

# ***C-LIEGE - Clean Last mile transport and logistics management for smart and efficient local Governments in Europe***

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**DELIVERABLE n. 4.1**

**GUIDELINE FOR THE DEVELOPMENT OF URBAN FREIGHT MOBILITY PLANS**

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## 1. EXECUTIVE SUMMARY

The D4.1 is a guideline document for Local Authorities for the development of urban freight mobility plans. D4.1 includes the description on how to develop energy-efficient Urban Freight Transport (UFT) demand planning and policy actions adopting appropriate measures.

Starting from international, regional and local experience of freight actors, taking into account the European, National and local guidance, the D4.1 aims to assist local authorities in developing and implementing an effective and successful Freight Strategy as a component of their Local Transport Plan in order to achieve balancing between efficiency of freight, save energy, and minimising transport externalities. This will allow a better use of both spaces and times slots planning of cities in different timescale for both passengers and freight transport.

The approach supports the effort of creating efficient urban logistics, by rethinking goods transport, and contributing to recent initiatives dedicated to generate a new culture in the field.

Currently, the efficient transport of goods and products between and within urban areas is little understood and is rarely actively managed in many urban areas, despite the fact that economic vitality of urban areas depends on the existence of logistics infrastructure and services that are cost-effectiveness in meeting these needs, whilst conserving the environment and saving energy.

The transport of goods represents an essential aspect of sustainable urban transport, but both a knowledge and partnership gap exists in most urban areas. Few administrations have the technical capacity, data or effective processes of working in partnership that allows businesses and companies to share their needs and aspirations for urban logistics.

The content of the guideline document has the following structure. It starts with a brief description of the current challenge of freight transport due to the tensions between facilitating economic activity and the impacts on traffic and the environment underlining the European and National approaches and guidance aimed to support sustainable and integrative planning processes (Chapter 2).

At the beginning of the sustainable urban mobility planning process, it is necessary to determine the potential to elaborate a successful UFT plan.

The Chapter 2 provides an advice on how to conduct an initial self-assessment, by identifying urban mobility stakeholders and understanding their potential role and position in the process, making wider connections with areas of policy connectivity (Chapter 3).

The status analysis is crucial in helping to define appropriate policies and to provide the necessary baseline against which progress can be measured. The dimensions of the analysis, the scenarios developing process, the set-up of a dedicated strategy needed for the involvement of stakeholders, mainly by Freight Quality Partnerships (FQPs) have been described in the Chapter 4. The identification of the measures is an important milestone in the development of UFTs. Measures should be considered in “packages” rather than in isolation, so as to take into account potential synergies. Successful experiences in implementing packages of measures and relevant documents with reference to effective measures for sustainable urban mobility planning are presented in the Chapter 5.

Closely connected to the selection of (packages of) measures, is the determination of clear responsibilities and the elaboration of an action and budget plan. The potential financial resources, the partnership aspects and the format of the adoption document are approached in the Chapter 6.

As the UFT plan is a strategic document, it provides a sound framework for the activities, but it does not specify in detail how a measure will be implemented. It needs to be stressed that the implementation process also needs to follow a structured approach to refine targets and to plan, detail, manage, communicate and monitor the implementation of measures. Moreover, the lessons learnt should be reflected taking into account the new challenges ahead for urban transport and mobility (Chapter 7).

These guidelines will be tested in pilot experiments supporting pilot cities in drawing up of Local Freight Development Plans (LFDPs), as planned in Task 5.3.

## **2. INTRODUCTION**

The statistics show that about two thirds of freight movements on the territory expressed in tonnes x kilometres are directly linked to the inhabitants' life. Most of these movements within a metropolitan area pertain to urban distribution logic. In order to limit the nuisances generated by the movements of goods, it is necessary to organise their distribution inside the agglomeration. In general, the last kilometre concentrate the most dysfunctions, because it accumulate the use conflicts and losses (congestion, energy consume, pollution, noise), and the performances of road mode do not offer yet enough alternatives.

For this reason an efficient and ecologic management of the demand in urban environment is a key factor for a satisfactory function of the downtown. But, as the best practice is demonstrating, the amelioration of the delivery of the goods needs a shared community vision able to conceive and implement a clever strategy and viable packages of measures.

### **2.1 Economy and Urban Freight Transport challenges**

The goods transport and delivery are fundamental elements of economic activity that is increasingly dependent on regional, national and global business networks.

In many cases the tensions between facilitating economic activity and the impacts on traffic and the environment are heightened due to the intensely competing demands evident in urban areas. High density of final destinations for goods and consequently, the immediate effect of an interruption to supply is comparatively transparent.

For this reason, in urban areas transport tensions may be at their greatest, there is a pressing need for authorities to take seriously the above statement and provide a suitable policy environment for efficient freight transport minimising environmental impact.

In combination with all other authority areas the local network forms part of a national network that provides and maintains transport infrastructure and services important also to other localities and other regions. This means that one can see a cumulative effect of local initiatives (measures) across a number of Local Transport Plans (LTPs), and each LTP has wider responsibilities.

Freight transport depends not on local boundaries but on origin and destination, resulting wider responsibilities for local authorities. Based on the estimation that the goods transport will continue to dominate the freight sector, despite the valorisation of the rail and river infrastructures by the national and European strategies, the cities progressively understand that more reflexion is necessary to manage better the nuisances of goods transport, proposing objectives such as:

- integration the issue of goods movements within the economic land use development;
- anticipation of future sites generating freight movements in the urbanism documents giving priority to the localisations adapted to the infrastructures, having in mind the opportunity of using alternative networks;
- supporting new shopping units by mesures dedicated to goods accessibility;
- supporting the economic “local” production and distribution industries within metropolitan development policies, because they are generating fewer and shorter movements.

## **2.2 European and National Guidance**

The need for more sustainable and integrative planning processes – also in sectors related to urban mobility – has been widely recognised. At the European level, Sustainable Urban Mobility Plans have gained increased recognition and importance as well.

The European Commission’s Action Plan on Urban Mobility aims at accelerating the take-up of sustainable urban mobility planning in Europe by providing guidance material, promoting best practice exchange, identifying benchmarks, and supporting educational activities for urban mobility professionals. Sustainable urban mobility planning received a further significant push when the EU transport ministers adopted conclusions on the Action Plan on Urban Mobility in Luxembourg on 24 June 2010.

The Council of the European Union “supports the development of Sustainable Urban Mobility Plans for cities and metropolitan areas [...] and encourages the development of incentives, such as expert assistance and information exchange, for the creation of such plans”.

In the EU Action Plan on Urban Mobility, available there are presented the intentions of the Commission to provide help on how to optimise urban logistics efficiency, including on improving the links between long-distance, inter-urban and urban freight transport, aiming to ensure efficient 'last mile' delivery. It focuses on how to better incorporate freight transport in local policies and plans and how to better manage and monitor transport flows.

In the Freight Transport Logistics Action Plan, "A holistic vision should cover freight transport and pay attention to aspects of land use planning, environmental considerations and traffic management, alongside a number of other factors. Facilitating freight and passenger transport demand management should be an integral part of town planning and offers opportunities for the deployment of innovative ICT-based solutions".

