

WP 3 Urban Development

WP 5 Financing

Compendium on national framework conditions for energy efficient and integrated urban development planning

Part 1: Urban Planning Principles and Energy Policies

Part 2: Financing Sources for EER and integrated urban development measures

October 2010



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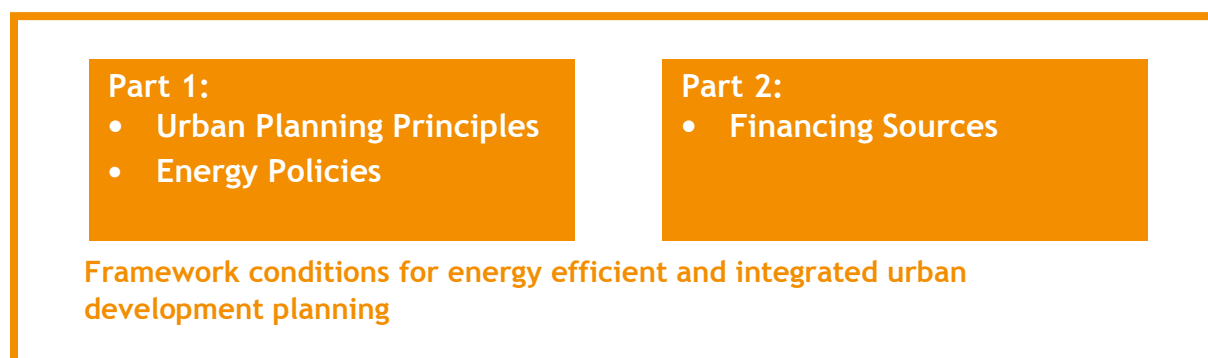
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Structure of the Compendium

This compendium provides information about the important legal and institutional framework conditions for the energy-efficient and integrated regeneration of residential areas. It was developed as part of the European project Urb.Energy and is based on the current work of the participating project partners to develop concepts and strategies for the renewal of five neighbourhoods.

Based on the assessment of the situation in five target areas in the countries Poland, Lithuania, Latvia, Estonia and Belarus, and the experience of partners in three Federal States (Länder) of Germany, the compendium presents urban planning principles, energy policies and existing financing sources that impact on integrated urban development planning.

Due to the particular working structure of the transnational project with partners from different countries being responsible for different project components, the topics of the compendium were analyzed in two different reports coordinated by two different project partners. For this reason, this document is divided into two sections: Part 1 focuses on urban planning principles and energy policies and Part 2 addresses the existing financing sources available for the target areas of the project at local, national and European level. This compendium is based on the contributions of all project partners and the systematic assessment of the framework conditions with questionnaires.



The compendium was prepared on the basis of contributions from the different project partners of the respective partner countries.

In particular the following project partners are responsible for the description of each country:

Germany

Center of Competence for Major Housing Estates, Berlin (PP 3); Ministry for Infrastructure and Agriculture, Brandenburg (PP 4)

Poland

Gmina Piaseczno, Poland (PP 8)

Lithuania

Housing and Urban Development Agency, Lithuania (PP 10); Siauliai City Municipality Administration, Lithuania (PP 11)

Latvia

City of Riga (PP 12); City of Jelgava (PP 13),

Estonia

Credit and Export Guarantee Fund KredEx, Tallinn (PP 14); Baltic Union of Cooperative Housing Associations, Bucha (PP 16); City of Rakvere (PP 15)

Belarus

Grodno Oblast Executive Committee, Housing Department, Grodno (PP 18)

PART 1
of the Compendium
Urban Planning Principles
and
Energy Policies



Deutscher Verband für Wohnungswesen,
Städtebau und Raumordnung e.V.

Responsible Project Partner:
Lead Partner (PP 1) German Association for Housing, Urban and Spatial Development (DV)

Elaborated by:
B.&S.U. Beratungs- und Servicegesellschaft Umwelt mbH

Introduction

Within three work packages (WPs) - “Integrated Urban Development”, “Energy Efficient Rehabilitation” and “Financial Instruments” - the partners jointly analysed existing approaches in the countries and present appropriate integrated urban development strategies. The three WPs are strongly interrelated.

WP3 - Integrated Urban Development

The strategic focus of work package 3 (WP3) is to enhance the application of the integrated urban development approaches as an important basis to increasing the energy performance of urban districts. The following fields of action are important:

- Energy efficient building refurbishment and modernisation of the energy supply structure (WP4),
- Upgrading of the residential environment and improvement of the social and economic infrastructure,
- Participation of homeowners and residents.

Within WP3, project partners combine the evaluation of urban development processes that have already been implemented and the development and partial implementation of integrated development concepts for urban target areas, with the exchange and transfer of knowledge. In this context, practical guidelines and models that are transferable to other urban areas will be developed.

Basis for the Compendium

The statements in this compendium are taken mostly from presentations that have been held at previous workshops and seminars. They are also based on the WP 3 questionnaire which was developed to provide all project partners with valuable background information and as a basis for the SWOT analysis.

Overview of urban planning principles and energy policies that impact on energy efficient and integrated urban development planning

International Framework

Kyoto Protocol (1997/ 2009)

This is an international agreement linked to the United Nations Framework Convention on Climate Change.

Its goal is to achieve a "stabilisation of greenhouse gas concentrations in the atmosphere at a level that would prevent dangerous anthropogenic interference with the climate system."

Agenda 21 (1992)

Agenda 21 is a United Nations programme which contains a comprehensive plan of action to be taken globally, nationally and locally in every area in which humans directly affect the environment.

With the aim of achieving sustainable development, the programme is particularly implemented on a local level, with each local authority required to compile its own "Local Agenda 21" strategy taking into account the specific conditions in the area and following discussions with the local inhabitants.

For this reason, each country and local area take a different approach to Agenda 21.

EU

Urban planning principles / policies

Leipzig Charter on Sustainable European Cities (2007)

This addresses the issue of "integrated urban development as a prerequisite for successful urban sustainability".

Integrated urban development should be applied throughout the European Union and, in order to be able to do so, the appropriate framework for this should be established on a national and European level.

Disadvantaged urban neighbourhoods must increasingly receive political attention within the scope of an integrated urban development policy.

The Leipzig Charter requires integrated solutions and specific attention to be given to disadvantaged urban areas.

The Territorial Agenda of the European Union (2007)

This is a strategic and action orientated framework for the territorial development of Europe. It contributes to economic growth and sustainable development by strengthening territorial cohesion of Europe.

