workforce/population factor was derived from the TEMPRO trend based forecasts for 2016 for each district, and then applied to the SoCoMMS population figures to arrive at a figure for 2016.

4.3.8

DTZ Pieda undertook to produce the **employment change** forecasts. TEMPRO 2016 county employment forecasts were used as control totals. A shift share method was adopted, taking into account land use policy considerations in order to determine the distribution of jobs at district level within each county. The first step was to calculate the shift in relative importance of employment within each district, assessing the distribution of the county total in the last 5 years, and to project that shift in the future to year 2016 assuming this shift happens at constant rate. These trend-based projections were then adjusted to take into account specific land use hypotheses that affect individual sites or areas within the districts. An adjustment factor was therefore applied to fine-tune the trend-based projections to knowledge of what is expected "on the ground" over the time period considered. Information on land use policy was substantiated by local forecasts of employment endorsed by the county councils themselves and / or by qualitative judgements from Structure Plans officers or forecasting officers in the County Councils.

4.3.9

Based on the above methodology, an interim draft distribution was derived for household, population and employment growth for each of the Counties to 2016. These figures were re-issued for comment by the Counties in mid-September. Where appropriate, the distributions have been adjusted to reflect further comments received. It is assumed that these figures are now generally in line with the County Authorities' views on the distribution of future growth for the purposes of this study.

4.3.10 Following consultation with the study area and area of influence local authorities, a set of planning data have been derived for each district. These are shown in **Table** 4.1.

	HOUSEH	HOLD	POPULAT	ION	EMPLOY	YMENT	WORKF	ORCE
District	1998	2016	1998	2016	1998	2016	1998	2016
East Hants	45,506	54,791	109,744	118,670	46,759	48,374	56,156	64,082
Eastleigh	46,475	57,102	110,918	123,025	58,212	59,857	58,695	66,434
Fareham	43,749	51,752	103,585	112,081	44,376	55,872	46,803	50,436
Gosport	31,855	36,886	75,651	80,229	22,351	22,083	32,998	36,905
Havant	49,126	54,174	116,437	118,842	41,515	44,545	47,225	47,537
New Forest	73,218	82,469	168,191	179,222	65,782	79,766	78,048	82,442
Portsmouth	75,403	90,596	187,088	197,261	110,015	111,447	80,850	89,754
Southampton	88,595	100,969	212,820	220,692	113,897	115,955	99,976	107,036
Test Valley	45,419	60,427	109,908	128,766	53,407	66,961	58,151	68,246
Winchester	44,132	56,447	108,373	121,360	75,341	79,172	54,205	62,500

Table 4.1: Demographic Data- 2016 SoCoMMS Reference Case

4.3.11

There is an additional refinement in allocating growth levels to individual zones. The SoCoMMS team have undertaken a review of development plans and environmental constraints to assess the future distribution of development within a district. On this basis, growth in the SoCoMMS model is allocated away from environmentally sensitive areas.

4.4 Travel Forecasts for 2016 Do-minimum- Network Assumptions

4.4.1

In developing a strategy for the south coast, account has been taken of those transport initiatives that are currently under construction, currently committed and those measures likely to be in place by 2016. Within the entire corridor, these include:

- Trunk Roads Schemes
- A27 Polegate bypass- D2 standard
- Major Rail Improvements
- Completion of CTRL from Ashford to St Pancras currently under construction (this will need to take into account changes to service patterns on the existing network)
- Virgin Cross- Country service improvements

- Completion of Thameslink 2000 and associated timetable changes
- Franchise Proposals-
- Measures arising from franchise proposals put forward by South Central,
 South West Trains and Connex South Eastern
- Local Transport Plans- Through the Local Transport Plan process, a number of initiatives have been accepted for funding in the December 2000 statement. These include:
- Crawley Fastway (guided bus scheme in the Gatwick Area)
- East Kent Access A256 upgrade to dual carriageway
- South Hampshire Rapid Transit (including provision of light rail between Portsmouth and Fareham and bus improvements between Portsmouth and Waterlooville-Horndean Bus Improvements)
- A280 Angmering Bypass
- Other Schemes
- East Kent Access Phase 2
- A259 Bognor Regis Relief Road.
- M20 junction 10a
- 4.4.2 In addition, there are a number of schemes in the Area of Influence being pursued which influence the South Coast corridor. These include:
 - Trunk Roads Schemes
 - M2 widening to D4 standard between Cobham and junction 4
 - A2- Bean Cobham Widening Phase 1 (Bean-Tolgate) -D4 standard
 - A2 Bean Cobham Widening Phase 2 (Tolgate- Cobham) D4 standard
 - A21 Lamberhurst bypass (S of Maidstone) D2 standard
 - A249 Iwade Queenborough Improvement (Kent) D2 standard
 - M25 J12-J15 Widening (Surrey) –D5/D6 standard
 - A2/A282 Dartford Improvement (M25) D4 standard
 - A23 Coulsdon Inner Relief Road (S London)- D2 standard
 - Schemes from Multi Modal Studies and Road Based Studies
 - A21 Tonbridge to Pembury Improvements
 - A3 Hindhead Common Tunnel
 - Service improvements Wadhurst to Tonbridge
 - Other Schemes
 - A24 Horsham Capel Improvement

4.5 Traffic Forecasts from the Strategic Model

4.5.1

The strategic model has been used to assess future traffic levels in the South Hampshire area with the do-minimum improvements only. The outputs from the Strategic model indicate for the Hampshire area:

- Growth in car trips in South Hampshire = 25%
- Growth in Vehicle kilometres in South Hampshire = 27%
- Growth in Vehicle hours in South Hampshire = 61%
- Reduction in M27 average daily speeds = 15%
- Growth in rail trips = 27%

4.5.2 The forecast AADT for the M27 corridor are shown in table 4.2. These show that traffic growth of the order of 28% is forecast on the western sections of the M27 corridor (junctions 1 to 3). Between junctions 11 and 12 the growth is 21% which takes into account traffic diversions resulting from the first phase of the Portsmouth-Gosport LRT. The review of the stress levels at 2016 indicates a number of sections with stress factors greater than 1.

Section	AADT Base	AADT- 2016 Do-	2016 Do-	
	year	minimum	minimum	
			Stress factor	
Junction 1 - 2	68700	88161	0.90	
Junction 2 - 3	93200	119345	1.23	
Junction 3 - 4 between	105700	130977	1.11	
slips				
Junction 5 - 7	112700	138684	1.43	
Junction 7 - 8	104300	118944	1.15	
Junction 8 - 9	94500	118584	0.97	
Junction 9 - 10	85600	111046	0.89	
Junction 10 - 11	95500	122094	1.07	
Junction 11 - 12	107600	133056	1.16	
South of M27 Junction	49500	62940	0.82	
3				
A27- Between A2030 -	111400	130175	1.82	
A3				
South of M27	79500	109384	1.00	

Table 4.2: 2016 Forecast AADT- Source SoCoMMS Strategic Model

4.5.3 The increase in traffic flows will result in increased congestion, poorer safety and a worsening environment. The forecasts indicate the need for a transport strategy for the area to provide alternative transport modes to the car.

5 A Strategy Plan for the Area

5 A Strategy Plan for the Area

5.1 Introduction

5.1.1

5.2.1

- The previous chapter highlighted the potential for traffic growth in the South Hampshire area with limited transport interventions. A number of studies have been undertaken prior to SoCoMMS. The local authorities have each developed Local Transport Plans which identify short term plans for spending on transport in their areas. The local authorities are working together to develop these initiatives.
- 5.1.2 The M27 Integrated Transport Study reviewed a range of transport measures for the short, medium and long terms and identified potential measures that could be taken forward. The SoCoMMS study has reviewed the outputs from the M27ITS and concur broadly with the measures put forward.
- 5.1.3 The role of SoCoMMS with respect to South Hampshire has been to draw these together into an integrated plan for the area, covering all modes. This chapter outlines a strategy for South Hampshire. This will be subject to further detailed investigations by the delivery authorities. The next section outlines a 'vision' for the area. This is followed by a description of the plan elements.

5.2 Vision for South Hampshire

The local authorities have begun studies for the South Hampshire area. They note that the current transport system is under pressure and that if forecast growth materialises, then the ability of the network to operate efficiently and effectively may be jeopardised. A vision is put forward for the area within the Hampshire County Council Stage 1 Evaluation report on transport as follows.

In South Hampshire, there is a need to provide a transport system, which supports the sub-region in meeting its aspirations for economic prosperity within a healthy physical and social environment, This requires the provision of infrastructure that allows for the efficient movement of people and goods in a way that minimises any adverse effects on the environment and recognises and caters for the needs of the whole community in terms of accessibility. In a transport context, what is required is for the sub-region to become an area where:

 there are high quality facilities that are fully accessible and served by an integrated transport system that is affordable, reliable and efficient;

- the principles of sustainability are to the fore and the adverse affects of travel are
 managed in a way that meets the quality of life aspirations (social, economic and
 environmental) of the present and future community; and that
- the benefits of new technology are harnessed to optimise the use of the network, manage
 the demand for movement and provide an attractive public transport system in order to
 help sustain and stimulate economic regeneration.

5.3 Outputs from the M27ITS

5.3.1 The M27ITS study was commissioned by GOSE to investigate transport issues in the M27 corridor between Southampton and Portsmouth. The study reviewed a range of highway and public transport initiatives for the area. The study provided recommendations for rail, bus, highway and other measures based on three time horizons (up to 5 years, 5 to 10 years, over 10 years). The study also identified schemes which were not to be pursued, and those whose need was unclear. The selection and phasing identified within the study was based on the practicality of delivering the scheme within the timescale and the anticipated benefits for the M27 corridor.