Sustainable urban mobility planning is focused on the level of the urban agglomeration. Nevertheless it is embedded in a wider regional and national framework for planning activities in the field of urban mobility. This includes for example regulations, funding streams or higher level strategies for spatial and transport development (e.g. a national transport plan, where one exists). It is crucial to assess the impact of the regional/ national framework to fully exploit opportunities and avoid conflicts with higher level authorities at a later point. Gain a clear perspective on how the regional and national framework will influence the sustainable urban mobility planning process and design of measures.

There is a substantial amount of national guidance that applies more generally to the development of a freight strategy. Whilst the following information is not exhaustive it provides a good basis for testing an emerging freight strategy.

Through the implementation of their freight strategies, local authorities have an important role to play in the:

- promotion of best practice;
- raising standards;
- promoting new technologies and efficient operating practices.

The France and English national guidance on UFT development is focused on integrated, sustainable freight distribution systems that supports economic growth, whilst simultaneously reducing adverse impacts on society and environment.

In France, it is mandatory for all agglomerations with more than 100,000 inhabitants to develop a Plan de Déplacements Urbains – PDU (the French SUMP). Transport authorities in agglomerations with less than 100,000 inhabitants may choose to develop a PDU on a voluntary basis.

In the case of London, The London Freight Plan (named also Sustainable freight distribution: a plan for London) supports the Mayor’s Climate Change Action Plan and informs future changes to the Mayor’s London Plan, transport, environmental and related strategies.

The original policy context for the Plan was set out in *Sustainable Distribution: A Strategy*, published by the then Department of Environment, Transport and the Regions in March 1999 and reissued by the Department for Transport in January 2004. It emphasised that the industry’s development should not compromise the needs of economy, environment and society which are the three pillars of sustainable development.

### 2.3 Definitions and Approaches

There is a large list of terms/definitions covering or/and interrelated with UFT Plans topic, vertically or horizontally. The same applies to the number of approaches found in the related literature.

**Mobility Management** is primarily a demand-oriented approach to passenger and freight transport that involves new partnerships and new tools. The aim is to support and encourage a change of attitude and behaviour towards sustainable modes of transport. The tools of mobility management are based on information, communication, organization and coordination. These tools require promotion. Mobility Management, which is both a novel and promising concept to promote sustainable transport, varies from country-to-country both in terms of scope and level of implementation (European Platform on Mobility Management).

**Transportation Demand Management** (TDM), also known as Mobility Management, is a general term for various strategies that increase transportation system efficiency. TDM treats mobility as a means to an end, rather than an end in itself. It emphasizes the movement of

people and goods, rather than motor vehicles, and so gives priority to more efficient modes (such as walking, cycling, ridesharing, public transit and telework), particularly under congested conditions. It prioritizes travel based on the value and costs of each trip, giving higher value trips and lower cost modes priority over lower value, higher cost travel, when doing so increases overall system efficiency.

According to Eltisplus project, a **Sustainable Urban Mobility Plan** (SUMP) is a Strategic plan designed to satisfy the mobility needs of people and businesses in cities and their surroundings for a better quality of life. It builds on existing planning practices and takes due consideration of integration, participation, and evaluation principles. The three elements of a Sustainable Urban Mobility Plan are:

- Planning (process): the core of the methodology.
- Plan (content of the document): beyond providing a plan outline, putting focus on actual examples of effective measures.
- Policy (implementation process of the plan and its final appraisal): a new element to facilitate implementation.

**Mobility Master Plans** (MMPs) are intended to represent the global transport policy of a large municipality, including urban goods movements. MMPs aim to improve air quality and public health, promote accessibility and social justice, making cities more pleasant and increasing economic performance. In the UK, the equivalent document is the Local Transport Plan, drawn up by towns and cities, either individually or (where the towns and cities work closely together) on a pooled basis.

The purpose of **Mobility Plans** (MPs) is to rationalise the organisation of a company's business-related travel. It is a coherent planning policy, which may be either voluntary or mandatory, but always concerted. An MP's initiatives are geared towards limiting the use of private cars by developing alternative solutions: walking, bicycles, public transport, car-pooling and car-sharing.

In the case of Paris, **the Mobility Master Plan** (named PDU) was adopted by the Paris City Council in February 2007. The 2007 MMP represents the global transport policy of Paris, integrating largely, for the first time, urban goods movements. The MMP aims at improving

air quality and public health, promoting accessibility and social justice, making the city more pleasant, increasing its economic performance. One of the main stated objectives is to reduce car traffic by 40% and greenhouse gas emissions by 60% by 2020.

More dedicated to the freight sector, in Bologna, the so-called **Goods distribution and collection plan in urban environment** (acronym: “Merci Bo2”) is conceived as the instrument used by the city administration in order to incentivize processes of re-organisation of logistics and goods distribution, in order to reduce the distances covered, using less pollutant vehicles, in order to diminish the traffic congestion and impacts in the city.

Freight distribution term (considered explicitly as “sustainable”) is present in the Sustainable freight distribution plan defines sustainable freight distribution as ‘the balanced management and control of the economic, social and environmental issues affecting freight transport that:

- complies with or environmental standards, regulations or targets aimed at reducing emissions of climate change gases, improving air quality and minimising impacts from accidents, spillages or wastes;
- ensures freight is run efficiently, reduces unnecessary journeys, minimises journey distances and maximises loads with effective planning;
- complies with labour, transport and human rights standards and regulations ensuring that employees and communities affected by freight can function in a healthy and safe environment;
- minimises the negative impacts of freight activities on local communities.

One can see that when using distribution term, more policies are explicitly approached, wider vision is used and adding to the technical aspects (transposed generally on maps) more commercial and marketing aspects. Linked to logistic expression is the term logistic.

**Logistics** is the art and science of managing and controlling the flow of goods, energy, information and other resources from the source of production to the marketplace. The convergence of economic, political and technological forces in the mid-1990s dramatically increased the importance of logistics. The delivery of goods overtook production as the most critical factor in business success. Almost overnight, the responsibility of logistics grew from

simply getting a product out the door to the science of controlling the optimal flow of goods, energy, and information through the purchasing, planning and transportation management.

A **Freight Strategy** represents both an expression of the cumulative understanding of freight issues within an authority and an action plan of schemes and measures designed to meet the objectives of promoting efficient and sustainable freight movements. Importantly those objectives should complement all other LTP objectives. On occasions strategies and actions for freight and public transport are developed separately and can often contain conflicting policies. Within a Freight Strategy, authorities should include an analysis of synergies and conflicts with other policies both within other areas of the LTP and other planning policies.

With bus priority measures now a familiar sight in many towns and cities, urban areas provide an ideal opportunity to review goods vehicle priority. There may be many opportunities where greater use could be made of priority lanes by allowing goods vehicle access without prejudicing the efficiency of public transport. This should, of course, be judged on a case by case basis. Where bus priority measures use existing road space, goods vehicles are often accorded the same low priority as the private car.

Through partnership, rather than confrontation, better use can be made of road space in urban areas allowing both public transport and goods vehicles to operate more efficiently and sustainably. Just as with buses, the lorry is not the enemy, in urban areas they are often the victim rather than the cause of congestion, albeit that one carries people in bulk and the other goods in bulk.