Energy principles / policies

Energy Efficiency Action Plan (EEAP)

The EU's Energy Efficiency Action Plan sets out its broad framework for energy conservation. The current EEAP was published in 2006, following a Green Paper entitled "Doing More with Less: Green Paper on Energy Efficiency"- the document in which the possibility of saving 20% of EU energy use was first proposed.

Part 1: Urban Planning Principles and Energy Policies

The 2006 EEAP (scope 2007-2012) listed 75 actions in 10 priority areas, aimed at providing EU citizens with "the most energy-efficient buildings, appliances, processes, cars and energy systems" in the world.

Energy and Climate Change Policy "20-20-20"

This EU package builds on the international commitments made under the 1997 Kyoto Protocol.

Its binding goals are the reduction of greenhouse emissions by 20 %, an increase of renewable energy resources by 20 %, an increase of energy efficiency by 20 % by 2020.

Energy Performance of Buildings Directive 2002/91/EC

This is the main European directive providing a holistic approach towards efficient energy use in the buildings sector.

Its provisions cover energy needs for space and hot water heating, cooling, ventilation and lighting for new and existing, residential and non-residential buildings.

Energy End-use Efficiency and Energy Services Directive 2006/32/EC

EU Member States have to develop strategies and policies for the national implementation of the Directive, which sets a national indicative energy savings target of 9% for the ninth year of the Directive's application.

National energy efficiency action plans (NEEAPs) must contain the national overall target for energy saving.

Covenant of Mayors

This is a commitment by towns and cities to go beyond the objectives of EU energy policy in terms of a reduction in CO₂ emissions through enhanced energy efficiency and cleaner energy production and use.

Germany

Urban planning principles / policies

Planning principles

Integration in the Spatial Planning Law and Federal State Regional Planning Acts

There are several urban development instruments like

- Urban Development Concepts for the whole city,
- Integrated Urban Development Concepts (ISEK, e.g. the programme “Soziale Stadt”) for individual town districts,
- Climate Protection Programmes, Local Sustainability Strategies.

Urban planning instruments are

- Preparatory Land Use Plan for the whole municipality and the
- Legally Binding Land Use Plan.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Some projects within the ExWost research programme “Experimental housing and urban development” (BBSR)

With the research programme Experimental Housing and Urban Development (ExWoSt) the Federation supports innovative planning and measures regarding important civic and housing political topics through:

- Fields of research and model projects,
- Studies.

From the experiences, hints for the further development of the urban planning and housing policy should be derived and the knowledge transfer supported.

Competition on refurbishment to improve the energy efficiency of large housing estates (BMVBS, based on Integrated Urban Development Concepts)

To support the owners of large housing estates to develop integrated concepts and investment strategies and therefore to accelerate renovation measures, the Federal Ministry of Transport, Building and Urban Development (BMVBS) launched the “Energy efficient rehabilitation of large housing estates” competition in January 2009. The competition gave an impulse for the further development of integrated urban development concepts with the integration of energy aspects. The energy-efficient renovation should enhance the large housing estates as part of an integrated urban development concept.

Energy principles / policies

Energy strategies

German Climate and Energy Package (Meseberg 2007)

This package of 29 measures aims at efficient integrated climate protection. This includes ensuring that climate protection is affordable and keeps pace with economic development. For this reason, the German government will implement measures which reduce CO₂ emissions and are as cost-effective as possible.

Integrated Energy and Climate Programme (Integriertes Energie - und Klimaprogramm der Bundesregierung - IEKP 2007, Part 2, 2008)

Part 1: Urban Planning Principles and Energy Policies

This programme is intended to implement the European decisions on climate change, renewable energy production and energy efficiency from spring 2007 in a national programme. It is intended that through implementation it will be ensured that the climate protection targets are reached by 2020.

Specific public and intermediate institutions dealing with energy and climate protection

German Energy Agency “dena” (Deutsche Energie-Agentur “dena”)The Deutsche Energie-Agentur GmbH (dena) was founded in Autumn 2000 by the Federal Ministry of Economics and Labour in association with the Federal Ministry of Environment, Nature Conservation and Reactor Safety, the Federal Ministry of Transport, Building and Housing, and the KfW group (Germany’s leading promotional bank).

This cooperative effort was an expression of the German government’s new energy policy and a component in the national strategy to reduce greenhouse gas emissions.

Together with partners from industry and the financial sector as well as from the federal ministries, **dena** launches and realises campaigns and projects as a centre of competence for energy efficiency.

Energy efficiency / saving

Modernisation programme to reduce CO₂ emissions from buildings (CO₂-Gebäudessanierungsprogramm)

This programme, established in January 2001, provides favourable loans for the retrofiting of buildings built before 1979 on the whole of Germany, as well as demolition of empty residential rental buildings in Eastern Germany and East Berlin. The house owner can choose between 6 predefined investment packages which can be financed through a promotional loan. All packages contain predefined energy efficiency measures to substantially reduce CO₂- emissions.

Research for energy-optimised construction (Forschung für Energieoptimiertes Bauen, EnOB; BMWi)

"Buildings of the future" - this is the guiding concept of EnOB, energy-optimised construction (the name EnOB is an abbreviation of the equivalent German term). The research projects sponsored by the German Federal Ministry of Economics and Technology (BMWi) involve buildings which have minimal primary energy requirements and high occupant comfort, with moderate investment costs and significantly reduced operating costs. Learn more about the various areas on which EnOB research is focussed, and about the testing of new concepts, technologies and materials in model projects.

Energy Conservation Act (Energieeinsparungsgesetz, EnEG 2009)

The Energy Conservation Act was established in 1976 to increase the balance of trade, more precise: to reduce the dependence of Germany on energy imports.

The federal government has therefore the possibility to make demands on energy requirements for buildings and systems engineering in regulations on basis of the EnEG.

With another change of the 1st April 2009 the law has been supplemented by the foundations for the implementation of the integrated energy and climate protection programme.

Energy Saving Regulation (Energieeinsparverordnung EnEV 2009)

The EnEV is part of national German building law. On the basis of the Energy Conservation Act (Energieeinspargesetz EnEG) landlords are legally required to adhere to certain technical standards for efficient energy use. EnEV 2009 further raised the benchmarks of energy efficiency within existing stock and new buildings. This is a bylaw on energy saving and replaces EnEV 2007.