- The final report was approved by the M27ITS steering group and referred to the Regional Assembly and ministers. They have accepted the package and advised delivery agents to begin the investigations to deliver these elements.
- 5.3.3 SoCoMMS is assisting in this process by drawing the elements into a strategy for the area. SoCoMMS has reviewed the outcomes of the M27ITS work and carried out further investigations of elements in the longer term. This review has been undertaken in the light of the wider strategy for the south coast. SoCoMMS has reviewed the potential implications of demand management measures as part of the wider SoCoMMS strategy for the corridor.

5.4 Strategy Plan- Objectives

5.3.2

5.4.1 The objectives for a transport strategy for the South Hampshire area should accord with national, regional and local objectives. The key overarching objectives set out by the Department for Transport are:

- Integration Ensuring that all decisions are taken in the context of integrated transport policy.
- Environment Protecting the built and natural environment.
- Safety To improve safety for all road users.

- Accessibility Improving access to everyday facilities for those without a car and reducing community severance.
- Economy Supporting sustainable economic activity in appropriate locations and getting good value for money.
- 5.4.2 The work undertaken by the M27ITS study team sought to appraise elements against these objectives. The Hampshire Local Transport Plan has five specific local objectives which are detailed below in the order of priority, identified through the extensive local transport plan consultation process.
 - To widen travel choice: principally this involves the provision of improved facilities for alternative forms of transport to the car particularly for public transport, cycling and walking. Performance will be monitored through surveys of usage of all modes of transport, the completeness of cycle and pedestrian networks, the adoption of travel plans (for business and schools) and progress made towards the targets.
 - To promote safety: This involves seeking to reduce accidents, casualties and their severity and also includes road safety education and personal security. Performance will be measured principally through casualty rates and progress towards casualty reduction targets.
 - To make best use of transport networks: This involves managing the networks to provide a transport system which is safe, efficient, clean, and fair. It involves the allocation of road space through intelligent transport systems to meet area transport strategy priorities. Improved interchange as well as demand management and improved information will be used to allow transport users to make informed decisions. Performance may be measured in terms of congestion, air / noise pollution, accessibility and performance and use of different travel modes.
 - To maintain the transport networks: This is the maintenance of
 facilities and services from roads and bridges through to interchanges,
 footways, cycle routes, subsidised and community bus operations.
 Performance against this objective will be measured against backlogs of
 maintenance or strengthening works, safety records and numbers of

claims and complaints.

• To continue to develop partnership with the community: This aims to continue outreach programmes building up joint working with local communities, business groups and others which can lead directly to investment programmes and/or travel attitude and behaviour changes. Performance measures in this area can range from the numbers of groups contracted or actively engaged, to the outcomes in terms of investment, travel plan (e.g. schools) or other changes affecting the community or Council policy or plans which may change as a result of establishing partnership working.

5.5 The Strategy Plan

5.5.1 The proposed strategy for the area is shown on figure 5.1 with the elements listed in Table 5.1. The plan has a number of elements which in combination, draw together to meet the above objectives and produce an integrated package. There are a series of key themes within the plan:

- Overall management;
- Local initiatives;
- Bus measures;
- Rail measures;
- Access to Southampton Airport;
- Strategic Highway network measures;
- Freight initiatives;
- Strategic park and ride; and
- Demand management.
- 5.5.2 The table identifies the cost associated with each element, the delivery element and the priority.
- Management- The delivery of the strategy covering such a wide range of elements requires an integrated approach between the local authorities and the delivery agents. Within an area such as South Hampshire there are a number of key stakeholders responsible for transport. Bus and rail services are provided by a number of operators, while the local authorities have responsibility for the provision and delivery of their Local Transport Plans, the operation of local roads and investing in some bus services. The Highways Agency is responsible for the

strategic highway network. This is within a regional framework set by the South East England Regional Assembly and the national framework set by the Department for Transport. Given the fragmentation of the transport system, there is a need for the local authorities and key stakeholders to work together in an integrated manner. This will require the establishment of local partnerships for delivery. This issue is reviewed in chapter 7.

5.5.4 **Local Initiatives**- A key finding of the SoCoMMS study was the considerable volume of short distance travel that is made by car. In order to widen travel choice, investment is recommended at the local level. The potential for these was indicated in the M27ITS study and has been further developed here. This includes a range of initiatives:

- Green travel plans- this initiative would seek to encourage major local employers to develop Green Travel Plans. These would seek to encourage employees to make sustainable travel choices by encouragement to use other modes and reduce the growth in car usage in the peak period;
- School travel initiatives- this element of the strategy aims to encourage the use of non-car modes for the journey to school in the peak periods. This builds on a number of local authority initiatives being developed, such as the Hampshire Schools Partnership Programme. This seeks to integrate safety education with the development of school travel plans and the provision of local engineering measures to improve walking and cycling networks. The objectives of these measures would seek to improve road safety, widen travel choice and reduce the growth in car usage in the peak period;
- Travel Awareness Education- This element supports the continuation of the Headstart Community Involvement Programme which promotes the understanding of transport issues, provides information on travel choices and plays a role in changing travel behaviour in the longer term;
- Improved cycle facilities- this element seeks to improve local cycle network facilities such as improved cycle links to stations and town centres, as well as links to the National Cycle Network. As such this element is seeking to widen travel choice and improve road safety;
- Local town centre enhancements- these would provide local pedestrian, cycle and public transport improvements within town centres (e.g. improved interchange). They would seek to provide improvements in the main centres of Portsmouth and Southampton, as well as in smaller town

- centres such as Eastleigh, Gosport, Fareham; Romsey and Totton, and local neighbourhoods such as Hedge End, Rownhams and Nursling
- Intelligent transport systems (ITS) the ROMANSE project was undertaken by the local authorities to incorporate real-time traffic and travel information into the local transport strategies. The ITS system aims to provide a wide range of tools to allow traffic to use the road network efficiently. This is further enhanced by the provision of real time multi modal information to users through a range of outputs. The strategy seeks to encourage the further development of ITS systems in the South Hampshire area. ITS is seen as playing a major role in making the best use of the transport network and promoting wider travel choice.
- The role of Bus- Currently, bus caters for a significant local demand in the major centres of Portsmouth and Southampton. The M27ITS identified a series of measures which have been taken forward as part of SoCoMMS. A separate 'Local Public Transport Development Plan' has been undertaken for SoCoMMS. This identifies the future role of bus and potential investment that can be made. The inclusion of these measures is to widen travel choice and promote increased mode share for bus.
- 5.5.6 In the South Hampshire area there are a number of initiatives that can be pursued;
 - The development of Quality Bus Partnerships- these encourage joint
 working between local authorities and bus operators so as to promote and
 improve bus use.
 - Quality Bus priority corridors- there are a series of corridors in the area which cater for a number of bus services. These have been identified for a range of priority improvements (see Local Public Transport Development Plan) which seek to improve the reliability of bus journey times for services and encourage their use. These may include the expansion of bus telematic schemes to provide passengers with information on service headways, as well as providing Selective Vehicle Detection at appropriate locations in the corridors and improvements to passenger waiting facilities. The corridors include
 - Portsmouth- Waterlooville Horndean corridor- which is being developed as part of SHRT
 - A326/A35/A33 corridor between Hythe (Waterside)-Totton and Southampton

- Southampton to Botley
- Southampton to Nursling
- Southampton to Chandlers Ford
- Fareham to Gosport
- A27 corridor between Romsey and Fareham; and
- Other local corridors as appropriate.
- Review of services- with the introduction of the Light Rail System between Portsmouth, Gosport and Fareham, there is an opportunity to review bus services in the area in order to provide a more integrated public transport system.
- 5.5.7 The role of Rail- A Rail strategy has been developed for the SoCoMMS corridor. This is reported in a separate Strategy Development Plan. The aim of these measures is to widen travel choice and increase the mode share for public transport. As part of the strategy there are local rail enhancements and the introduction of a regional express which would link South Hampshire with other parts of the corridor (e.g. Ashford)
- 5.5.8 In the context of the South Hampshire area there are a number of initiatives proposed:
 - Improvements to stations and the rail environment- through the upgrade of facilities, better interchange opportunities with other modes, improved security (such as CCTV). These are documented in detail in the rail SDP;
 - Chandlers Ford- this element is included in the overall strategy, although it was identified in SoCoMMS as a Do-minimum scheme (i.e. it was included within our base case). The proposal is initially to re-instate the station to provide a shuttle service from Totton to Romsey linking Chandlers Ford, Eastleigh, Southampton Airport Parkway and Southampton Central. This initial service is programmed to start from May 2003. In the medium to long term the strategy suggests the review of the infrastructure capacity issues in the Southampton area to enable the Chandlers Ford train services to be enhanced. This would be conjunction with the work necessary to encompass a second phase of SHRT.
 - Fareham station enhancement- this includes the provision of an additional platform at Fareham and the provision of enhanced interchange facilities. The new platform is required to deliver the increased timetable

- on the West Coastway. The interchange improvements reflect Fareham's key role as a local hub with interchange between rail, bus and light rail (links to Gosport)
- Havant station this includes the provision of an additional platform at
 Havant and the provision of enhanced interchange facilities. The new
 platform is required to deliver the increased timetable on the West
 Coastway. The interchange improvements reflect Havant's key role as a
 local hub with interchange between rail and bus and also between northsouth and east-west services
- Southampton and Portsmouth Stations improvements in interchange facilities between rail and bus, taxi, cycle and walk.
- New station at Eastleigh MDA- The South East of Eastleigh Major Development Area is one of the major MDAs allocated in the Hampshire Structure Plan. The strategy includes the provision of a station located between Hedge End and Eastleigh. This would be a proposed two-platform station with minimal facilities no car parking and minimal road access. It is anticipated that the funding for this station will come from developer sources.
- Eastleigh Chord- this facility would allow services to run between Botley/ Hedge End and Southampton. The completion of the chord allows a greater flexibility of service to be operated in the area, improves local access to Southampton Airport and would allow for the extension of the LRT to Southampton in the longer term. The M27ITS examined two alternative options for the chord. The northern alternative would be elevated to pass over a local yard and local road. The southern alternative would pass at ground level south of the existing rail yard, but in tunnel to avoid the airport runway and local roads.
- Double tracking between Fareham and Botley, (excluding section of about one mile through the existing single track tunnels) –The aim is to increase route capacity and improve service quality and reliability and with a minimum line speed of 90 mph and a headway of 3 minutes. This will largely involve reinstatement on an existing track formation although there may be some difficulties because of the mainly urban surroundings.
- **Services to Hythe** this element was identified by the M27ITS and includes the provision of rail services from Southampton to Hythe with stations at Totton, Hounsdown and Marchwood. The potential for these services should be further investigated.