Taking into account the potential synergies between passenger transport and freight transport in urban areas, and the fact that in the passenger transport the use of “urban mobility plan” concept is usual, may be a reason to use the term “Urban Freight Mobility plan” (UFM) as a synonym for “Urban Freight Transport plan” (UFT). Urban Freight Mobility plan and Urban Freight Transport plan can be considered quite similar, dealing with the same matter: freight transport planning in urban areas. (“last mile” freight transport).

Different approaches to sustainable urban mobility planning exist throughout Europe.

While some countries such as the UK (Local Transport Plans) or France (Plans de Déplacements Urbains) may be considered forerunners, the SUMP approach is new or non-existent in other parts of the EU.

The benefits and added values of a Sustainable Urban Mobility Plan (SUMP) need to be communicated to decision-makers, planners and other urban mobility stakeholders in order to convince them of the advantages of using this approach in their own urban context.

In general, SUMP's englose chapters dedicated to urban freight transport. As mentioned before, the UFT plans are less in number, and sometimes approach logistics and distribution in diverse manners. Anyway, municipalities may consider an SUMP and a UFT (integrated in SUMP or stand alone) as other plans on the urban agenda. Therefore, it is important to emphasise that sustainable urban mobility planning is not a completely new planning approach, but that it rather builds on existing planning activities. But it is possible that in the future climate, economic, technical and informational challenges the innovative (in experimental phase now) aspects to really enter into a new dimension.

In the "Guidelines: Developing and Implementing a Sustainable Urban Mobility Plan" ELTISPLUS project, presents an overview of The SUMP cycle. The document (having no special references regarding Freight Transport) structures the SUMP cycle into 11 elements (main steps) and a number of 32 activities detailing specific tasks.

The CO2MMERCE project suggest a five-stage approach in the development and implementation of Mobility Plans (MPs) that are related to the organisation a company's business-related travel. It is useful when integrating UFT, PT plans and Mobility Plans within General Transport Master Plans.

The following chapters describe in detail the steps proposed by the C-LIEGE project without neglecting the integration of thr SUMP's with passenger transport, aimed to support municipalities in the development and implementation of UFPs.

The question is if UFTs containing only soft measures exist (or can exist). In our opinion, even if one or more measures are presented, approved and implemented in a UFP format, these are not really UFTs. A real UFP should integrate hard and soft measures, integrated in a unitary vision, congruent with other transport sectors plans, policies and strategies.

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### **3. DETERMINING THE POTENTIAL FOR A SUCCESSFUL UFT**

Traditionally, policy makers have tended to view freight transport as a problem rather than as an essential activity and have tended to focusing their attention and policy on individual vehicle activity rather than thinking about the supply chains that these movements are part of. But the efforts in the last few years to establish working relationships between the public and private sector to address UFT issues focused on improving efficiency and reliability of freight transport, while reducing the negative environmental impacts.

The approach currently starts by identifying problems perceived by each interest group, the measures within the group's competence to resolve or alleviate such problems and the best practice measures and principles for action by local government and industry.

#### **3.1 Conduct self-assessment**

The starting point for developing a Sustainable Urban Mobility Plan (or an Urban Freight Plan) is the understanding that urban transport and mobility is not an end in itself but should contribute to higher goals, such as quality of life and well-being of the citizens.

Depending on the national context a legal obligation can also be the driving force for developing an SUMP. Nevertheless real commitment is needed to make it a truly sustainable and effective plan. A common challenge for planners in local administrations who support sustainable urban mobility planning is to convince decision makers of the added value of this approach. If there is no "champion" available on the local level, it can be hard work to convince the right politicians to become supporters of developing an SUMP, by showing the challenges and problems the city faces if nothing is changed, to stress the benefits generated by an. This is particularly challenging as the full impact of an SUMP only becomes visible after a longer time-span than the electoral cycle. It may be helpful to point to the option of including "quick win" solutions in the SUMP, which may help to generate a positive response among citizens and other stakeholders in the short-term.

At the beginning of the sustainable urban mobility planning process, it is necessary to determine the potential to elaborate a successful SUMP.

This depends on many internal and external factors that provide an overall framework for the planning process and plan implementation. The current positive vision of the city regarding sustainability aspects (e.g. limiting urban sprawl by transforming brownfield land) is a favourable factor. A SWOT analysis at the beginning of the planning process will identify strengths and weaknesses, threats and opportunities, and the critical factors of success that may offer a first indication on the potential to run a successful sustainable urban mobility planning process. The analysis of the barriers for urban freight traffic may reveal contextual factors (e.g. economic, institutional, financial), or process related factors (e.g. bureaucratie).

The identification of drivers may support the process of consolidating the vision and configuring the objective. In the case of European cooperative projects, the peer review is a method method to help the partner cities understand the status of their urban transport planning, policies, activities and processes.

Closely linked to the self-assessment is the question of the available resources for carrying out the sustainable urban mobility planning process and for implementing measures. This includes human resources (i.e. available staff and skills) as well as financial resources.

While it may be common practice to bring in external expertise for particular technical tasks it is also important to think about building up expertise in its own organisation, and co-operating with other stakeholder over the long term.

The aim is to cover immediate skill requirements, by sub-contracting if needed, but also to develop and keep expertise on sustainable urban mobility planning within your the organisation itself. Assess the likely budgetary framework for measure implementation. Consider local, regional, national and EU funding opportunities.

Identifying urban mobility stakeholders and understanding their potential role and position in the process are important conditions to achieve the overall goals of sustainable urban mobility planning. This can help to identify possible conflicts and coalitions between stakeholders, and how these in turn may affect your planning process in terms of geographical coverage, policy integration, resource availability and overall legitimacy. This is required to develop appropriate ways to deal with dominant or weak stakeholders and with intermediary positions.

The definition of the geographical area covered by the Plan and the right timing, in correlation with the location and time availability of resources and the dynamics of stakeholders' involvement are other key factors for success. Even if differences exist in relation to the national/local planning culture, a typical timeframe uses:

- Short term (1-3 years),
- Medium (5 years),
- Long term (10 years),
- Vision (20 years) formula.

Steps and stages in the SUMP process partly depend on each other – interdependencies need to be carefully translated into a chronological order that fulfils all logical requirements of the process (e.g. having identified problems before discussing objectives) and harmonises with the local conditions. Choose an appropriate timeframe for building a strategic and operational framework for the planning process: 1-3 years (partly preceding and partly overlapping with the planning process).

The time needed for this will depend to a large extent on the experience with planning processes, institutional structures the political context and the local “planning culture”. It is important to reserve a special period for the evaluation process and reviewing the plan periodically (review at least every 5 years, ideally every 2 years).

In the case of London, the Sustainable freight distribution plan sets out the steps that have to be taken over the next five to ten years to identify and begin to address the challenge of delivering freight sustainably in the Capital.

In Bologna case of Goods plan, a gradual approach based on successive phases was considered from the beginning, meaning:

- the modification of the access and the rationalisation of the procedure of permits issue;
- the process of operators aggregation, aiming at optimisation of movements and loads in the zone with limited traffic, and a more correct use of the the urban space;
- evaluation of the second phase and the extension of the adopted measures.