Renewable Energy Sources Act (Erneuerbare-Energien-Gesetz, EEG 2009)

This law supports the extension of energy production through any source of renewable energy and guarantees a minimum yield on investments (and thus a minimum price). German law promotes, according to the legal definition in § 1,1, "the further development of technologies for the generation of electricity from renewable energy sources"

The act provides a contribution to climate and environmental protection and belongs to a series of legal measures to reduce the dependence from fossil energy sources like oil, natural gas, coal and nuclear energy.

The Renewable Energy Sources Act promotes the use of renewable energy for the production of heat and the Biofuel Quota Act (Biokraftstoffquotengesetz) promotes their use in transport.

Act on Combined Heat and Power Generation (Kraft-Wärme-Kopplungsgesetz; KWKG 2009)

This law aims to raise the proportion of co-generated energy and heat (combined heat and power, CHP) in Germany to 25 per cent through providing financial and other support for the extension or building of CHP installations

This law also supports the market introduction of fuel-cells and the enhancement and new construction of heat distribution networks, which are fed from CHP installations.

Part 1: Urban Planning Principles and Energy Policies

Renewable Energies Heat Act (Erneuerbare Energie Wärmegesetz, EEWärmeG 2008)

This law stipulates that by 2020 at the latest, 14 percent of heat produced in Germany shall come from renewable energy. It provides a contribution to environmental protection and to the reduction of greenhouse gas emissions.

The law has three pillars:

- Owners of buildings which were built after 2009 are required to cover a certain amount of the energy needed for hot water and heating with renewable energy. In cases of renewal/rehabilitation of existing stock, the “Länder” can also apply these regulations;
- Financial support for the use of renewable energy from the German federal government;
- The law encourages the extension of heat networks.

Brandenburg

Responsible Project Partner:

Ministry for Infrastructure and Agriculture, Brandenburg (PP 4)

Urban planning principles / policies

Planning principles

Brandenburg Building Regulation (Brandenburgische Bauordnung 2008)

Working alongside other regulations, this sets energy standards for new buildings in its paragraph on the proportion of renewable energy for heating and electricity to be enforced by the municipalities.

Law on the legal structure of municipalities (Kommunalrechtsreformgesetz)

This provides the basis for a legally binding requirement to connect and use a certain energy supply. These measures can be implemented by municipalities in the interest of the public good, e.g. in order to protect the climate or resources.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Master Plan for Urban Regeneration

The Master Plan for Urban Regeneration is a policy instrument developed on the Brandenburg Länder government level describing the needs and opportunities for a cross departmental approach towards urban development. It focuses on

- urban structural elements (priority for inner-city development and compact towns and cities),
- the thematic integration and the consequences of interdependence between socio-spatial development, labour market and the wider economy, culture and education, transport and building in the context of an ageing population and a polarised territorial development between the big central city (Berlin) and the rural periphery,
- procedural requirements that have to be met by urban development concepts as a precondition for public subsidies, e.g. private participation, content of planning documents, quality of planning procedures,
- inter-ministerial collaboration focussing on the overall economic and environmental sustainability of development.

Energy and climate protection policy as part of integrated urban development

Energy principles / policies

Energy strategies

Energy Strategy of the State of Brandenburg (Energiestrategie des Landes Brandenburg 2020)

The aim is the reduction of final energy consumption by 13% before 2020 and an increase in the share of renewable energy sources (RES) up to 20% before 2020 through the implementation of energy efficiency measures.

(<http://www.brandenburg.de/cms/media.php/gsid=lbm1.a.1312.de/Energiestrategie%202020.pdf>)

Part 1: Urban Planning Principles and Energy Policies

Measures for climate protection in Federal State policy (Landespolitischer Maßnahmenkatalog zum Klimaschutz)

Specific public and intermediate institutions dealing with energy and climate protection

Brandenburg Energy Technology Initiative (Brandenburgische Energie Technologie Initiative, ETI), established at the end of the 1990s
(<http://www.eti-brandenburg.de>)

Brandenburg Economic Development Board (Zukunftsagentur Brandenburg, ZAB), established in 2001
(<http://www.zab-brandenburg.de>)

Energy efficiency / saving

Covenant of Mayors

One town in Brandenburg (Teltow) is member of the Convent of Mayors.

Berlin

Responsible Project Partner:
Center of Competence for Major Housing Estates, Berlin (PP 3)