5.5.9

The M27ITS also included other elements which have not been included within the Strategy Plan. These include the opening of new stations at Paulsgrove, Copnor, Northam, and Segensworth within the next 10 years and a further set of stations at West Totton, Totton, Farlington, Funtley, Leigh Park and Waterfront which needed further study. As part of SoCoMMS, a detailed timetable has been developed for the western coastway to assess the feasibility of the service being proposed. The timetable shows that the introduction of new stations on the coastway severely inhibits the ability to provide the timetable. As such, new facilities have been minimised in this area. The proposed stations at Farlington and Paulsgrove are the two which give greatest concern. It is recommended that there should be further investigation of the ability of the timetable to cope with new stations.

5.5.10 The appraisal of rail elements is given in the Rail Strategy Development Plan.

5.5.11

Light Rail- Light rail is to be provided between Fareham, Gosport and Portsmouth as part of SHRT. This was assumed as a do-minimum scheme within SoCoMMS as the scheme has been given the go-ahead by the government. It has been included here for completeness, but will increase accessibility to the Gosport peninsula in particular and effect modal transfer for journeys between Gosport and Portsmouth. The aim is to widen travel choice and provide a major public transport facility in an area of significant congestion.

5.5.12

In the longer term consideration is given within the strategy for extending the light rail system to Southampton. This would operate via the Netley line and allow additional stations to be provided (such as at Segensworth). In order to provide the LRT link to Southampton, the improvements between Fareham and Botley and the Eastleigh chord would be required. These would provide an alternative route for east-west services in the area and provide the capacity for additional public transport movements in the area.

5.5.13

In addition, proposals are being put forward by private developers for a monorail system between Tipner and Portsmouth. This could provide a link between a strategic park and ride site and the city centre.

5.5.14

Airport- Southampton Airport is identified in the Regional Transport Strategy as a regional transport hub. Within this goal Hampshire County Council and Southampton Airport are working in partnership to achieve this. The passenger use of Southampton Airport is growing and there is a need to improve multi-

modal access to the airport. In part this is undertaken through the rail and bus enhancements identified above. In addition, there are further local measures which are proposed to assist accessibility to the airport. These include:

- Junction improvements to M27 junction 5- this scheme was proposed within the M27ITS and is included here. In the short term improvements can be made to the junction such as the provision of dedicated left turn lanes (east to south, and south to west), with full signalisation. In the longer term an underpass could be built to take A335 traffic directly across the junction. The improvements would seek to improve the operation of the junction for all modes, including buses which serve the airport.
- Improved airport access route- this would seek to provide improved access between the airport and the M27 for all modes.
- Improvements to Southampton Airport Parkway the Airport Parkway provides a major interchange hub in the local area with bus and rail services. The strategy seeks to enhance these, particularly in the longer term with the provision of improved east-west rail services. In the longer term with the provision of the Eastleigh Chord, additional tracks and platforms could be provided at the station. A grade separated junction would be provided such that Botley line trains did not have to cross the main London line at grade. This would enhance safety and capacity.
- 5.5.15 **Freight-** This report has outlined the significance of freight movement in the local area with the presence of Portsmouth and Southampton harbours. In addition to the highway improvements outlined later, additional initiatives are proposed in the strategy to assist freight.
 - Portsmouth multi-modal freight terminal- an intermodal freight terminal is proposed on Portsea Island which will be a rail head with road vehicle interchange for port traffic (containers, piggy back etc.) and other parties. Board approval has been given in principle but grants and other funding, land purchase and other aspects have yet to be concluded. Completion of construction in 2003/04 is considered possible.
 - Freight Quality Partnerships- The local authorities should seek to work with the freight industry to identify opportunities for freight movement by non –road modes. Hampshire County council has established a FQP with the Hampshire Economic Partnership and the Freight Transport Association. The aim is to develop a number of initiatives for moving goods by a range of modes and for encouraging sustainable distribution.

- Gauge Enhancement- The Strategic Rail Authority/Railtrack are examining the gauge enhancement of the Southampton to Birmingham route (via Reading). This is seeking to increase the capacity for freight movement on this corridor. The M27ITS study included recommendations for Gauge Improvements to Southampton Central Tunnel. The aim would be to improve the clearance gauge to carry 9'6" containers on standard wagons. Railtrack are investigating the potential for W12 gauge enhancement.
- 5.5.16 Issues in relation to the development at Dibden bay are outlined in a later section.
- 5.5.17 **Highway improvements-** The M27ITS study made a series of recommendations for short, medium and longer term improvements in the corridor. These have been reviewed and the following elements have been included within the strategy:
 - Widening Junction 3 –4- the proposal is to increase from dual 3 to dual 4 lane carriageway due to the gradients on this section and the high proportion of weaving. This problem will worsen with increased traffic flows. The section also carries a high proportion of heavy goods vehicle traffic. The M27ITS notes that widening could be undertaken within the existing highway boundary;
 - Widening Junction 11-12- the M27ITS proposal is to provide an
 additional climbing lane. This section has a high proportion of slow
 moving vehicles. This is accepted given the high traffic flows on this
 section.
 - **Junction Improvements-** the M27ITS study proposed a series of junction improvements at a number of the motorway intersections. The purpose of these was to assist traffic crossing the motorway, as well as vehicles accessing/egressing the M27. Improvements were proposed to junctions, 2, 7, 8 9, 10, 11 and 12. These improvements include elements such as dedicated slip lanes, traffic signal controls, provision of additional capacity on slip roads (as appropriate).
 - **M271** the M27ITS reviewed the potential for widening the M271 within the highway boundary. The additional lane would be to provide added capacity at the M27 junction and also to provide an additional lane for freight, buses and high occupancy vehicles.
 - **A27 Upgrade** There is a section of the A27 which lies between the M27 and the A3(M). This section could be converted to motorway standard

- with the provision of a hard shoulder and alternative routes for nonmotorway users. The aim of this improvement is to improve safety.
- VMS- the strategy includes proposals for new driver information systems, variable speed limit infrastructure and access control measures. These would seek to make the best use of the available infrastructure,
- 5.5.18 There were a number of elements which the M27ITS reviewed which were considered should not be taken forward for further study. These included:
 - Widening between junction 5 to 7;
 - Widening between junction 7 to 8;
 - Widening between junction 8 to 9;
 - Widening between junction 9 to 10.
- 5.5.19 These schemes were not included as they were not found to significantly improve safety or that the additional capacity could not be fully utilised due to constraints on adjacent sections or junctions.
- 5.5.20 Strategic Park and Ride- The introduction of significantly enhanced public transport measures in the South Hampshire area allows the potential for strategic park and ride. The SoCoMMS study has examined the potential for park-and-ride throughout the study area, and concluded that within the South Hampshire area sites on the approaches to Southampton and Portsmouth could influence highway flows on key corridors. The SoCoMMS testing has examined sites in broad terms and has not identified specific sites. This would need to be the subject of further detailed studies. However, sites associated with the SHRT LRT, and key bus priority corridors could provide additional transport capacity on those routes. As part of a wider review within the SHRT strategy, other sub-regional sites may also be beneficial.
- 5.5.21 **Demand management** One of the elements that SoCoMMS has investigated is the role of demand management in the future. The traffic forecasts developed by the study team have indicated continuing traffic growth to 2016 and beyond. Tests were undertaken to assess the impact of public transport improvements on modal transfers. The study team found that 'carrots' on their own were not likely to be sufficient to reduce the growth in car use significantly.

- 5.5.22 A series of tests were undertaken during the strategy development phase which examined the potential for different charging mechanisms. The findings showed:
 - Increasing parking charges- this could be introduced now as part of a sub-regional framework, but requiring co-ordination between local authorities. These measures would have some effect on demand but would need additional measures;
 - Tolling motorways and trunk roads- would reduce traffic flows on the M27 motorway but with diversions onto alternative routes which were less suitable. This element was not taken forward;
 - Cordon charging identified as a potential demand management measure that could be used to affect car based movements into the town centres of Portsmouth and Southampton;
 - Workplace parking levies- identified as a potential demand management measure that could be used to affect car based commuting journeys in the area;
 - Parking levies, extension to out-of town retail stores- identified as a potential demand management measure that could be used to affect car journeys in the area. A concern was identified that by increasing public space charging (or cordon charging) in town centres, this would further promote the cost accessibility of out-of town centres. It is proposed that a levy should also be imposed on such spaces, although this would need legislation to be introduced.
- 5.5.23 The role of charging is outlined in chapter 6. This outlines the operational and enforcement issues associated with charging policies.