### Action points

- Understand the current vision of the city and/or region regarding sustainable aspects;
- Provide information and consult key stakeholders early and often;
- Assess current UFT policies and the delivery process;
- Define the geographical area covered by the plan;
- Perform an initial SWOT analysis in order to assess the critical factors of success of the potential measures;
- Elaborate a first estimation of potential barriers and drivers;
- Estimate how long the plan development will take, how much it will cost;
- Consider local, regional, national and EU funding opportunities

### 3.2 Make wider connections

The public space sharing is an essential element when choosing the urban movement practices. The goods transport vehicles should have their place in the public space in order to ensure a fluent circulation and the delivery of these goods.

The location of the delivery areas should also be part of reflexions that integrate the components of the public space. But the public space is limited, mainly downtown. This fact often generates usage conflicts between different functions.

A multitude of stakeholders are involved in sustaining principally their mode (or subsystems of a mode) and applying their policies and plans. The experience demonstrates that looking beyond own boundaries, identify other relevant policies and potential synergies may be more rewarded for the urban transport actors (passengers and freight). This allows them to quantify and share the costs and benefits associated with new investments in urban logistics.

Moreover, a balance should be achieved between meeting the needs of businesses and conserving the environment.

The necessary plans, policies and programs to achieve this balance will involve:

*Capacity and infrastructure*

- Freight transfer and consolidation terminals, etc.)
- Modal shift (from vehicles to rail, etc.)
- New routes and facilities
- ITS solutions

*Land use management*

- Mixed use/single use zoning
- Storage, parking and loading zoning
- Building regulations

*Regulations and enforcement*

- Route regulations (route, weight, volume, road pricing, etc.)
- Time regulations (night deliveries, etc.)
- Disincentives/fines/taxes for non-sustainable logistics operations

*Information*

- Real-time traffic information
- Route/storage capacity
- Load zone reservation, etc.

Taking into account the excellent experience Tyne and Wear Freight Partnership (U.K.), mentioned in the Freight Toolkit for the North East Advice for Local Authorities Developing Freight Strategies, it is important to take into account from the outset other important linkages when understanding the wider responsibilities of each Local Transport Plan, and gain stakeholder input when necessary.

A complete list of the push and pull measures are presented in the O4.2 “Definition of suitable set of actions/measures for an efficient and energy saving organization of goods transport and delivery in urban areas” of the C-LIEGE project.

## Action points

### *Potential areas of connectivity:*

- the regional transport strategy;
- economic development and regeneration strategy;
- the corporate strategies and business plans of freight logistics companies as well as air, rail and shipping freight operators within the regional / sub-regional context;
- route management strategies developed by the highways agency;
- local authority air quality action plan;

### 3.3 Identify relevant major actors (stakeholders)

The sustainable urban mobility planning process needs to be tailored to the local situation. This includes as a crucial step the definition of the geographical scope of the plan, which ideally should address the functional urban agglomeration. Stakeholder cooperation and policy integration are other fields that need to be addressed in this phase, which should be concluded with an agreement on the work plan and management arrangements.

A plan must relate to a specific territory for which it is performed. Since a commonly accepted definition of the “urban agglomeration” will probably never exist, the most suitable spatial coverage needs to be agreed on by the stakeholders concerned. On the one hand, the area for which the respective local or regional authorities are responsible needs to be taken into consideration. On the other hand, the actual mobility patterns need to be taken into account, ideally covering the functional agglomeration. Between ambition realization, the anticipation of a political-level agreement on a suitable planning perimeter and responsibilities is an essential requirement for sustainable urban mobility planning.

The role of public actors in terms of merchandise transport and delivery is essential for facilitating a freight movement that should be in the same time fluent, effective and environmentally, economically and socially friendly. Even so, most of the analysts believe that it is not the case to set-up an authority to organise the freight transport and logistics.

But in order to implement the actions recommended by the future plan, it is necessary to coordinate the action between local collectivities, on one side and the public and private actors on the other hand. The set-up of a concertation “agency” aimed to promote good practices and favour the experience sharing.

It is important to ensure representation from a broad range of organisations delivering to or operating within the selected area as follows:

- Road hauliers/logistics companies/shippers;
- Retail;
- Manufacturing;
- Service providers, in particular the rapidly growing parcels sector;
- Rail operators and Network Rail;
- The local airport or port if appropriate.

Other potential representatives include:

- Chambers of Commerce/Trade – can represent the interests of local businesses and can help with surveying the local business community;
- Police - can help with issues surrounding parking and enforcement;
- Environmental groups - can highlight particular local environmental concerns;
- Residents groups - can represent the concerns of local residents.

## Action points

*Put together needs and resources*

- The most suitable spatial coverage needs to be agreed on by the stakeholders concerned;
- Ensure a fair representation of the organisations;
- Achieve the initial estimation of the added value to actual mobility patterns;
- Perform first steps to set up a “Concertation agency” ;
- Promote the role of City Logistics Manager by urban policy makers.

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#### **4. FREIGHT MOBILITY DIAGNOSYS**

Before deciding on policies for the future, it is essential to obtain an understanding of the current situation and related issues hindering the efficient and sustainable urban goods distribution. This knowledge is often very fragmented and incomplete.

##### **4.1 Status analysis**

The status analysis is crucial in helping to define appropriate policies and to provide the necessary baseline against which progress can be measured.

The analysis should be as comprehensive as possible but also needs to be manageable with the given resources. The analysis should also include the resilience of the urban transport systems (i.e. their capacity to absorb stressors or shocks) towards both expected and unexpected events, especially if they affect long-term decisions.

A quantified review of the current status of important mobility and transport developments (e.g. planning documents, traffic situation, accessibility of services and facilities, traffic safety, public transport services) in the urban agglomeration should be provided by:

- Preparing a list of deficits, problems and opportunities that relate to urban transport and mobility (e.g. accessibility to services, traffic safety, climate protection, land-use patterns and resilience towards expected and unexpected events).
- Developing a better understanding of what is really needed to know to enhance the planning. For cities that lack sufficient data: Collect a minimum set of data on urban transport and mobility as well as on other areas that influence your SUMP. This data set needs to fit the local context to enable an honest status analysis.
- Selecting suitable indicators that describe the status of transport and mobility in the city, focused on key policy objectives (avoid creating “data grave yards”). See references below for orientation on indicator selection. For example, if a key objective is to improve road safety, then clearly data on the number and severity of crashes is required; some data on the level of exposure of road users to accidents would be desirable (e.g. is the number of pedestrians stable, increasing or falling).

The baseline data may be obtained by activities of desk research, field survey (survey for flow generators, survey for transport and logistics operators, survey for freight vehicles drivers) and statistical analysis of data and identification of criticalities.

An useful approach is to introduce new dimensions of the analysis as sector challenges, used by London in producing its Freight Plan. One significant sector is Retail freight.

This sector is highly diverse and hugely important to sustaining London as a world class city. The planned growth in London's population and workforce will increase retail demand, while the Capital's rising appeal as a tourist, conference and leisure destination will further increase the demand for hotel, restaurant and leisure facilities.