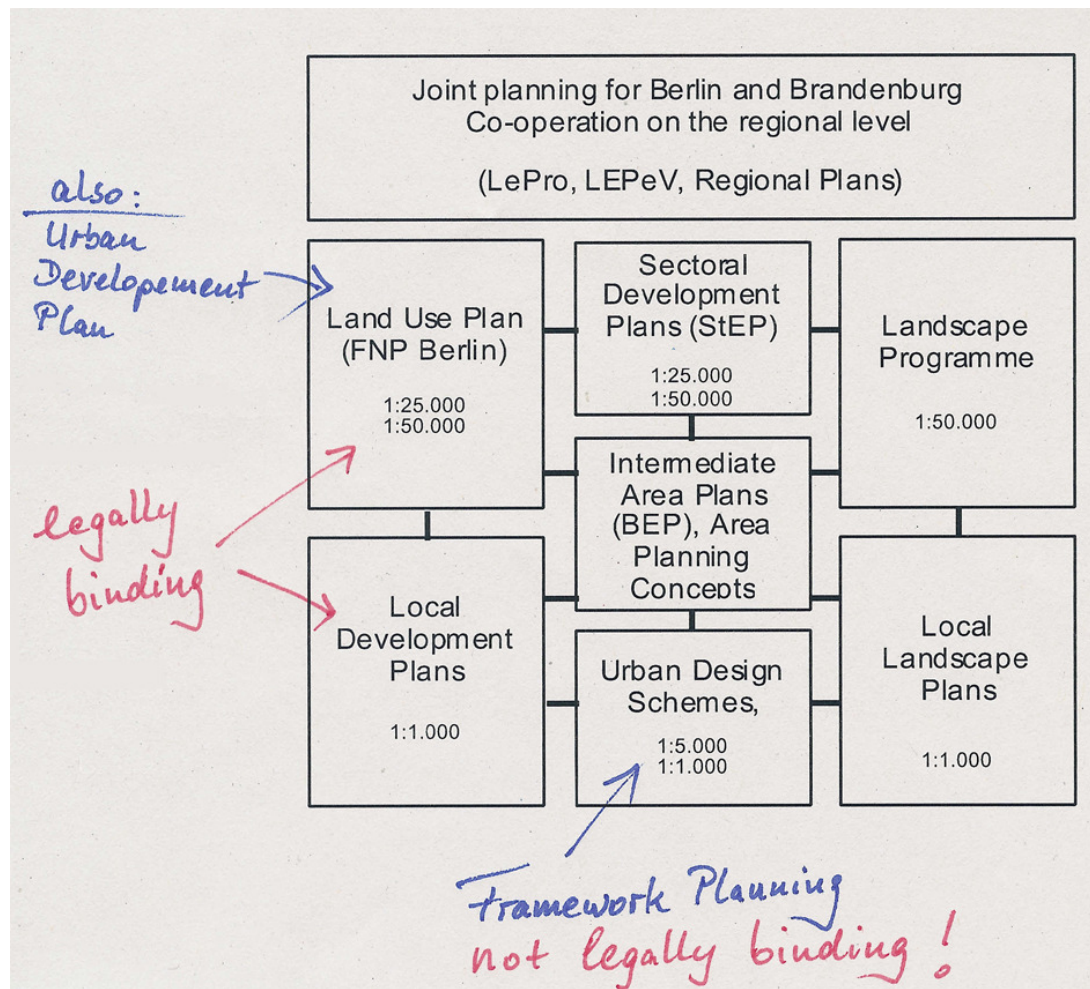
Urban planning principles / policies

Planning principles

Integrated Development Planning

Already in the early nineties (as so today) a comprehensive planning system exists in Berlin that is composed of

- legally binding (formal) instruments (Land Use Plan = Flächennutzungsplan and Local Development Plan = Bebauungsplan) and
- non-binding (informal) instruments (integrated development plans on various scale levels).



Overview of the Berlin planning system

Part 1: Urban Planning Principles and Energy Policies

Integrated urban development planning is a (short-time) working tool in order to discuss, weigh out and decide about development actions. Especially matters of stakeholder coordination and harmonising interests can be tackled through integrated development plans. Also public participation processes can be implemented according to the actors' needs.

Stakeholders of Energy efficient refurbishment (EER) of buildings - mainly housing societies - and energy efficient (EE) improvement of supply structure - municipal and private supply companies - are involved in legally binding and legally non binding planning processes. The various integrated urban development planning processes offer platforms of discussing and coordinating planning strategies and measures.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

"Lokale Agenda 21 Berlin" (Local Agenda 21 Berlin)

In 2006 the Berlin House of Representatives adopted the Local Agenda 21 Berlin serving as a rule for sustainable political action in the fields of economy, ecology and social affairs. The Local Agenda 21 Berlin contains seven fields of action for sustainable development: (1) social live, (2) civic commitment, (3) traffic and mobility, (4) interdependence of city and hinterland, (5) education, (6) economy and working and (7) energy and climate protection.

The reduction of CO₂ emissions by 40% until 2020 compared to 1992 and by 50% until 2030 has been fixed in the Local Agenda 21. Further general objectives are described, e.g. the increase of the ratio of renewable energies up to 20% of the total primary energy supply in 2030. In the list of measures to be taken the stepwise energy efficient refurbishment of Berlin's housing stock is stated. The pioneering task is attached to the municipal housing associations. Additional energy savings potential has to be opened up by evaluation of accompanying benchmarking and surveys.

Energy principles / policies

Energy strategies

Berlin Energy Programme 2006-2010 (Berliner Landesenergieprogramm (LEP) 2006-2010)
As a continuation of the former climate concept, the Programme determines climate-related objectives and instruments until 2010. The main goal is the reduction of energy consumption and hence the emission of CO₂ by 25% in 2010 (already achieved in 2007, mainly through external effects). Therefore the fields of (1) public relations, (2) building and housing, (3) public facilities, (4) industry and commerce, (5) traffic, (6) energy service providers, security of energy supply and energy prices, (7) use of solar energy and other renewable energies and (8) waste industry play an important role for the achievement of this aim. The superior guideline is carried by subordinate objectives, relating to reduction of energy consumption, taking advantage of safeguarding and generating employment through targeted investments, doubling the ratio of renewable energies, (particularly by increasing solar heat use), prevention of increase of traffic-related energy consumption, involvement of civic and economic actors as well as support of research and innovations. Subordinate objectives in turn are specified by concrete measures, e.g. implementation of German Energy Savings Ordinance - Energieeinsparverordnung (EnEV), creating energetic transparency in residential buildings, development of integrated energy concepts for constructional measures, concluding an energy protection agreement with the housing industry, installation of a CO₂ reduction monitoring for the building stock, solar refurbishment of residential buildings or demonstration and promotion of pilot projects. Furthermore detailed aims for energy efficient refurbishment are formulated, e.g. concerning energy demand of space heating.

Berlin Energy Concept 2020 (Berliner Energiekonzept (ENK) 2020)

The planned ENK serves as integrated basis for the future update of LEP comprising all fields relevant to climate. Basic principle of the concept is the reduction of green house gas by 40% until 2020 compared to 1992. Single measures are determined through scenarios and then they are integrated in the concept. Therefore trans-sectoral climatic parameters are considered in the fields of energy technology and research, private households and buildings, settlement pattern and urban development, public facilities, manufacturing and industry, traffic, renewable energies and energy industry. In the field of buildings it becomes apparent that in future increasing efforts have to be made to tap the full CO2 saving potential of 10% between 2005 and 2020 by energy efficient refurbishment, particularly of the housing stock constructed before 1979.

Climate Protection Agreements

Currently Berlin has concluded climate protection agreements with eleven public enterprises including all six municipal housing companies. Contracting parties commit themselves to working towards an efficient, an ecological and an economical use of energy. Examples of commitments concerning the residential housing stock are the reduction of energy and hot water consumption by 30% until 2010 compared to 1990, the reduction of green house gas by 10% until 2010 compared to 2006 or specific consulting services for housing associations. Commitments also consider particular local social, economic and ecological conditions of the housing stocks managed by the housing associations as well as the current economic prospects of the housing associations themselves. Assistance and accommodation have been concluded concerning support programmes or legal and fiscal affairs. Problematic individual cases and other constraints can and should be pointed out to consensually agree upon specific solutions.