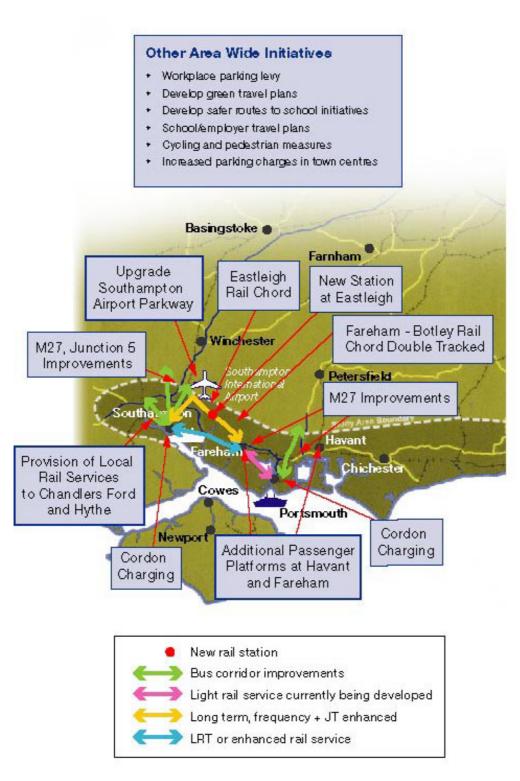


Figure 5.1 Principal elements of proposed strategy for SouthHampshire

Table 5.1: The South Hampshire Area Strategy

Scheme	Purpose	Priority	Cost (m)	Delivery Agent
Management				
Develop Joint Travel Partnership	To co-ordinate the management, implementation, operation and maintenance of the transport system	High- needed to deliver strategy		Local authorities, transport operators
Local Initiatives				
	To reduce peak commuting travel by car	High	1	Local authorities in collaboration with business community
Safer Routes to School Initiatives- include School Travel Plans	To reduce peak travel by car	High	1	Local authorities in collaboration with schools/ universities
Travel Awareness education	To improve public awareness of transport modes			Local authorities/ Local Strategic Partnerships
Improved Cycle facilities	to provide improved cycle routes in towns	Medium-high	2	Local Authorities
Cycle routes to stations	To provide better access to stations, encourage the use of cycling	Medium-high	2	local authorities/ SUSTRANS
National Cycle network links	to encourage the use of cycling	Medium-high	3	local authorities/ SUSTRANS
Local town initiatives	To provide amenity and local accessibility improvements	Medium-high	6	Local authorities
Intelligent Transport Systems	To provide better information to users on the performance of the transport system	High	10	Local authorities
Bus				
Develop quality partnerships	To promote the use of bus to encourage increased mode share	High		Local authorities/ bus companies
A326/A35/A33 Corridor	To promote the use of bus, improve bus reliability	High	0.75	Local authorities/ bus companies
A27 Corridor	To promote the use of bus, improve bus reliability	High		HCC/ Bus companies
Portsmouth- Waterlooville- Horndean corridor	To promote the use of bus, improve bus reliability	High	12	HCC/ PCC/Bus companies
Review of services with LRT operation	to provide integration with LRT services	Medium		Local authorities/ bus companies/Tram operator
Other Corridors	To promote the use of bus, improve bus reliability	High	3	
Rail	,			
Improve station facilities (information, fabric, security, facilities)	To promote the use of rail	High		Local authorities/ TOCS/SRA
Chandlers Ford station	To promote the use of rail, provide Chandlers Ford- Southampton services	High	3	Local authorities/ TOCS/SRA
Fareham station	need to provide additional platform and other interchange facilities to enhance integration	Medium		Local authorities/ bus companies/Tram operator/TOCS/SRA
Havant station	need to provide additional platform and other interchange facilities to enhance integration	Medium		Local authorities/ bus companies/Tram operator/TOCS/SRA
Southampton, Portsmouth Stations	improve interchange between modes	Medium	4	Local authorities/ bus companies/Tram operator/TOCS/SRA

Scheme	Purpose	Priority	Cost (m)	Delivery Agent
.Eastleigh MDA station	required to assist mode share from major development area	Medium		Local authorities/ SRA/ TOCS/ developers
Eastleigh Chord	to provide better east-west rail services and link to Southampton Airport from east	Medium/Long term to deliver LRT extension to Southampton	40	SRA/
Fareham- Botley dualling	to provide better east-west rail services and link to Southampton Airport from east	Medium/Long term to deliver LRT extension to Southampton	30	SRA/
Rail services to Hythe	to improve access to Hythe area	Long term	10	SRA/Local authorities
New station at Totton, Marchwood	To improve access			SRA/local authorities
Chandlers Ford- Romsey	To enhance rail capacity	High	20	SRA/Local authorities
Light Rail				
Portsmouth-Gosport-Fareham	required to encourage modal transfer, reduce social exclusion and improve accessibility to Gosport	High	192	Local authorities/SRA/Tram operator
Extension Fareham- Southampton	required to encourage modal transfer, reduce social exclusion and improve accessibility in area	Medium/Long term	600	Local authorities/SRA/Tram operator
Portsmouth Monorail	to improve local accessibility within Portsmouth			
Airport				
Improvements to M27 Junction 5	to reduce delays at access/egress point to the airport		5	НСС/НА/ВАА
Improve access route into	to provide better links between M27 and the	Medium-high	10	HCC/HA/BAA
airport Southampton Airport	airport terminal provide better interchange between modes and	High	30	HCC/HA/BAA
Parkway- Interchange Hub	access for all users	Tilgii	30	IICC/IIA/BAA
Freight	11. 6 66:1.	3.5 1.		I 1 1 (CDA
Intermodal freight terminal at Portsmouth	to encourage modal transfer of freight	Medium	4	Local authorities/SRA
Freight Quality Partnerships				
Passenger and freight infrastructure & signalling improvements from	To improve access to Southampton Harbour	Long term		SRA
Southampton to North of England				
Highways				
Widening Junction 3 -4 - M27	Improve operating conditions on M27, improve	High	30	НА
Climbing lane M27 J11-12	access to Southampton port, improve safety Improve operating conditions on M27, improve	High	19	НА
Upgrade A27 (between A3(M), M27)	access from ports, improve safety improve operation and safety	Medium	3	НА
M271 HOV & freight lane	improve access to Southampton port	Medium	15	HA
Variable message signs, variable speed limits, CCTV monitoring system;	improve operation of M27	High		НА
monitoring system,			[l

Scheme	Purpose	Priority	Cost (m)	Delivery Agent
Junction improvements, junctions 7,8, 9, 11, 12	improve operation of junctions	Medium	8	HA
Junction improvement junction 2	improve operation of junction, safety	Long term	2	НА
Strategic Park and ride				
Sites outside Portsmouth and Southampton	provide links to LRT services into central areas	Long term	15	Local authorities
Demand management				
Parking charge	to assist in encouragement of model transfer from car	Medium term		
Cordon Charging	to assist in encouragement of model transfer from car	Long term	Self financing	
Workplace Parking Levy	to assist in encouragement of model transfer from car	Long term	Self financing	
Levy on out of town parking	to assist in encouragement of model transfer from car	Long term	Self financing	
	Total			

5.5.24 In total, the strategy has over £1 billion of investment in the future, with the largest elements being in relation to the delivery of SHRT strategy.

5.6 The Key Elements

5.6.1 The following elements are crucial items which are high on the list of priorities:

- Developing the management framework- will need a joint transport board with representatives from each of the local authorities, operators and other key players to oversee the development and implementation of the strategy.
- "Soft measures" needed to highlight potential alternatives to the car through education, and provide targeted measures at influencing commuter and school journeys.
- Further introduction of intelligent transport systems to advise users on the network performance;
- Bus partnerships- to assist in the promotion and delivery of bus services
- Key bus priority corridors- particularly Portsmouth- Waterlooville-Horndean (as part of SHRT)
- Access improvements to Southampton Airport- to cater for increased travel demands. Improvements focus on reducing delays at junction 5 which will assist bus operations as well as private vehicle access, and

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- improvements to Southampton Airport Parkway station to enhance accessibility for all users.
- Operation of the M27- through introduction of variable message signs, safety improvements at the junctions, and climbing lanes on the motorway itself
- Delivery of the first stage of Portsmouth-Fareham SHRT element and associated review of service provision.

5.7 **Dibden Bay**

5.7.1

Dibden Bay is a major development associated with the expansion of the port of Southampton. The aim is to provide additional container berths on the western side of the River Test. A public inquiry is currently being held to debate the issues arising from the development. The Inspectors Report will determine whether the development should proceed.

5.7.2 The development has considerable implications for the local area. The development has the potential to generate large numbers of commuting trips and freight movements by road and rail. If the development were to proceed, additional elements may need to be considered in the strategy. The focus of these should be to provide access to the port from the M3, Basingstoke rail corridor, as well as local initiatives. These include:

- Upgrade of the A326;
- Junction improvements at Junction 2;
- Widening of the M27 between junctions 2 and 3;
- Gauge enhancements;
- Green travel plans; and
- Local cycle and bus networks.

6 Implications of Charging Policies

6 Implications of Charging Policies

6.1 Introduction

6.1.1

6.2.1

The strategy for the South Coast recommends that there should be a balance in the policy elements in an attempt to achieve equilibrium between demand for travel by car and by other modes. Therefore an important element of the strategy will be measures that seek to control the overall level of use of the car, particularly where there are, or will be, good alternatives available. Such measures suggested in the strategy are

- a levy on all private workplace parking spaces in core urban areas;
- a charge on all parking spaces in "out of town" retail parks along the South Coast; and
- car based cordon charges for entry into the major conurbations of Southampton, Portsmouth and Brighton & Hove so as to encourage use of the new Park and Ride facilities.
- 6.1.2 This section of the South Hampshire strategy development plan report will discuss the background to these charging options, potential benefits for the South Hampshire area, and issues related to implementation of such schemes.
- 6.1.3 This chapter provides information on methods of charging which may be of use in other areas of the south coast.