While the retail and wholesale sector covers a complex range of supply chains, it is the subset of issues around local sustainable food distribution with low carbon vehicles which is perhaps the most visible in terms of freight activity. Unfortunately, in many cases the freight analysis work undertaken to date has been based on a number of assumptions due to the poor availability of available freight data. Much of the data available at the national and regional level is not currently collected in a way that allows disaggregation to a sub-regional level or below. Gaining support to change data collection practices, allowing greater regional and sub-regional analysis by sector and mode, will be key.

## Action points

*Reviewing (to define the room for improvement):*

- Traffic signing to guide drivers to and from key commercial and industrial areas;
- The status of goods vehicles as essential components of urban traffic;
- Planning and access policies to facilitate more effective use of the 24 hour day for deliveries;
- Situation of deliveries in pedestrian areas and consider making improvement to facilitate opportunities for off street servicing;
- Facilities to avoid conflicts with pedestrians;
- Kerbside loading/unloading arrangements adjacent to commercial premises;
- Enforcement of traffic regulations, especially parking.
- Other locally specific aspects

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## 4.2 Develop scenarios

After the analysis of the mobility situation one may develop scenarios of possible future mobility situations. This provides the basis for setting goals in a rational and transparent way.

Sustainable urban mobility planning is focused on the level of the urban agglomeration. Nevertheless it is embedded in a wider regional and national framework for planning activities in the field of urban mobility. This includes for example regulations, funding streams or higher level strategies for spatial and transport development (e.g. a national transport plan, where one exists). It is crucial to assess the impact of the regional/ national framework to fully exploit opportunities and avoid conflicts with higher level authorities at a later point.

There are few directly transferable examples from other world class cities. Data on freight movements is not as readily available as that for the movement of people. Securing reliable access to data on van activities is particularly difficult.

The vision for sustainable freight distribution in the city may be supported by a working group (within Freight Quality Partnership if it exists) that may identify the strategic choices for freight investment, under the three headings as follows:

- economy (support the economic activity, improve the efficiency of freight distribution);
- environment (tackle poor air quality and freight's contribution to climate change, minimising the impact of noise and vibration);
- society (improve quality of life by reducing the negative impacts of freight and servicing on communities).

The urban authorities are expected to build their UFT plans on the framework informed by the national goals and challenges, the relevant regional objectives, and any additional local goals. Local goals should be in the form of desired outcomes, and should look outside the transport agenda to wider corporate priorities. The approach of clarifying UFT goals is a critical first step before prioritising which transport measures will be pursued. Setting goals ensures consistency throughout the UFT.

Having specified a set of goals, it will be helpful to choose a set of performance indicators and targets which enable progress towards these goals to be monitored and incentivised.

These data are useful next to describe different scenarios in a quantitative and qualitative way, producing:

- a business-as-usual scenario which describes development if actions that are already programmed are implemented;
- different alternative policy scenarios that describe developments resulting from the choice of different policies and measures.

The scenarios should assess interdependencies between sectoral trends: transport, land use, environmental, and economic development, demography, etc, identify in a basic way synergies, potential for integration, and negative effects of sectoral trends.

Appropriate techniques such as modelling are indicated to support scenario development and appraisal. Modelling techniques are recommended, because they could work with interoperable modules covering selected aspects of transport and mobility or other relevant policy fields. The last step within this stage is to determine which strategy serves the vision.

#### **Action points**

- Assess the impact of the regional/ national framework on UFT;
- Clarify UFT goals as a critical first step before prioritising which transport measures;
- Select performance indicators and targets;
- Describe scenarios, based on modelling techniques;
- Define the strategy.

### 4.3 Freight Quality Partnership (FQP)

It is crucial to involve all different types of stakeholders throughout the planning process, addressing their specific requirements. This helps to legitimise the plan and enhance its quality. Stakeholder involvement supports the development of a more effective and (cost) efficient plan. A dedicated strategy is needed for the involvement of stakeholders, drawing on different formats and techniques when dealing with authorities, private businesses, civil society organisations, or all of them together.

Citizens are a special sub-group of stakeholders. Involving them in planning is a requirement stipulated by EU directives and international conventions and a fundamental duty of local authorities to ensure the legitimacy and quality of decision making.

The C-LIEGE project produced a Stakeholder Engagement Manual (O3.1), proposing a methodology outlining how the stakeholders may mainly be engaged in order to do the work of the Round Tables, start the Pilot Projects, work out the regional Goods Transport Strategy and prepare its implementation. The identification of suitable milestones and tools for involving stakeholders and citizens should be followed by a process of developing a communication plan that includes an engagement strategy and timeline as well as an overall strategy for PR activities (including media involvement).

All actors with a role in developing and implementing the plan need to have a clear understanding of who does what and when. A work plan document should indicate all necessary milestones for developing the SUMP and the management procedures and tasks with all stakeholders responsible for planning tasks inside and outside the organisation. The risk assessment, the plan for relevant contingencies and the progress monitoring methodology will enforce work plan implementation.

The most usual instruments to achieve an active engagement of stakeholders from the public and private sectors are the **Freight Quality Partnerships (FQPs)**. FQPs are partnerships between the freight industry, local government, local businesses, the local community, environmental groups and other interested stakeholders. Their aim is to develop an understanding of freight transport issues and problems, promote constructive solutions which reconcile need for accessing goods/services with local environmental and social concerns.

The vision for a FQP should be to promote environmentally sensitive, efficient, economic and safe freight transport to best serve the needs of business and the wider community.

The objectives of each FQP should, in general, reflect this vision but should be as specific as possible. Each partnership should address a need or solve a problem. FQPs are not an end in themselves. Importantly, in solving the need or problem there should be benefit for all partners. It is likely that only through jointly beneficial outcomes that the necessary drive and commitment will be encouraged.

In order to test the credibility of the objectives authorities may use a S.M.A.R.T. analysis, meaning that the objectives should be Specific, Measurable, Achievable, Realistic and Timed. The process of defining the objectives should take place before the start of any partnership and, in a very real sense, help to define the likely partners and even the issues to be addressed. However, in the light of experience of the partnership as it develops, the objectives may need to be reviewed and amended as necessary.

More detailed elements on the suitable content of a FQP may be found in “Tyne and Wear Freight toolkit for the North East advice for local authorities developing freight strategies”.

The toolkit expresses how to obtain the actors’ commitment, create a proactive leadership, develop the workprogramme and deliver the outcomes. According to this document, it is important that there is a designated point of contact for those outside the authority, in other words a “Freight Champion” that can take forward the FQP issues on a day to day basis. Some authorities have appointed full time freight officers to fulfill this role.

Moreover, the authorities need to have the ability to provide appropriate funding for both the process and the solutions. There are two core roles within an FQP: the chairman and the secretariat. It is a good idea to try to share these roles between different partners. Industry partners may be more reluctant to get involved if they see the FQP being run completely by the local authority and perceive it to be for their benefit only.