Draft for Urban Development Plan 'Climate' (Stadtentwicklungsplan (StEP) Klima)

StEP Klima elaborates strategies of action on the basis of a study about the impact of climate change on urban structures and environment. It determines spatial and climatic framework conditions by taking account of existing climate-relevant policies. A detailed spatial focus lays on consequences of climate change and on identification of affected areas. It also takes surveys of local age structure into consideration. Scheduled approaches for model areas in the city are defined.

Ecological Criteria for architectural Competitions (Ökologische Planungskriterien für Wettbewerbe)

Ecological Criteria for architectural Competitions were published in 2007 by the Senate Department for Urban Development Berlin. It contains several provisions concerning sustainability for planning and design of construction projects sent in for a competition. Entries should follow the principle of

- preserving the environment and natural resources,
- achieving a maximum degree of social and environmental compatibility,
- realising and ensuring respectively sound living and working conditions on a sustained basis,
- creating energy efficient buildings.

An approximate ecological overall scheme is expected to be presented. Furthermore costs of routine maintenance and long-term upkeep as well as operating costs of planned installations are to be considered. Monetary components and non-monetary demands placed by the public builder on quality, design and sustainability are to be taken into account.

Additional specific objectives are formulated under the following headlines:

- Urban Development Location and Surrounding Area of a Building,
- Buildings and Organisation of Floor Plans and
- Construction, Development and Technical Systems.

Specific public and intermediate institutions dealing with energy and climate protection

Memberships and Cooperation

Berlin is member of various alliances and cooperation committed to climate protection and sustainable development.

- E.g. 1. Berlin is founding member of the Climate Alliance (Klimabündnis), in which the 1.500 member cities and municipalities aim for the reduction of greenhouse emissions, and specifically in the protection of the rainforest and the indigenous peoples.
- 2. Berlin is member of "ICLEI - Local Governments for Sustainability", that is an international association of local governments as well as national and regional local government organizations that have made a commitment to sustainable development.
- 3. Berlin is also member of The World Mayors Council on Climate Change that is an alliance of committed local government leaders advocating an enhanced recognition and involvement of Mayors in multilateral efforts addressing climate change and related issues of global sustainability.
- 4. Berlin is member of "C40 Climate Leadership Group", that is a group of the world's largest cities committed to tackling climate change.

Berlin Energy Agency (Berliner Energieagentur)

Berliner Energieagentur develops and implements integrated concepts for the efficient use of energy. By detecting energy saving and efficiency potentials for industrial and commercial customers as well as for the public sector Energieagentur contributes to climate protection and cost reduction. It is organised as Public Private Partnership powered by GASAG Berliner Gaswerke Aktiengesellschaft, Vattenfall Europe Wärme AG, KfW Bankengruppe and Land Berlin.

Energy efficiency / saving

Comparison of energy consumption and CO₂ emissions per capita in Berlin 1990 and 2006

Parameter	Berlin		
	1990	2006	Difference in %
Primary energy demand per capita (in gigajoule)	104,1	89,2	-14,3
Final energy demand per capita (in gigajoule)	76,4	77,7	1,7
CO ₂ emissions per capita (in tons CO ₂)	7,9	5,9	-25,3

Source: State Statistical Institute Berlin-Brandenburg

Poland

Urban planning principles / policies

Planning Principles

Urban planning is carried out by both the national government and municipalities. The national government is responsible for strategic planning that covers regional, national and EU development targets.

Municipalities have the sole responsibility for local planning through a Local Plan for Spatial Development.

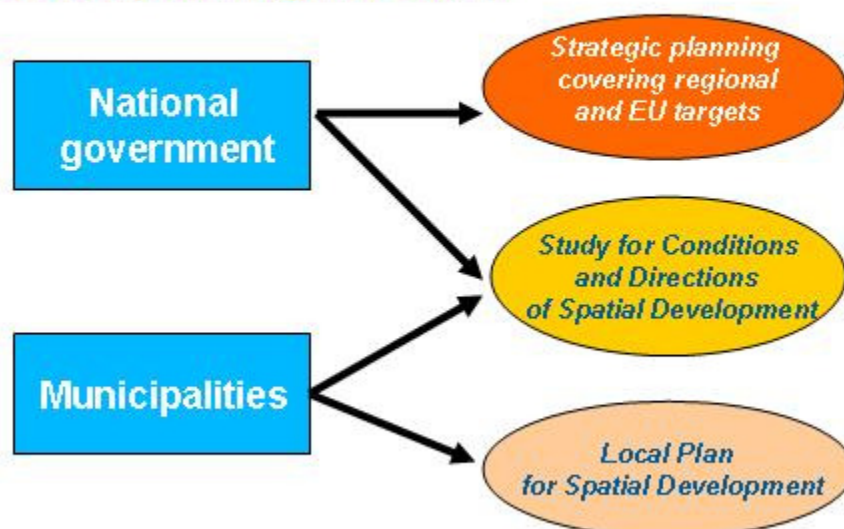
The regional governor (Voivod) is responsible for integrating national targets into the Local Plan for Spatial Development (strategic planning).

Local and governmental targets are integrated into the planning process via intermediate planning guidelines, called the Local Study for Directions and Conditions of Spatial Development.

The tool to facilitate a top-down and bottom-up approach is called a Study for Conditions and Directions of Spatial Development, which must take into consideration specific spatial plans such as those for heritage and nature protection, defence, regional and interregional infrastructure and also other government responsibilities. The Study for Conditions and Directions of Spatial Development cover the entire city area.

According to information submitted by the project partners, there is currently no specific law in Poland that applies to Integrated Urban Development Concepts.

Urban planning in Poland



Spatial planning has been practically abandoned on a national level (the Government Centre for Strategic Studies was dismissed after its unfavourable assessment of government policy).

Municipalities were reluctant to enact Local Plans for Spatial Development.

Part 1: Urban Planning Principles and Energy Policies

In the absence of a Local Plan for Spatial Development, planning and construction acts allowed the planning permission process to be simplified in favour of assessment on a case by case basis. This caused unrestricted development due to a considerable demand for new developments in the legal environment for boosting private business.

The planning system and individual planning permissions have gradually lost their quality and efficacy due to the burden of the related laws and regulations that forced developers to begin the process of fragmented negotiations over construction project approval, often leading to costly court proceedings to address conflicts with local citizens.

As there is a fully developed real estate market, there is a need for it to be harnessed by Local Plans for Spatial Development, which ensure by the terms of Spatial Planning Act (1994) that a change in property value caused by the Local Plan is respectively financially rewarded to or discounted by the affected real estate owner.