6.2 Background

The Transport Act 2000 allows local traffic authorities to implement charging schemes in their area for the purpose of reducing local congestion. The act also allows for the net proceeds (i.e. the revenue less any set up and running costs) of any charging scheme to be hypothecated for 10 years from its implementation in order to be spent on transport in the area. The net proceeds must be spent in support of the authority's local transport plan, or where more than one authority is promoting the scheme the money must be spent in support of a coherent transport strategy backed by all these local authorities.

6.2.2 The hypothecation of proceeds is currently only guaranteed for schemes brought in within 10 years of the Transport Act 2000 (i.e. before 2010). When a scheme is

submitted to the Secretary of State for approval it must be accompanied by a spending plan detailing how the proceeds are to be spent over the following 10 years.

6.2.3 Congestion charging is one of the charging options included in the Transport
Act 2000. The focus of the legislation is very much on providing congestion relief
at a local level, in a way that is coherent and supported by the relevant local
authorities. A scheme can only include trunk roads if these are required to
complement the aims of the local charging scheme.

Within this legislation there is flexibility so that authorities may tailor a charging scheme to address the particular problems in their area. Some of the details of a congestion charging scheme that can be designed for an area are given below.

- The basis of the scheme e.g. distance based or cordon based
- The level of the charge

6.2.4

6.2.6

- The method used to collect the charge e.g. electronic or paper based
- The time of day charges are operational
- Exemptions and discounts

6.2.5 Two examples of congestion charging schemes are those in Singapore and Trondheim in Norway, and it is interesting to look at the effect these schemes have had on traffic and congestion.

The Singapore scheme includes both a charge to enter the city and a distance based charge, therefore the greater a driver's contribution to congestion the higher the charge. The Trondheim scheme is simply a cordon round the city that drivers are charged to cross. In both cases when the schemes were introduced it was observed that congestion decreased. There was a 10% reduction in peak rush hour traffic entering Trondheim and up to 15% reduction in the morning peak traffic entering Singapore along one of its main routes. [Reference "Driving Down Congestion in Other Countries" – Transportation Professional (June 2002)].

6.2.7 **Workplace parking levy** is the second charging option introduced in the Transport Act 2000. This enables local authorities to implement a licensing scheme as a mechanism for collecting a levy on private workplace parking spaces. Under the legislation the occupier of a premises will be required to apply for a licence to park a stated number of vehicles at or in the vicinity of the workplace for those

attending their place of work. This can not be used as a control on the number of car parking spaces by the local authority.

The legislation again allows for flexibility for the local authority when designing a scheme. This flexibility includes for example the time and duration of charge, the level of charge and different charges for different vehicle types.

Unlike congestion charging schemes we do not have any examples to draw on. However, as with the road user charging, the workplace parking levy is designed to be used as a demand management tool to reduce congestion and allow motorists to more clearly appreciate the cost of car based commuting travel.

6.2.10 "Out of town" retail centre parking charges are not covered in the Transport Act 2000. The legislation specifically states that the workplace parking levy does not allow for customer leisure or retail parking. Therefore if such a policy is to be pursued it may require further legislation, or co-operation from the owners of such centres.

6.3 South Hampshire Issues

Management Issues

6.3.1 Hampshire County Council, Portsmouth City Council and Southampton City Council have been working together to produce a transport vision for the South Hampshire area. As part of this work they have recently published a report on transport in the area - "Transport: Stage 1 - Evaluation". Working together in this way and identifying common aims and objectives is a vital step in tackling the problems and issues that have been identified in the area.

Intrinsic to the overall aims of the strategy in this sub-region is the concept of 'Integrated Management' supported by a flexible investment programme. This means that the management of the implementation, operation and maintenance of road, rail, sea and air transport is undertaken in a more co-ordinated way with common strategic aims and objectives. This concept is outlined in more detail in chapter 7 but requires a strategic partnership between public and private sectors. However, it is important that policies of road user charging should be viewed as part of the overall strategy development.

There is substantial experience of information technology solutions in the area, with Southampton serving as a location for the ROMANSE (ROad MANagement System for Europe) project. This project uses information technology to make the

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best of the existing road and public transport network, and to provide information to travellers to enable them to make informed decisions about their travel, for example which mode to use to make a certain trip and which route to use. This would also be a useful tool to use when implementing a road user charging or workplace parking levy scheme, so that travellers can be made aware of the implications of their modal choice, and they can also identify alternatives to using the car for a given trip.

Transport Issues

6.3.4 Chapter 2 outlined the transport issues in the South Hampshire area The area has a high level of car ownership which has produced congestion in the major urban areas. This report has shown that traffic levels will continue to grow generating a further increase in congestion.

> The SoCoMMS strategy suggests public transport improvements, and limited road widening, and junction improvements - these are discussed in section 5.5.15 of this report. To balance these increases in supply the strategy also proposes some charging strategies. These should go some way to addressing the congestion issues in the area, by providing additional incentive to use the improved public transport.

Road user charging options for South Hampshire (as part of area wide charging strategy)

Geographical Coverage

There are a number of options when considering the geographical coverage of a charging scheme for South Hampshire. Two possible alternatives could be pursed, one based on the cities of Southampton and Portsmouth as these have the best existing public transport infrastructure in the area, alternatively, a charging system for the whole of the sub-region could be considered.

Even within the cities of Southampton and Portsmouth, there are a number of options as to the area that should be covered by the charge. The options range from charging only in the very centre of the city to charging for the whole urban area, which in the case of Portsmouth would include charging up to the A27 (or possibly beyond) and therefore would include the M275. In the case of Southampton the urban area is essentially bounded by the M27 to the north and east, and the M271 to the west. It should also be noted that charging in either of these cities would have an affect on the residents of the Isle of Wight, and is an issue that would need further consideration

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6.4.2

Using a cordon or central area charging approach it may be necessary to undertake some traffic engineering on a number of minor roads to make them no through across the cordon so that only the main routes require the full roadside infrastructure. In addition there will be traffic engineering required at the sites for charging.

6.4.4

The area can be extended in the future to include more of the sub-region. This approach has the advantage of being able to learn from the city centre charging scheme before implementing the policy on a wider scale. Currently there is no congestion charging scheme in the UK, and therefore it is uncertain what the impacts may be – modelling work undertaken so far can only provide an initial estimate. London will be implementing a scheme in 2003, which will provide the first UK experience, and a scheme local to the area will provide the local level impacts. In addition to this, implementing a charging scheme requires a lot of organisation and co-ordination between authorities, and it may be beneficial to learn from the experience before implementing schemes in the wider area.

Type of Scheme

6.4.5

The main options are between an area based, or cordon scheme and a distance based scheme. A cordon scheme is the one that has been initially suggested by the SoCoMMS strategy. This is designed to discourage travellers from bringing their cars into certain areas – such as the city centres. The aim of this is to reduce congestion, and allow some road space to be released, which may be used for other purposes, such as public transport, cycle facilities or pedestrians areas. As stated above the ROCOL research suggests that implementing a cordon scheme around the city centre area can also reduce the traffic in the surrounding urban areas.

6.4.6

A distance based scheme has the advantage of connecting the charge directly with the amount of city centre driving undertaken, therefore having a direct relationship to the direct contribution to congestion. However with the currently available technology, a cordon based scheme would be easier to implement, and certainly easier to enforce. Introducing a cordon based scheme would not preclude adapting to a distance based scheme in the future.

Mechanism of payment

6.4.7

It is generally accepted that a paper scheme, although relatively easy to introduce, would not be as flexible as a scheme based on more technological solutions. Enforcement of a paper based scheme would have to be done by visual inspection and vehicles that were suspected of not having a valid licence would be stopped

and checked (under current legislation this would have to be done by the police) and a penalty notice issued if necessary. Although paper based licence schemes do not have the high set up costs of more technological solutions they would be relatively expensive to run – they require more staff, place a greater burden on the enforcement administration and penalty notice system, and would require police involvement. Therefore a paper based scheme would not be a sensible option for South Hampshire given the relative merits of electronic schemes (discussed in the following paragraphs).

Looking at the technological solutions, there are a number of options, the main ones of which are given below.

- Automatic number plate recognition (ANPR) where the number plate is read by cameras when the vehicle crosses the cordon and compared with a list of vehicles that have paid the charge. This is the solution being implemented in London.
- Dedicated short range communications (DSRC) technology where a transponder in the vehicle communicates with a beacon at the road side, and this results in a charge, or a record being made of any vehicle without a valid transponder.
- Mobile positioning systems (MPS) technology (e.g. GPS) where a transponder in the vehicle communicates with a satellite as it crosses a virtual cordon, and this results in a charge.

Automatic number plate recognition is the system that is being implemented in London. This is considered an intermediate technology solution, and ROCOL identified that such a system could be readily migrated to a fully electronic solution at some point in the future. The advantage of implementing such a solution in South Hampshire is that it will have been proven in London, and it does not require equipment to be placed within the user's vehicle.

Dedicated short range communication (DSRC) is a fully electronic solution. The main advantage it has over a number plate recognition system is that the enforcement system only needs to record details of offenders (those without a transponder) as the transactions for non-offenders will be processed as they pass the beacon at the roadside. The number plate recognition system has to collect the details of all vehicles passing the cordon and then determine whether they are an offender or not. Also this system can charge users each time they enter the city

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centre, which has the potential to relate a scheme more closely to how much congestion each vehicle is contributing.