A whole range of measures and policies may be used to deliver the benefits of the FQP:

- preferred goods vehicle routes and networks with revisions to signage from key routes to local destinations;

- allow increased out-of-hours and night time deliveries where this can be shown to be acceptable to local communities – taking advantage of the great improvements in the design of goods vehicles in reducing noise and reducing harmful emissions;
- review of goods vehicle access restrictions to ensure adequate access arrangements are available to companies, especially in urban locations;
- review goods vehicle priority on congested urban routes and consider merits of allowing goods vehicles to share bus lanes;
- low cost junction improvements at specific locations to assist goods vehicle manoeuvring;
- effective enforcement of parking restrictions to avoid delays for goods vehicles where delivery access is required;
- overnight parking facilities where there is a demand for example within industrial or non-sensitive areas;
- producing maps for drivers with key information on restrictions such as weight, height, length, loading bans, access and preferred routes;
- land use planning policy separating residential developments from freight operators for the sake of increased efficiency and reduced disturbance;
- early consultation with affected freight operators over the development of traffic management schemes;
- industry best practice to reduce vehicle emissions, noise and local disturbance by design of loading areas and driver training in minimising noise;

The actions above are examples only, alternative actions can often be agreed or the actions listed could be applied more generally or to a specific location.

The potential benefits of FQPs are numerous. However, establishing an FQP is not an end in itself and cannot be considered successful until tangible progress has been made, in part or whole towards the objectives of your sustainable distribution strategy.

### Action points

- Put the stakeholder's segments in the focus of the Communication plan;
- Use a S.M.A.R.T analysis for defining the objectives;
- Preferably identify and designate a „Freight Champion“;
- Establish a single point of contact for the FQP,
- Define policies, measures and actions that may be used to deliver the benefits of the FQP.

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## 5. DEVELOP EFFECTIVE PACKAGES OF MEASURES

The selection of measures should build on discussions with key stakeholders, consider experience from other places with similar policies and ensure value for money.

Essentially, at this stage, measures are identified in response to the questions: what, how, where and when? The identification of the measures (packages of measures) is an important milestone in the development of UFTs.

Measures need to contribute to achieving the vision, objectives and targets. A set of options needs to be identified that realistically fits with the available resources. The first step is about gaining an overview of possible measures. **Measures should be considered in “packages” rather than in isolation so as to take into account potential synergies.**

There is a wide range of possible measures. This means that identifying the most suitable measures for a local context will require some desktop work and talking with members of the project team as well as stakeholders. Even not fully dedicated to UFTs but to SUMP, online good practice databases and documents that provide an overview of possible measures that may match the objectives of interested parts exists. Identifying the most effective measures should be based on more than individual experience, desktop research and local exchange.

It can be extremely valuable to learn from the experience of those who have already implemented measures which are considering transferable. A complete set of push, pull and push-and-pull freight transport demand-oriented measures for energy-efficient and environmental-friendly UFT is provided in the Deliverable D4.2 “C-LIEGE Toolbox for the establishment of the city logistics manager” as well as definition, description and policy design of each measure, involved stakeholders, identification of possible barriers and drivers for success, timescale, innovativeness, and transferability potential of the measure.

The identification and assessment of these measures is based on previous experiences and lessons learned by European, national and/or local initiatives and projects already implemented in the UFT sector which represented informative basis for the further generalization and standardization of each measure.

In addition, the O4.2 of the C-LIEGE project, structured in a complete database, has defined which stand-alone measure is potentially applicable in areas with different peculiarities such as small medium cities, urban areas with traffic congestion or air pollution problems, etc.

It is desirable to be defined the specifications that characterize the analyzed local context related to goods distribution process. In the approach of the C-LIEGE project, the coordinated and integrated measures of intervention should be discussed, shared and consolidated within the Permanent Concertation Table, as listed below:

- **regulative measures in terms of incentives** (e.g. extension of time slots to access urban area, incentives for the adoption of ICT systems, incentives to purchase freight vehicles with low environmental impact, incentives for converting traditional freight vehicles to natural gas and/or LPG fuelled vehicles, etc.);
- **regulative measures in terms of restriction** in accessing the city for vehicles used for purposes of delivery and collection of goods (e.g. restrictions on the time slots to access the city center, limiting times to load/unload, limiting access to some types of freight vehicles identified on the basis of the relative emission factors and/or weight, creation or extension of pedestrian areas and/or LTZs, access permissions, etc.);
- **pricing measures** (e.g. payment to access a specific urban area, payment to transit on a specific road corridor, charging for parking, etc.);
- **organizational measures** designed to create alternative distribution and eco-friendly systems (e.g. alternative delivery systems) to ensure continuity of good delivery and collection supply within the area subject to the types of measures as above.

In case the function of city logistics manager exists, the person performing the respective task has the role to define – in cooperation with the Local authority – regulative measures (restrictions and incentives) that are more appropriate for the local context of their application, taking into account indications derived by consultation activities (round tables) designed to summarize interests and needs of the different stakeholders.

Measure selection will be guided not only by effectiveness but also by value for money.

Especially in times of tight budgets for urban transport and mobility, it is crucial to get the most impact possible for the resources spent. The proposed measures should be assessed in view with a realistic and timely implementation with given resources.

The choice of methodology depends on the local experience and available resources and may include both qualitative and quantitative approaches. In some places a full cost-benefit-analysis may be too costly (e.g. involving modelling for major measures).

In such cases a focus on the most important measures, simpler approaches and/or estimates could be applied. It is, however, important to ensure that all costs and benefits – not just those that can be easily measured or valued – are taken into account, greenhouse gas and air quality impacts and energy savings are considered. In this phase, the role of FQP is crucial, because it is considered that this is the right moment for it to draw up an action plan focussed on delivering outcomes. The action plan needs to consider who is going to manage each initiative. The appointment of a project manager for each initiative may be appropriate.

One innovative and effective package of measures aimed to promote the goods delivery in town, particularly focused on delivery of food products is offered by the Ecologistics project implemented in Parma. It aims at reducing the access in the city centre of the more polluting commercial vehicles by developing new urban logistic strategies so to optimize the utilization of delivery cargo space and reducing the transit of empty commercial trucks, as well as promoting the use of low or zero pollution vehicles. The project has been conceived to significantly reduce traffic congestion in the historical city centre of Parma, traffic mainly due to the large number of commercial vehicles engaged every day in the delivery of goods and merchandise within the central area. The system is based on logistic IT localized platform located outside the city center able to integrate utility suppliers and content oriented to manage logistic process and carriage of goods destined to the city center. After consolidation, goods and merchandise are then delivered to the city centre using only eco compatible commercial vehicles (e.g. electric, bifuel, methane) or with less polluting vehicles.

In Tyne and Wear, the package of measures includes: direction signage for goods vehicles, routing information, urban access restrictions and curfews, goods vehicle priority, lorry parking and driver facilities, design of goods access to delivery/collection points, review of kerbside loading arrangements, decriminalised parking enforcement.

In London, the Freight Plan identifies four key projects and three workstreams for delivering freight in London more sustainably. This allows freight challenges to be combined into a clear delivery programme. The mentioned key projects are the following:

- Freight Operator Recognition Scheme (It will employ a tiered set of membership levels to address fleet and freight vehicle operational efficiency, improving all areas of sustainable distribution to reduce CO2 emissions, congestion, collisions and operator costs).
- Delivery and Servicing Plans (This kind of plans will be used to increase building operational efficiency by reducing delivery and servicing impacts to premises, specifically CO2 emissions, congestion and collisions).
- Construction Logistics Plans (Construction Logistics Plans have similar objectives to DSPs, but will be applied to the design and construction phases of premises, specifically to improve construction freight efficiency by reducing CO2 emissions, congestion and collisions).
- Freight Information Portal (This will offer a single interface for information on freight between public authorities and freight operators).