The main reason for the failure of enforcement of local planning is that there was an overall rejection of any law limiting personal or economical freedom in Poland.

The proposed remedy is to empower local governance of which mandatory real estate shareholdings along with entrepreneurs form the foundation; negotiating common interest on that low level may enable the municipality to act directly for common goals instead of resolving conflicts. Local real estate owners must be presented with opportunities at an early stage in the planning process. Local Development Plans and regeneration programmes must be subject to consideration by municipalities.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

The Energy Law stipulates that in cases where the city decides to develop strategies and plans for the energy supply of the city area, it should contain energy efficiency measures in buildings and distribution networks as well as cogeneration.

Energy principles / policies

National energy strategies

Resolution No. 202/2009 of the Council of Ministers

The national energy strategy of Poland is determined by Resolution

No. 202/2009 of the Council of Ministers from 10th November 2009: Energy Policy of Poland until 2030.

(http://www.mg.gov.pl/files/upload/8134/Polityka%20energetyczna%20ost_en.pdf)

Specific public and intermediate institutions dealing with energy and climate protection

Energy Conservation Foundation

The Energy Conservation Foundation (www.fpe.org.pl) was established by the public Polish Development Bank in 1992. The Foundation was the initiator of the Polish scheme to support energy efficient refurbishment measures in buildings, is a training centre for energy auditors and a competence centre of Polish Innovation Scheme managed by the Polish Entrepreneurship Agency.

NAPE - National Energy Conservation Agency

The National Energy Conservation Agency (NAPE, www.nape.pl), created by Energy Conservation Foundation, established in 1994 is a country-wide training and advisory body.

KAPE - Polish National Energy Conservation Agency

The Polish National Energy Conservation Agency (KAPE) was established in 1994 and is a governmental body.

ZAE- Energy Auditor`s Association

The Energy Auditor`s Association (ZAE, www.zae.org.pl) was formed in 2002 and connects over 1200 privately acting energy advisors.

SAPE - Country-wide association "Energy and Environment Conservation"

The country-wide association "Energy and Environment Conservation" (SAPE, www.sape.org.pl) was founded in 2004 and connects regionally active energy conservation agencies.

Energy efficiency / saving

National energy efficiency plan

The national energy efficiency plan is currently under development.

Financing scheme for energy efficient refurbishment (EER)

A nationwide financing scheme for EER of buildings has been in place since 1998; over 20,000 buildings have been refurbished, which has led to average of 30% in heat savings.

Piaseczno

Urban planning principles / policies

As municipality-enacted planning directions indicate, the main goal is to encourage social cohesion by means of improving the quality of the built environment on the one hand and encouraging organisational frameworks for citizen's grassroots activities on the other. Another strategic goal is to promote the city as a viable opportunity for residents, industry and services in the metropolitan area of the capital city of Warsaw. Local Plans for Spatial Development cover 25% of the municipality's area.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

EPBD Directive

The EPBD Directive was adopted nationwide in 2007, but with some major shortcomings.

Energy Supply Plan

The Energy Supply Plan covers a whole city and stipulates that the existing district heating network is to be maintained, supplied by a natural gas fired heat-only plant. RES, especially solar energy can be introduced by owners of facilities.

Energy principles / policies

Regional energy strategies

According to information submitted by the project partners, there are no regional energy strategies to date.

Specific public and intermediate institutions dealing with energy and climate protection

The city of Piaseczno cooperates closely with the National Energy Conservation Agency, which is a partner in various EU programmes, including IEE, RTD, and INTERREG.

Energy efficiency / saving

The modernisation of the district heating system, including construction of individual heat stations in buildings, has taken place in cooperation with home owners' associations, the municipality and district heating company PCU.

Two pilot projects of the energy efficient refurbishment of residential buildings have been performed as part of the BEEN project.

Piaseczno - Target Area

Urban Planning principles / policies

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

There is a Study for Conditions and Directions of Spatial Development, but not a binding land-use plan.

To implement EER initiatives, housing cooperatives and home owners' associations are given organisational support from the municipality in form of enabling them to participate in EU projects (BEEN, UrbEnergy).

Energy principles / policies

Energy strategies

According to information submitted by the project partners, there are no specific strategies to date.

Specific public and intermediate institutions dealing with energy and climate protection

NAPE - National Energy Conservation Agency

NAPE is the Department of Infrastructure and Environmental Protection of Piaseczno Municipality.

Energy efficiency / saving

The modernisation of the district heating system, including construction of individual heat stations in buildings has taken place in cooperation between home owners' associations, the municipality and district heating company PCU.

Two pilot projects of energy efficient refurbishment residential buildings have been performed as part of the BEEN project.

Lithuania

Urban planning principles / policies

Introduction

According to the spatial planning system in Lithuania, the county areas, municipalities and parts of the overall plans are subject to mandatory planning documents. This ensures systematic sustainable development and the rational use of areas and resources, taking into account the needs of long-term territorial development.

The present spatial planning system is based on the Comprehensive Plan of the Territory of the Republic of Lithuania which came into effect in 2002. The document is one of the country's leading regional and policy documents. All other documents have to be adjusted including the Single Programming Document (NAP), regional socio-economic development strategies and other issues affecting development with expansion plans. For this reason, the Comprehensive Plan of the Territory of the Republic of Lithuania has a programming and coordinating role in the regional General, Special and Development plans. It sets out key solutions, which must be followed when preparing a lower hierarchical level, in particular county general plans and special planning documents.

There are mainly three levels of approach related to planning in Lithuania. Special planning documents are under the coordination of the administrative unit level. All specific sector development plans and strategies have to be based on the general plan solutions:

- Ministry of the Environment of the Republic of Lithuania is currently responsible for the legal acts and norms related to the territorial and urban planning processes as well as construction works within the country.
- On a more local level, municipalities and counties are responsible that the development is in accordance with the laws and norms set by the government. Municipalities and counties set some more specific regulations for their areas.
- The third level would be inhabitants, developers, investors, architects etc., to comply and conform to the regulations set by the State government and municipalities or counties.

The table below shows the planning levels in Lithuania.