6.4.11

The Department for Transport is currently undertaking a research project, using DSRC technology, which is designed to produce specifications for an end to end system (i.e. from the transponder in the vehicle to the billing and enforcement). These specifications would allow for an interoperable approach to charging across the country, i.e. a vehicle owner could drive through different charging schemes in Birmingham and Southampton (for example) and the transponder in their car would work for both schemes regardless of the manufacturer of the roadside beacons. Interoperability, in this sense, is considered essential, by the DfT, for successful implementation of charging schemes across the UK, rather than having different schemes running on different bases throughout the country which would be confusing for users.

6.4.12

The advantage mobile positioning systems (MPS) would have over other systems is that they do not require any roadside infrastructure in order to charge vehicles. This could be useful in urban areas where there may be environmental or heritage sensitivities, and also the risk of vandalism. The main draw back, however, is that it would require camera enforcement (there is no other solution to enforcement currently available), which requires roadside infrastructure – thereby negating this advantage. The other major advantage of MPS is their adaptability they can be more flexible than DSRC systems. You can change the points at which you charge without having to move any roadside infrastructure (except possibly enforcement equipment).

6.4.13

Generally fully electronic systems have a number of advantages, such as allowing greater flexibility in designing the charging scheme, a greater number of ways of making payment, and providing added services. They can also be used to feed into integrated transport information services.

6.4.14

The DfT guidance will be based on DSRC technology. The reasons for this are mainly because it is a fully electronic system, and well proven technology. The equipment is also currently significantly cheaper than MPS, although this would be expected to change in time. It would be expected that this guidance would be available in time to feed into the implementation strategy for congestion charging (assuming a medium term charging strategy for South Hampshire – timescales are discussed in section 6.6). Therefore it would be recommended that South Hampshire consider road user charging schemes based on DSRC technology,

although it may be worth taking note of the option of using MPS, particularly if this technology has developed nearer the time of implementing a charging scheme.

Level of charge

6.4.15 The economic efficiency of a charging scheme is, in theory, greatest when the level of charge directly reflects the cost imposed by an additional vehicle on the rest of the traffic. However, in practice this is difficult, if not impossible, to establish. An additional issue to consider is that a low charge will have less effect on traffic, but the scheme is likely to incur similar administrative and other costs as a scheme with a higher charge.

The ROCOL report suggested implementing a charge of £5 for cars and £15 for goods vehicles in London. The Mayor has taken the recommendation of £5, and has applied this charge to all vehicles.

The modelling undertaken in the SoCoMMS strategy set the charge for crossing the cordon into Portsmouth and Southampton city centres at $\pounds 2$. In the charging scenario it was assumed that there would be 3 park and ride sites for Southampton and 1 for Portsmouth. Under this level of charge and with these park and ride sites in place the model suggested that the car traffic in the city centres of Portsmouth and Southampton may reduce by 10% to 20%. (This also assumes that 50% of cars that use the park and ride sites are cars that would have entered the city centre had they not used this option).

Also the potential revenue was estimated, assuming that 80% of the traffic going into the city centres are cars, and 80% of these pay the charge (with no discounts or exemptions). For Portsmouth it was estimated the revenue might be of the order of £15 million a year, and for Southampton of the order of £20 million a year.

The decision on the level of charge for the South Hampshire area should be made nearer the time of the implementation of the scheme. It will be useful to look at the effect the level of charge for the London scheme, and any other schemes in existence at the time, have had when deciding the level of charge for the scheme.

The SoCoMMS strategy suggests a concerted area wide pricing policy for charging schemes, therefore it may be a good idea to consult with other local authorities in the area when deciding the level of charge. It may also be sensible to consider different charges for the different cities and towns in the area depending on their

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hierarchy within the area. Portsmouth and Southampton are both major cities on the south coast and therefore, under this consideration, these cities should have a higher level of charge than the towns such as Fareham.

6.4.21

The aim of the scheme is to reduce congestion, and congestion in Portsmouth and Southampton is worst in the peak periods. Therefore a road user charging scheme should, as a minimum, charge for these periods. The report produced by Hampshire County Council, Southampton City Council and Portsmouth City Council suggests, however, that there is some evidence of a "peak spreading". The ROCOL report also suggests that congestion in London is no longer restricted to the traditional peak periods. Therefore a charging scheme should extend beyond these traditional time periods to prevent the congestion from the peaks spreading to the interpeak times.

6.4.22

As with the level of charge there would also be the example of London to review, to see whether charging from 7am to 7pm has an effect on congestion. Other schemes in other areas may also provide a guide when deciding this issue. As a starting point it would be recommended to charge both the peaks and extend these times into the interpeak period therefore it would be suggested that charging from 7am to 7pm would be a minimum time period to charge.

6.4.23

There is also the option of varying the charge by time of day and conditions on the roads. Varying the charge by time of day is relatively simple and easily understood by users. Varying the charge depending on the level of congestion is a more complicated issue, both from an implementation point of view, and the perspective of the users.

6.4.24

It is possible to introduce a scheme with "shoulders" where the charge is reduced outside of the main charge periods. The aim of this would be to dilute the effect of drivers rushing to enter the charge zone before the charge becomes effective, or queuing up outside the charge zone at the end of the day waiting for the charge to end.

6.4.25

It would not be suggested to operate a scheme varying charge by level of congestion at this stage. The DSRC technology and MPS are capable of producing a scheme on this basis, however it may not be readily understandable to users. When introducing a charging scheme where roads have historically been free at the point of use, it is important to introduce a scheme that is transparent to users. Therefore as an initial scheme it would be sensible to introduce a clear and easy

scheme which has clear boundaries of times that are charged and clear levels of charge.

Enforcement

6.4.26

ROCOL initially suggested that a level of enforcement that produced a violation detection rate of 20% would be acceptable – i.e. if someone entered the charge area 5 days a week without paying then they would expect to be caught by the end of that week. Charging systems based on fully electronic technology, however, have a greater potential for detection of violation and therefore the violation detection rate aimed for should be higher.

6.4.27

With a DSRC based scheme the enforcement would be camera based – an image of a vehicle without a transponder would be taken as the vehicle passed the charge site. If the scheme is simply a cordon charge around the city centre then it is only the sites where the charge is made that need to be enforced.

6.4.28

One option for enforcement is to have 100% coverage. In that case every charge site would have enforcement cameras, and violators would have no chance of getting away with not paying (in theory). This can be an expensive option. An alternative is to have permanent enforcement on the major routes and mobile enforcement cameras (as suggested in ROCOL) which can cover the other routes into the city centre.

6.4.29

Under the Transport Act 2000 evading a charge is a civil offence (much in the same way enforcement of parking charge evasion has been decriminalised). There needs to be a back office system designed to collect the charges and pursue enforcement when people attempt to evade the charge. This will require cooperation from the DVLA in order to trace violators from the licence plate.

6.4.30

The level of the fine needs to be sufficient to deter people from trying to evade paying the charge, but without provoking a large number of unjustified appeals. The ROCOL report suggested relating the level of fine for the London scheme to the penalty for a parking violation in central London. In the same way Southampton and Portsmouth should relate the level of fine to similar penalties for parking violations in the city centre. As with the London scheme it may be sensible to consider a reduced penalty (approximately 50% of the full fine) for prompt payment.

Cost

- 6.4.31 The cost of a scheme can be split into two areas setting up costs, and running costs.
- Using ROCOL as a guide, the table below sets out an estimate of the setting up costs of the schemes suggested for both Portsmouth and Southampton city centres based on a DSRC scheme. This calculation assumes 8 sites in each Southampton and Portsmouth (of which 10 are A roads and the remainder are more minor routes), along with traffic engineering required at 10 sites in each city. It also assumes that there is enforcement at every charge site, therefore the costs could be reduced by reducing the level of enforcement, or by utilising mobile enforcement cameras.
- 6.4.33 For installing transponders in users' vehicles it was assumed that 80% of all households in the South Hampshire area (as estimated at 2016) would have their vehicles equipped and that a further 20% of households (as an approximation of users from surrounding areas) would also have their vehicles equipped. The figure of 1.27 vehicles per household (from the Transport Stage 1 report produced by South Hampshire, Portsmouth and Southampton) was used to convert from households to vehicles.
- A cost of £10 per DSRC transponder was estimated, although this figure may fall with time, and purchase of large quantities for a scheme. Currently MPS transponders are much more expensive (to the order of 20 or more times more expensive). Also it was assumed that DSRC transponders would be installed by the user, whereas MPS tags need to be linked into the vehicle systems and would therefore have manpower cost implications to add to the cost of the tag.

Element	Implementation Costs (£)	Running Costs (£)
Installing transponders in users' vehicles	8,000,000	500,000
Roadside beacons	1,100,000	225,000
Traffic engineering	200,000	
Enforcement cameras	550,000	50,000
Communications	50,000	3,600,000
Administrative costs	250,000	15,400,000
Total	10,150,000	19,050,000

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6.5 Parking charge options for South Hampshire (as part of area wide parking strategy)

Workplace parking levy

The main issue for workplace parking levy is the geographical area that it should be introduced for. The SoCoMMS strategy suggests a levy on all private workplace parking spaces in core urban areas. Although it would not be advisable to introduce both a cordon charging scheme and a workplace parking levy scheme in the same geographical area as this would mean charging those cars which enter the city centre, and park in a workplace space, twice for their trip into the city centre.

The area might include the areas of Southampton and Portsmouth not covered by the congestion charge, and may also include Winchester, Fareham. Eastleigh and Havant. As with congestion charging it may be sensible to primarily observe the effects that this policy tool has on other areas, and possibly the major cities of Southampton and Portsmouth, which are better served by public transport. Assuming that this monitoring of the effects in other areas shows that the charge is having the desired effect and contributes to reducing congestion, then the parking levy can be introduced for the smaller towns at a later stage.