The three work-streams to support delivery of these projects are:

- Partnership development (This will assist the Plan's delivery by building partnerships at pan-London and sub-regional levels to help coordination between TfL, businesses, operators and boroughs).
- Major freight projects (Projects focused on promoting modal change from road to more sustainable alternatives (such as rail and water), and on reducing CO2 emissions by Congestion Charging Systems Upgrade, LEZ Implementation, Lorry Control Scheme).
- Freight data, modelling and best practice (It will also allow the development of a regional freight modelling capability to demonstrate the benefits of best practice case studies and build business cases for change).

Bologna's freight delivery plan is its key instrument to optimise freight delivery in the limited traffic zone in the city centre. The activities aimed to promote the integration of road pricing policies with technological tools to optimise vehicle trips for freight delivery.

The main objectives of the measure were: reduce congestion and the environmental impact of goods delivery in the urban area; rationalise and optimise goods delivery in the city with the goal to decrease the distance covered while maintaining the same level of service, demonstrate the impact a regulatory intervention in freight distribution can have on congestion and pollution in Bologna.

The support actions of the freight delivery plan consist of three main elements. The first is an analysis of how freight distribution is evolving in the city in order to fine-tune the deployment of system. The second task is to promote the integration of small operator systems to create a shared electronic platform. This platform will be based on the one the municipality already deployed for the optimisation of freight delivery. The third part of the measure is to introduce new access policies to the city centre. These will favour less polluting vehicles.

Outside of MIMOSA, Bologna has already implemented various steps under the freight delivery plan to satisfy freight demand while minimising pollution. To this end, the city has for instance rationalised the management of city access permissions, converted the freight vehicle fleet to low-emission vehicles and set up certain areas for loading and unloading goods. These areas are reserved for operators who have joined a consortium of small-scale freight operators.

#### **Action points**

- Build on existing best practice, transferable experience,
- Refine each measure's shape in order to contribute to the achievement of the vision, objectives and targets;
- Select the measures based on a verified methodology;
- Draw up a timed action plan for delivering the solutions, identifying who is responsible for each task by when within FPQ.

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## 6. FUNDING AND ADOPTION OF UFT

Closely connected to the selection of the measures (packages of) and determination of clear responsibilities is the elaboration of a budget plan. This is a key part of the SUMP in general and UFTs in particular and requires formal approval by all key stakeholders.

Essentially, at this stage answers are found to the questions: who and how much? **When a final set of measures has been selected it is time to assign responsibilities and resources.** This requires close coordination and discussion among all actors that will have a role in developing and implementing the measures or packages of measures.

It is important to secure efficient and effective allocation of resources (human, knowledge, funds) and validate a realistic plan by checking the consistency between planned activities, targets aimed at and allocated budgets, ensure good coordination between different funding sources, organise meetings with concerned stakeholders to discuss and agree on responsibilities and resources, involve citizens in discussion on final selection of measures.

Financial resources may come from: local taxes (e.g. a special local transport tax for public transport paid by public or private enterprises, developers, etc.), revenue funding (tickets, parking fees, city centre pricing, congestion charging, advertisements, private sector operators, developers, industry; knowledge and skills – SMEs), fundraising activities involving appropriate sponsors (but consider compatibility with marketing strategy), local budgets (from different municipalities and different policy domains), state subsidies (regional sources if applicable) or EU subsidies.

In France, during the development of the PDU (SUMP) the relevant authority is often assisted, both in the preparation of the work plan, and in the development of the PDU itself. Some authorities delegate part of the work to the urban development agency of which they are a member, or which they select through a call for tender. Others manage the development of the plan themselves while tendering part of the intellectual work to private consultancies. The regional transport research centres (CETEs) are in general also involved in the elaboration of the PDUs. A number of stakeholders are involved in PDU development.

In Tyne and Wear, according to the principles of Freight Partnership AECOM (a global provider of professional technical and management support services to a broad range of markets, including transportation, facilities, environmental, energy, water and government)

was successful in winning the competition to carry out the support tasks requiring technical work. The business plan describe the tasks and corresponding cost for the Partnership maintenance and management, plus monitoring and assessing the impact of the Partnership's work in terms of benefit to the economy, environment, air quality and road safety, in liaison with the Tyne and Wear LTP Monitoring Group.

The UFT plan document summarises the outcomes of all previous activities. After a final quality check, the document, including the action and budget plan, needs to be formally adopted by the political representatives. It is also important to ensure that the plan is widely accepted among stakeholders and citizens. The project team will have the task to compile the final draft of the plan document. To ensure that the previous agreements are well reflected drafts of the document need to be reviewed internally and by important external stakeholders. Include external reviewers with experience on sustainable urban mobility planning to check quality of plan document.

The format of adoption document and its circumstances will depend on the national regulatory framework and administrative structure. In general terms, the following needs to be achieved:

- Those authorities responsible for drawing up the action and budget plan should also adopt it, ensuring compliance with national regulation regarding plan adoption and (where applicable) minimum sustainable urban mobility planning requirements. The possibility that any party involved could take legal action against a plan that contravenes these rules should be anticipated.
- The plan action and budget plan has to be assessed with an eye to the impacts of policies and measures, to procedural requirements and progress made, and to achieving compliance with the EC directive on Strategic Environmental Assessment (SEA). To guarantee a credible evaluation, an independent body should be responsible for plan assessment.
- If the provision of national funds depends on the fulfilment of national quality criteria, the plan action and budget plan also needs to be approved by a higher level of government (linked to the results of the assessment).

The official adoption of the plan is an important step. In advance, accompanying and as follow-up to this step it is necessary to inform and involve stakeholders and citizens to ensure broad ownership of the UFT. They should have the feeling it is “their” plan, which aims at improving mobility and quality of life for everyone rather than just another document adopted at the political level. It is important to make the adoption of the plan a topic in local media and celebrate this milestone with the citizens.

### Action points

- Perform a careful scrutiny of the financial resources;
- Checking the consistency between planned activities, targets aimed at and allocated budgets;
- Use reviewers with experience on sustainable urban mobility planning to check quality of plan document;
- Respect minimum sustainable urban mobility planning requirements of the national and EU regulatory framework;
- To ensure broad ownership of the UFT.

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## 7. IMPLEMENTATION, MONITORING AND EVALUATION

Following the plan adoption, the implementation phase starts. **As the UFT plan is a strategic document, it provides a sound framework for these activities, but it does not specify in detail how a measure will be implemented.** It needs to be stressed that the implementation process also needs to follow a structured approach to refine targets and to plan, detail, manage, communicate and monitor the implementation of measures.

These management cycles will be much shorter than the planning cycle and need to be flexible enough to adapt to new situations. They need to be institutionalised in the organisation that is in charge of implementing a measure.