Planning levels	Lithuania	The objects of general planning
1.1. National	Comprehensive Plan of the Territory of the Republic of Lithuania M 1:400 000-1:100 000	The territory of the Republic of Lithuania;
1.2. Regional (sub-national)	County General, Strategic development plans M 1:50000 - 1:400000	The territory of the county;
1.3. Municipal	General plans M 1:50000 - 1:10000 - 1:2000	The territory of the municipality or its parts;
2. Special planning	Varies	The land stock of the Republic of Lithuania, including forest land, water resources; Social, cultural, economic activities on the territory under planning; Systems of infrastructure and their parts; Protected territories, their systems, natural and immovable cultural properties.
3. Local	Detailed plans M 1:2000 - 1:500	Land plots and forest property or their groups; Territories of towns, townships or their parts; Village territories.

The Process of General Planning

Phases	
1. Preparatory phase	Studies, analysis, forecasting, formulation and approval of the objectives and preliminary solutions of the development.
2. Development phase	Drafting operative planning.
3. Final stage	Operative planning.

Urban planning policies

Urban planning policies in Lithuania are formulated in consideration of the priorities contained in the following:

- the European Council of Ministers responsible for spatial planning conference meetings (CEMAT) (on the European continent for sustainable spatial development of the basic principles (2000, Hanover),
- the EU,
- 2004-2008 Ministerial Conference provisions of the documents and implementation of Lithuanian Seimas of the Republic
- the provisions adopted by the Republic of Lithuania contained within, the 2008-2012 Programme (Žin., 2008, Nr.: 146-5870), the Government of the Republic of Lithuania 2008-2012 Programme vehicles (Žin., 2009, Nr.: 33-1268), Long-Term Development Strategy (Žin., 2002, Nr.: 113-5029),
- the Lithuanian 2007-2013 European Union Structural Assistance Strategy (April to 26th June 2007, European Commission).

Rio Declaration

The introduction of the Rio Declaration (1992, Rio de Janeiro) established the principles of sustainable development. This outlines that it is necessary to address problems of coherence of the national territory in both rural and urban areas and their integrity, management complexity, technical infrastructure development, energy efficiency and safety, housing development optimisation and renovation, social security, business-friendly environment, while at the same time preserving and properly using our natural and cultural heritage.

EU's European Spatial Development Perspective

Implementation of the EU's European Spatial Development Perspective (ESDP (1999, Potsdam)), the Urban Acquis' principles (2004, Rotterdam), Bristol Accord "(2005 Bristol) raised "a viable community" No law exist for IUDC concept, the EU Territorial Agenda (TA (2007, Leipzig) as necessary to achieve sector strategic plans and spatial coherence. Especially with the EU's Lisbon Strategy (2000, Lisbon) the role of cities was highlighted in the knowledge economy and national competitiveness. Aalborg Charter for sustainable urban development (1994, Aalborg), the Leipzig Charter on Sustainable European Cities (2007, Leipzig) highlighted the role of democratic principles in the development of a city.

Planning documents

Comprehensive Plan of the Territory of the Republic of Lithuania (Žin., 2002, No. 110-4852).

This document contains important goals that form the main direction of regional policy and defines the main guidelines and planning preconditions for the national special plans and county-level comprehensive and special plans.

Law on Territorial Planning of the Republic of Lithuania (Žin., 1995, No. 107-2391; 2005, No. 152-5532).

This regulates territorial planning in the Republic of Lithuania, including the interrelationship between natural and legal entities and public authorities involved in this process. It defines the priorities and the relationship between the detailed, special and comprehensive plans.

The new version of the Law on Territorial Planning Concepts of the Republic of Lithuania (hereinafter referred to as a "concept") has been prepared in the Republic of Lithuania for 2008-2012 programme implementation measures adopted by the Government of the Republic of Lithuania on 25th February 2009 Resolution No. 189 (Žin. 2009, Nr. 33-1268).

Law on Construction of the Republic of Lithuania

This Law establishes the essential requirements for all construction works.

91 Normative Technical Construction Documents (NTCD)

These documents support the Law on Construction by establishing specific rules for different types of construction works.

Hygiene standards exist within specific fields.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Lithuanian Housing Strategy

The Lithuanian Housing Strategy (2004) was prepared in compliance with the implementation measures of the Programme of the Government of the Republic of Lithuania for 2001-2004, approved by Resolution No. 1196 of 4th October 2001 (Valstybės žinios, 2001, No. 86-3015). Taking into consideration the existing housing situation in Lithuania and the housing policy principles of the European Union, as well as the Public Long-Term Development Strategy approved by Resolution No. IX-1187 of 12th November 2002 by the Seimas of the Republic of Lithuania (Žin., 2002, No. 113-5029), the Strategy aims for the establishment of the long-term housing policy goals and priorities while seeking for the improvement of the legal acts regulating the housing sector, the management and public communication system, the preparation and implementation of housing development, the renovation and modernisation, and financial and social support programmes and measures. The Strategy's implementation period is until 2020.

Public Long-Term Development Strategy

The Public Long-Term Development Strategy approved by Resolution No. IX-1187 of 12th November 2002 by the Seimas of the Republic of Lithuania (Valstybės žinios, 2002, No. 113-5029). The ultimate goal of the Long-Term Development Strategy of the State is to provide an environment for the development of the country's material and spiritual wealth which can be best defined as a knowledge society, a secure society and a competitive economy. This would allow the creation of the conditions for the development of an individual's choice in all areas - economic, social, cultural and political; and, by investing in education, training and health care, to reinforce the human potential/human capital. Such an approach must apply to all the citizens of the country and provide conditions under which an individual could make use of their abilities to take part in economic and creative activities, politics, public life and recreation.

Programme of refurbishment of multi-family buildings (2005)

Energy principles / policies

Energy laws and strategies

Law on Bio fuel (2000)

The purpose of the Law is to set legal conditions of bio fuel production and use, when implementing the National Energy Strategy of the Republic of Lithuania and the Law of the Republic of Lithuania on Energy.

Law on Energy (2002)

The Law on Energy regulates general energy activities, the basic principles of energy development and management, energy and energy resource efficiency. Specific activities of individual energy systems and of relations between energy enterprises and consumers are established by other laws.

- National Energy Strategy (2007)
- National Energy Efficiency Programme for 2006-2010
- Energy Efficiency Action Plan (2007)
- Renewable Energy (2010)

Specific public and intermediate institutions dealing with energy and climate protection

The Ministry of Energy

The Ministry of Economy

Lithuanian Institute of Energy

National Energy Agency

This deals with drafting the National Energy Strategy, other programmes regarding the improvement of efficient use of energy resources and energy and use of local, renewable and waste energy resources; organisation of their implementation, updating and revision. The preparation of legal, economic and organisational energy efficiency measures for the implementation of national policy.