The major risk with this approach is that some businesses, which might have located in Southampton or Portsmouth, may decide to locate in an area without the parking charges. This may form part of an argument for introducing the charges to all of the major towns and cities of the South Hampshire area at the same time – with a charge reflecting the town's place in the hierarchy. If this approach were taken, it would be better if it were taken as part of an integrated south coast initiative – as stated in the SoCoMMS strategy.

This report would recommend that the introduction of the workplace parking levy on all the towns and cities in the South Hampshire area (mentioned above) should occur at the same time. This is for the reasons mentioned above – to retain equity between the employment centres of the area, and also because a workplace parking levy scheme does not have the same sensitivities as road user charging scheme. This is primarily because the idea of paying for parking is not such a new idea for the public. Also, compared to a road user charging scheme, a workplace parking

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scheme will be relatively easy to organise and introduce, and therefore there is less of a need for the authorities to take the incremental approach to implementation.

Once the towns and cities have been identified, the geographical area for each of workplace parking levy scheme needs to be identified. The level of charge used in the SoCoMMS model was £5 per parking space for Portsmouth and Southampton, and £3 for Havant, Fareham and Winchester. These would equate to £1250 or £750 per year.

6.5.6

ROCOL suggests that there is a hierarchy of decisions made when implementing a workplace parking charging scheme.

- The first decision is for the employer how many spaces they will register. Evidence from ROCOL suggested that employers would register approximately 70% to 80% of spaces (and therefore remove the remaining spaces).
- The second decision is also for the employer will they pay the charge or pass it on to their employees. ROCOL estimated that 70% of employers would pay the charge (and therefore the remaining 30% would pass the charge on to the employees).
- The third decision is for the employee would they pay the charge and continue to use the space at work, or would they change to a different mode of transport or make alternative parking arrangements. Again ROCOL suggested that 30% to 40% of employees would pay the charge.
- 6.5.7 On the assumption that there are currently approximately 50,000 to 60,000 private non residential parking spaces in a town centre, and the estimates in ROCOL are fairly accurate, then the estimated revenue from a workplace parking levy scheme could be between £20 million and £30 million.
- 6.5.8 The enforcement of a workplace parking levy scheme would be much simpler than for a road user charging scheme. The enforcement would consist primarily of comparing the number of cars parked at a place of work with the number of spaces registered on that company's licence.
- 6.5.9 It was estimated in the ROCOL report that setting up a workplace parking levy scheme for the extended central area of London (containing between 38,000 and 57,000 parking spaces that would need to be registered) would cost approximately £5 million. It would then cost an estimated £5 million per year in running costs,

including enforcement. Therefore it can be seen that a workplace parking levy scheme is much cheaper than a road user charging scheme to implement, although the effect it was estimated to have on congestion was also lower.

6.5.10

Business communities have expressed concern in relation to the extra costs that they will incur through charges. A workplace parking levy is a demand management tool that will be used to bring about a reduction in congestion. Many businesses have much to gain through shorter journey times and increased reliability. Businesses also have the cast iron guarantee from the Government, written into the new transport bill that all money raised in the first 10 years will be 100% ring fenced for spending on improving local transport.

Out of town

6.5.11

As discussed previously in this report, this is an option that is not allowed for under current legislation. Therefore a more detailed study of the options for working towards this policy would be recommended.

6.6

Implementation Issues

Public acceptability

6.6.1

A lot of the issues that relate to public acceptability are covered in different sections. For example these include use of revenue and road space, and dissemination of information discussed in the subsequent sections. Also a lot of the decisions to be made about the geographical area and level of charge are closely interrelated to the issue of public acceptability.

6.6.2

It is advisable to involve the public in the early stages of the process so that they sign up to a comprehensive transport strategy of which charging is a part. By obtaining acceptance of the need to change attitudes and behaviour, charging is more likely to be easier to accept.

6.6.3

An issue that DfT believe is a major contributor to public acceptability of congestion charging schemes is the interoperability of schemes in different areas of the country. This makes it easier for users to use all different schemes without having to follow different instructions for each one. Following this theory it would certainly be a requirement for all schemes within South Hampshire to be interoperable. It would also be advisable that they follow the DfT guidelines so that they are also compatible with other schemes in the UK.

6.6.4

There is also the issue of transparency of the scheme. If users cannot understand how a scheme works and how much they will be charged for a journey then they will not be happy to accept it. This issue should be considered when deciding the mechanism and level of charge in different circumstances. It may be possible over time to introduce more sophisticated schemes where, for example, the level of charge depends on the level of congestion, but for the initial scheme it would be advisable to have a charging structure that is simple and readily understandable.

6.6.5

It might also be advisable to start public consultation early so that the public get used to the idea of charging, and have time to absorb the issues such as the potential impacts and the potential improvements in public transport.

Information

6.6.6

With a charging scheme there will be the necessity to provide clear indication to the public of the charge area prior to entry into the area. At this point there also needs to be sufficient provision of information for the driver to decide not to enter the charge zone but to continue along an alternative route. It will be difficult initially to convey this information to the driver in a way that does not distract too much attention away from the road, thereby having safety implications. This will be particularly difficult in the first few years of a scheme, where drivers may be unfamiliar with the concept of road user charging. This is an area that would need serious consideration when introducing a road user charging scheme.

6.6.7

For a workplace parking levy scheme it will be the employer's responsibility to ensure that their employees are aware of the implications of driving to work. It will also be the employer's responsibility to register the spaces and ensure compliance with the licence arrangements. Therefore for a workplace parking levy scheme there is less onus on the public.

6.6.8

In addition to informing the public about the schemes, it would also be sensible to provide information on alternatives to using the car to enter the city centre or to drive to work. Evidence shows that in many cases drivers are not aware of the public transport alternatives that exist for their journey, even if they have been provided with that information in the form of leaflets through their door. Therefore it is important to clearly advertise the alternatives, and Southampton's experience with ROMANSE may prove valuable in this aspect.

6.6.9

Another aspect of information provision is identifying clearly to the public what the effects of the schemes are, and how the money is being spent. This is discussed in subsequent sections.

Timescale

6.6.10

The recommendation is to introduce these charging schemes in the medium term - i.e. 5 to 10 year timescale. The discussion above of the congestion problems currently facing the area, and the predictions for the increased use of the car over the next 10 years imply that it is important to be looking at restraining measures soon. However, it is not possible to introduce them immediately for a number of reasons. The organisation required, particularly with a road user charging scheme, means that there is a lead in time of at least 2/3 years to allow for sufficient planning. In this respect it may be possible to introduce the workplace parking levy scheme in advance of the road user charging scheme.

6.6.11

Another reason for the suggested medium term timescale is that it allows for public consultation. There is a suggestion that by opening up the subject to public debate very early on in the planning process, public opinion becomes less opposed to the charging policies as they become more aware of the problems they are trying to address, and the potential benefits of such schemes.

6.6.12

Perhaps the main reason for having a medium term horizon for introducing charging schemes is that this allows for the implementation of improved public transport. It may take some time to plan and fund the public transport schemes that would be required prior to introducing the charging schemes, such as extended light rail systems linking Southampton, Fareham and Portsmouth

6.6.13

As mentioned in the introduction to this section, charging schemes that are introduced within 10 years of the Transport Act 2000 have a guarantee of hypothecation of the proceeds from the scheme for local transport schemes. Assuming that the above conditions are met – the planning is been undertaken and the public transport improvements have been put in place – and assuming that it is agreed that charging policies will produce the desired effect on congestion, then it would be advisable to introduce the charging schemes prior to 2010. However this should not be taken as a definitive deadline, since implementing a scheme should not be hurried if the issues surrounding its introduction have not been fully addressed.

Exemptions and discounts

6.6.14 This is essentially a political decision, which needs to be taken in consultation with the relevant local authorities. The potential for exemptions and discounts is quite wide, including orange badge holders, residents and essential workers (such as home helps etc.).

There are technological issues that need to be considered in identifying those individuals that genuinely have a discount. For example would the discount for orange badge holders be related to the vehicle or the person. If it's related to the person, how would you identify that the person is in the vehicle that is claiming the discount / exemption? This is an issue that is currently being considered by DfT.

In addition, a specific area for Portsmouth and Southampton to consider is whether to give exemptions to ferry customers. The ferry ticket could be assumed to implicitly include the charge, and arrangements made for a vehicle not to be charged when crossing the cordon if they are doing so to access the ferry ports.

Use of revenue and space

This is another issue that relates to public acceptability. If the public can see how the revenue and the road space freed from congestion have been used they are more likely to be positive about the charging schemes. This issue also relates to the monitoring in the subsequent paragraph.

The road space could be used for cyclists and pedestrians, or as bus lanes to improve the public transport reliability for trips into the city centre. The use of revenue is prescribed by DfT, therefore it is important that the revenue is clearly identified and allocated to specific schemes. This is the case not just for accounting purposes but it also relates to public acceptability. It is important to be able to identify to the public where their charges have gone. The London experience suggests that the public find charging schemes more acceptable if it is clear that the monies are spent on transport improvements as part of an overall integrated strategy.

Within the South Hampshire area there is over £1 bn of investment in the transport networks. The revenues obtained from charging mechanisms should be re-invested within the transport strategy to fund measures such as the Eastleigh Chord, SHRT extensions and other rail enhancements.

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The Role of Charging in the Long Term

flows on the M27 are reduced b y 5%.