### 7.1 Implementation

From the outset it is important to agree on management procedures and responsibilities with all stakeholders involved in implementing the measures (work plan). Assessing risks and plan for contingencies, enforce work plan implementation and agreeing on reporting formats are the main activities. Informing and engaging citizens is a requirement not only while developing a plan, but when they are directly affected by a specific measure implementation. As implementation goes on it is also necessary to inform the wider public about the progress. It is important to mitigate negative effects that accompany measure implementation, inform the wider public about the progress in measure implementation, highlight milestones of measure implementation and celebrate accomplishments with citizens.

In order to check progress towards achieving the objectives, broader monitoring and evaluation arrangements have been defined before the plan is adopted. With the implementation of the measures it is time to regularly apply the selected monitoring and evaluation tools indicated below and to check how much progress has been made towards achieving the objectives. The results of the evaluation will be needed to enable a “repackaging” of measures in order to achieve targets more efficiently and within the budget.

The reporting should ensure that the results of plan implementation that are actually measured feed back into the public debate, thus enabling all actors to consider and make corrections where necessary. A certain flexibility to update the plan is needed to guarantee

that new developments and insights are taken into account. Otherwise the plan might lose its effectiveness over time.

#### **Action points**

- Assessing risks and contingencies;
- Agreeing on reporting formats;
- Providing a flexibility of the plan enabling possible “repackaging of the measures”;
- Continue the stakeholders’ involvement.

## **7.2 Monitoring and evaluation**

The monitoring and evaluation principles and tools should be build into the plan as essential management tools to keep track of the planning process and measure implementation, but also so that one can learn from the planning experience, and to build the business case and evidence base for the wider application of similar measures in the future.

Monitoring and evaluation of both the planning process and of the implementation of the measures are crucial to the effectiveness of the plan. It will also provide proof of the effectiveness of the plan and its measures. The monitoring and evaluation mechanisms should be defined early and become an integrated part of the plan.

It is important to connect indicator selection for monitoring and evaluation to setting S.M.A.R.T. targets, and to choose a few easily-measurable indicators and avoid information overload. The ex-post evaluation reviews the sustainable urban mobility planning and implementation stages, and the overall results of the decision making process.

It should include the following areas: Output (action taken), Outcome (impact of action) and Planning process of the measure implementation.

In some countries the national guidance on the Local Transport Plan advises authorities that when assessing the freight elements of LTPs they will look for evidence that authorities have taken appropriate steps to evaluate the impacts of proposed policies on local and wider distribution systems and practices, taking account of their economic, environmental and

social impacts, in line with the policies referring to sustainable distribution. In particular, plans should demonstrate that there has been consultation with industry, operators and the community in the development of the freight strategy. One important component of the freight strategy should be evidence that suitable sites for intermodal freight transfer are being identified and protected. The practical actions could and should be measured against the monitoring criteria of the economic environmental and social impacts.

Local authorities should look to draw upon the monitoring contained within related publications, such as those produced by the Strategic Rail Authority, and nationally, by the Government department responsible for transport. In this way, it may be possible to monitor freight “at arms length” or perhaps more appropriately at the sub-regional level where individual company data could be aggregated to mask commercially sensitive freight data.

The progress towards attainment of the vision for sustainable freight distribution should be reported annually against headline sustainable freight distribution “progress measures”, reflecting all of the areas of sustainable development: economy, environment and society.

The C-LIEGE project has elaborated a document (D6.1a - Monitoring and Evaluation Plan), whose overall goals are to develop, test and transfer experiences of successful soft measures and tools in the area of urban freight transport that will reduce urban freight traffic and pollutant emissions, generating related energy savings. In support of these goals special tasks has to monitor the implementation of C-LIEGE measures in seven pilot cities and assess their current and future impacts. The C-LIEGE evaluation methodology is the scenario-based impact assessment. The “do nothing scenario”, and the “C-LIEGE scenario” will be evaluated in regard to their impacts on energy consumption, pollutant emissions, number of freight vehicles entering the city and urban freight transport operating costs.

Before starting the work on the next generation of a plan (SUMP or UFT), the lessons learnt so far should be reflected taking into account the new challenges ahead for urban transport and mobility. This can help to optimise the planning process and the measure selection in the future. Experience from countries where sustainable urban mobility planning has been obligatory for some years (LTP in the UK, PDU in France) shows that each planning cycle help to improve the expertise on sustainable urban mobility planning and to increase the effectiveness of the next planning round. A first analysis of challenges with the next plan

generation can influence the design of the new planning process and close the circle between the current and the new plan. It is important to discuss with key stakeholders how lessons learnt in current planning cycle can help to better respond to these challenges.

### Action points

- Choose easily-measurable indicators;
- Use the evaluation methodology (scenario-based impact assessment);
- Report annually against headline sustainable freight distribution;
- Start the work on the next generation of a plan.

### References

- Department for Transport - Guidance on Local Transport Plans  
<http://webarchive.nationalarchives.gov.uk/20100210180753/http://www.dft.gov.uk/adobepdf/165237/ltp-guidance.pdf>
- ELTISPLUS project - Guidelines Developing and Implementing a Sustainable Urban Mobility Plan, 2011  
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## 8. CONCLUSIONS

As the global recession deepens and European firms struggle to retain market share in increasingly competitive global markets, the promotion of and Urban Freight Transport plans, within or co-related with travel plans within Sustainable Urban Mobility Plans requires the public actors to make more definite steps forward from ambition to realization of the regional and local goods transport and delivery. Each local authority faces a unique set of challenges and developing an understanding of current and future transport issues, and how these fit with the wider corporate agenda, will be pivotal to their activity.

Preserving and developing the sites having logistics vocation, each authority should consider the actions designed to help the freight transport logistics industry towards long-term efficiency and growth by addressing issues such as congestion, pollution and noise, CO2 emissions and dependence on fossil fuels that – if left unchecked – would put at risk its efficiency. Moreover, the review of already elaborated UFT plans and domain specific guidelines shows that objectives are mainly directly focused on climate change issues, congestion reduction, nuisance's alleviation, but rarely focused explicitly on the description on how to develop energy-efficient UFT demand management and planning actions.

SUMPs should consider the transport needs both of people and of freight. It should consider not only possible enhancements to transport services but the maintenance, operation, management and best use of the assets necessary for transport delivery, within the context of tightening environmental constraints. European legislation requires that a Strategic Environmental Assessment (SEA) be undertaken of all local transport plans.

An urban freight mobility plan must include both policies and an implementation plan for those measures. An UFT strategy should set out the area's key challenges and how they should be addressed. It will articulate clearly what the authority wants to achieve, and how it intends to do it. An implementation plan should complement the strategy, acting as a detailed business plan for implementing the measures which contribute to the strategy. This may include a funded programme of transport improvements, key milestones and risk assessment. It should be informed by deliverability and likely available funding.

The plans should be reasonably succinct documents, which can be readily accessed and understood by a range of users and stakeholders.

To ensure it remains a live document, mindful of potential subsidiarity issues, the authorities should consider both established and more innovative ways of obtaining public views. Creating and improving partnerships can facilitate successful outcomes. Partnerships in delivery can frequently produce efficiencies and economies of scale.

Benchmarking offers local authorities opportunities to come together and, based on user satisfaction surveys or other indicators, score different aspects of their local transport, before identifying ways of making improvements.