In the medium and long term charging is viewed by SoCoMMS as a means of providing balance within the strategy. The role of demand management is to encourage use of the alternative modes within the strategy. The traffic assessments within the strategic model indicate that the charging mechanisms could reduce overall traffic levels in 2016 in the South Hampshire area by 4% compared to the do-minimum. This is based on the cordon charges to enter Southampton and Portsmouth as well as wider private non residential controls. Within these areas the reductions are 7% and 9% respectively across the full urban areas. Within the central areas of these towns the reduction would be greater. In addition, traffic

However, the key impact of charging is in the longer term, such as to 2030, the role of charging mechanisms is to cap traffic growth so as to minimise the need for additional highway improvements. The increased use of charging will seek to regulate traffic flows in the future. In particular, the use of wider charging mechanisms will seek to restrict traffic flows at/ below 2016 levels.

Monitoring

Monitoring will be important to identify the impacts of these charging schemes. This will have two uses – the first of these is to identify to the public the use of revenue and space as identified above. On going monitoring will also inform the local authorities of the impacts of the design of their schemes so that they can learn from the experience, and decide any amendments or developments to make to the schemes.

6.7 Summary

This chapter has sought to outline some of the key issues in developing a charging strategy for the South Hampshire area. The chapter has reviewed issues in relation to the potential coverage, the technology that is available, enforcement, public acceptability and monitoring. The SoCoMMS strategy has identified the need for demand management in the corridor to cap levels of future traffic growth. It is recommended that more detailed investigations of the role of charging should be undertaken.

6.6.21

6.6.22

6.7.1

References

"Driving Down Congestion in Other Countries" - Transportation Professional (June 2002)

"Transport Act 2000" – HMSO (2000)

"Transport Act 2000 c.38 Explanatory Notes" – HMSO (2000)

"Transport: Stage 1 – Evaluation" – South Hampshire Study (February 2002)

ROCOL – The Consultants' Report Volume 4: Effectiveness Studies (1999)

7 Institutional Arrangements

7 Institutional Arrangements

7.1 Introduction

7.1.1 Chapter 5 outlined a transport strategy for South Hampshire. One of the key issues is the delivery of the strategy elements in a co-ordinated manner. The local authorities within the area are pursuing a policy of the integrated management of transport. This is seen as a key element of the transport strategy and has implications for the institutional arrangements for the area. This issue is discussed in this chapter.

The Provisions of the Transport White Paper and the 10 Year Plan

The Multi Modal Studies (MMSs), including SoCoMMS, are key actions in putting the Government's integrated approach to transport and important instruments in implementing its Ten Year Plan². In the Integrated Transport White Paper the principal means of setting the framework for regional transport strategies, based on the results of the Multi Modal Studies and other considerations, is to be through Regional Planning Guidance (RPG)³ and it is suggested that this should include:

- regional priorities for transport investment and management to support the regional strategy, including the role of trunk and local roads;
- traffic management issues which require consideration either regionally or sub-regionally;
- guidance for development plans on the approach to be taken to standards for off-street car parking provision, relating these to accessible public transport;
- guidance to local authorities on the strategic context for introducing measures such as road user charging and parking levies;
- public transport accessibility criteria for regionally or sub-regionally significant levels or types of development, to be set out in development plan policies to guide the location of development and
- a strategic steer on the role of airports and ports in the region in the light of national policy.

7.2

7.2.1

 $^{^{2}}$ Transport 2010 The 10 Year Plan paragraphs 4.1 - 4.3.

³ A New Deal For Transport: Better for Everyone – The Government's White Paper on the Future of Transport paragraphs, 4.51 to 4.57.

7.2.2 This is echoed in the 10YP⁴, which states:

- the 10YP provides the resources to implement the decisions arising from the MMSs;
- decisions will be taken through the Regional Transport Strategies/Regional Planning Guidance and
- the Government will co-ordinate decisions where appropriate for example on schemes of more than regional importance – in the context of national priorities.

7.3 Integrated Management

7.3.1 Intrinsic to the overall aims of the SoCoMMS strategy within the South Hampshire area is the need to ensure the 'Integrated Management' of transport supported by a flexible investment programme. This means that the management of the implementation, operation and maintenance of road, rail, air and sea transport is undertaken in a more co-ordinated way with common strategic aims and objectives. Investment priorities can then be assessed across the board rather than by mode or by organisation and there would be flexibility to share and exchange resources in order to deliver infrastructure and services where they are needed and when they are needed.

7.3.2 The vision of 'Integrated Management' requires the establishment of a new and innovative strategic partnership between the public and private sectors. Currently within the area, there are a wide range of agencies that will be involved in taking transport decisions in the South Hampshire area. These include:

- The Government (DfT and other Departments)
- The Government for the South East
- The Regional Assembly
- The Regional Development Agencies
- The Highways Agency
- The Strategic Rail Authority
- Network Rail

⁴ Transport 2010 The 10 Year Plan, paragraphs 4.7 and box on Regional Transport Strategies

- The Train Operating Companies
- The Coach and Bus Operators
- Local Authorities

7.4.2

7.4.3

 As well as a wide range of other actors in the public and private sector (e.g. BAA, the Port authorities)

7.4 A Partnership Approach to Integrated Management

A key concern highlighted through public consultation across the SoCoMMS corridor was in regard to delivery of the strategy and the integration between delivery agents. There are clearly a number of players involved in the delivery of the strategy and for effective delivery, a partnership between organisations needs to be established As outlined above, 'integrated management' seeks to overcome these concerns and provide a co-ordinated way forward.

The partnership would bring together organisations such as local and central government, the Strategic Rail Authority, Highways Agency, South East England Development Agency, South East England Regional Assembly, Government Office for the South East, public transport operators, the business community and others with the aim of delivering, managing and operating a state of the art transport network, initially for South Hampshire. Such an approach would share the burden of the transport problem and target investment and resources in a way that gives added value to the community. This arrangement would open up opportunities to tap into wider markets and reap the benefits of economies of scale in order to secure a quality transport system for South Hampshire. Such an approach could be rolled out to other parts of the SoCoMMS area (such as West Sussex, East Sussex and East Kent).

Within South Hampshire there is communication between Hampshire County Council and the unitary authorities for Portsmouth and Southampton. This occurs on a frequent and comprehensive basis. Such an approach should be widened out to include other agencies as suggested above.

7.4.4 For this partnership approach to work there needs to be:

- a clear policy and plans of action;
- adequate resources;
- sufficient powers for implementation;
- a strong sense of common purpose and
- close co-ordination between the individual implementation agencies.

If adopted in its complete form the SoCoMMS strategy will provide the first of these and the Government has pledged the necessary resources in its 10 Year Plan. In order for the respective transport agencies to plan for their implementation of the strategy however this general pledge should be developed into an indicative phased budget for main components of the strategy for the next ten year period. This could take the form of five-year tranches indicating how much is planned to be made available for each component in each period. Where expenditure is to be funded through borrowing or PPPs this should be taken into account along with any incomes from parking levy and congestion charging schemes .

7.4.6

GOSE working alongside the Regional Assembly, through the Regional Transport Strategy can provide an overall co-ordination of delivery. However, it is noted that at present SEERA do not have the powers or resources to ensure that the measures are carried out according to programmes.

7.4.7

The Highways Agency and the Strategic Rail Authority/ Railtrack will be responsible for implementing most of the road and rail infrastructure schemes in the area. Local Authorities will play a key role in the delivery of the local elements, particularly through the Local Transport Plan system. Local transport operators will be responsible for the provision of service enhancements. Each organisation has its own planning, programming and budgetting proposals into which the SoCoMMS strategy would have to be integrated.

7.4.8

The SoCoMMS strategy has sought to provide a balanced approach across all modes. In this regard, the need for co-operation between bodies across the area is paramount.

7.4.9

It is considered that existing institutional structures are sufficient to progress the development and delivery of individual elements of the strategy. The principal outstanding issue with regard to SoCoMMS is the coordination of related aspects of the strategy to ensure that integration exists across modes, geographical boundaries and timescales.

7.4.10

The Partnership should meet on a regular cycle to co-ordinate:

- Policy approach;
- Implementation, and
- Monitoring of resource expenditure and impact of measures.

The partnership would be responsible for speeding up the design process; overseeing and coordinating progress through the statutory procedures; and ensuring coordination of different projects and services within the strategy amongst different agencies and authorities. A degree of flexibility will be required in their scope and brief, given the diversity of schemes with which they would deal.

8 Summary

8 Summary

8.1 Conclusions

- 8.1.1 This strategy development plan has examined issues in relation to the South Hampshire area. The work follows on, and builds upon, studies undertaken as part of the M27ITS. The latter outlined short, medium and long term measures for road, rail and bus.
- 8.1.2 The South Hampshire area is one of high car ownership and considerable travel demands. The area suffers from congestion, which with limited transport interventions in the future, will worsen. The area has been identified by SEERA as a priority area for economic regeneration.
- 8.1.3 A transport strategy has been developed for the area. This includes a number of initiatives such as:
 - Overall management;
 - Local initiatives;
 - Bus measures;
 - Rail measures;
 - Access to Southampton Airport;
 - Strategic Highway network measures;
 - Freight initiatives;
 - Strategic park and ride; and
 - Demand management.
- 8.1.4 The strategy development plan has reviewed the potential for charging in the future. This has been written in the context of the South Hampshire area but provides information which could be used for other parts of the corridor. Chapter 6 has outlined how such measures might be pursued.
- 8.1.5 The Strategy Development Plan recommended the role of strategic partnerships in the future. Intrinsic to the overall aims of the strategy is the need to ensure that there is an integrated approach to transport. As such, a partnership approach is recommended between the local authorities and other key agencies in the area with the aim of delivering, managing and operating a stare of the art transport network.