National Energy Inspectorate

The inspectorate is responsible for the certification of specialists, control of the safety of the energy equipment and participates when preparing legal acts.

Energy efficiency / saving

Legislation on

- Lithuanian Housing Strategy,
- Energy Charter Treaty,
- Law on Energy,
- National Energy Efficiency Programme for 2006-2010,
- Energy Efficiency Action Plan.

Major initiatives include

- Programme to refurbish multi-family buildings,
- Programme to refurbish public buildings,
- Programme to support the development of problematic regions (housing refurbishment is one of the main parts).

Siauliai

Urban planning principles / policies

Planning principles

Strategic Development Plan of Siauliai City for 2007-2016

Prepared and approved documents: new general plan 2009 and special plan for Siauliai

Other special planning documents on specific areas

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

The national planning principles (please see above) are of relevance in the Siauliai target area.

There is a need for a special plan for heat energy selection.

Energy principles / policies

Energy strategies

Energy infrastructure development plan is involved in Siauliai City Master Plan.

Facades' colouring principles are approved by a Siauliai City Municipality Administration Director Order.

Specific public and intermediate institutions dealing with energy and climate protection

Siauliai City Municipality

AB "Šiaulių energija"

Energy efficiency / saving

Šiauliai City Municipality

Housing and Urban Development Agency, Šiauliai Division

Siauliai - Target Area

Urban planning principles/ policies

Documents that are **prepared and approved** are

- New General Plan 2009
- Special Plan for Siauliai.

There are no specific development plans for the residential areas at present.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Energy infrastructure development plan is involved in Siauliai City Master Plan.

Facades colouring principles are approved by a Siauliai City Municipality Administration Director Order.

There is a need for detailed planning for small residential surroundings and a special planning for specific fields.

Energy principles / policies

Energy strategies

According to information submitted by the project partner, there are no specific strategies to date.

Specific public and intermediate institutions dealing with energy and climate protection

Siauliai Region Environmental Protection Department

Municipal Laboratory of Environmental Research

Energy efficiency / saving

According to the information submitted by the project partner, there are no specific strategies to date.

Latvia

Urban planning principles / policies

Planning principles

Introduction

The present spatial planning system in Latvia was developed after regaining independence in 1991. The concept of planning has a narrow interpretation in the laws and regulations of Latvia: only physical planning is examined, but spatial planning still is not defined. (Concept of Spatial Planning System Development, 2009).

Laws and regulations in the field of spatial planning have been adopted by the Saeima and the Cabinet of Ministers.

Laws and regulations abide by the principle of coordinated interests. That is, the spatial plan of a lower level must comply with guidelines of the higher level spatial plan. It means that in the process of the development of local level planning documents, the planning documents of the higher level must be taken into account.

Since 1st January, 2009, the Law on Development Planning System has come into force. It was adopted by the Saeima on 8th May, 2008.

The objective of the law is to determine the development of the planning system and its hierarchy in the state as well as to ensure the coherence of resolutions adopted by the state and local authority institutions. It is stated in the law that development planning documents are developed on national, regional and local levels and development is planned in the long term (up to 25 years), medium term (up to 7 years) and short term (up to 3 years).

According to the hierarchy, the most important development planning document in the state will be Latvia’s long-term development strategy until 2030, which will be the main planning instrument once it has been confirmed by the Saeima. The strategy will determine long-term development priorities and the spatial planning perspective of the state, including spaces, territories and objects of national interest and guidelines of usage.

On the regional level, the long-term development planning document determines the development perspective and spatial planning perspective of the stated territory. In the medium term, the region is developing the development programme, in which measures for the implementation of priorities are indicated, including financial sources for the implementation of measures and medium-term outputs.

The long-term and medium-term planning documents must also be developed on the local level as well as on national and regional level. In the long term, it is in the spatial development plan of the local authority, the development planning document with a strategic section, where the spatial planning perspective is determined, as well as including the future development description of the local authority territory and objectives and priorities are set forward. In addition the spatial development plan includes a section, where the physical use of the territory (zoning) is determined in accordance with the strategic section. This document is called the spatial plan and is adopted as an external regulation by issuing binding documents. The local authority must develop a development programme as a document for the medium-term development planning, where the measures to reach priorities are determined in the spatial plan of the territory.

Principles for the development of an Integrated Development Strategy of Local Government has been prepared on the basis of the following documents:

- The Leipzig Charter on Sustainable European Cities
- CEMAT Resolution N^o1 on Polycentric Development: promoting competitiveness, enhancing cohesion (27.11.2006)
- Commission of the European Communities, Brussels, 11.01.2006, COM (2005) 718 final, “Communication from the Commission to the Council and the European Parliament on Thematic Strategy on the Urban Environment” (SEC(2006) 16)
- Commission staff working paper “Cohesion policy and cities: the urban contribution to growth and jobs in the regions 2005”
- Community Strategic Guidelines 2007-2016 (06.11.2006)
- Council Regulation (EC) No 1083/2006 of 11.07.2006 laying down general provisions on the European Regional Development Fund, the European Social Fund and the Cohesion Fund
- Lisbon Declaration on “Networks for sustainable spatial development of the European continent: Bridges over Europe” (17.11.2006)
- Territorial Agenda of the European Union Towards a More Competitive and Sustainable Europe of Diverse Regions (24./25.05.2007)
- European Landscape Convention, 2000
- European Spatial Development Perspective, Potsdam, 1999
- VASAB 2010 PLUS Spatial Development Action Programme, Conference of Ministers for Spatial Planning and Development, Wismar, 2001

National planning documents are:

- Basic regulations of politics planning system, 2006,
- Basic regulations of the state administration development politics, 2008-2013,
- National development plan 2007-2013,
- Latvia long-term development strategy until 2030,
- Latvia national Lisbon programme 2005-2014,
- Basic regulations of land politics 2008-2014,
- Basic regulations of regional politics, 2004.

Development planning system

The draft Law on Development Planning System¹ provides that planning documents in Latvia are developed in the long term (up to 25 years), medium term (up to 7 years) and short term (up to 2 years).

The draft Law on Development Planning System provides the following hierarchy of planning documents:

Long-term policy planning documents

At the top of the hierarchy of long-term policy planning documents is the Sustainable Development Strategy of Latvia. Regional and local-level long-term policy planning documents and spatial plans are placed below the Sustainable Development Strategy of Latvia in the hierarchy.

¹ Draft Law, second review at the sitting of the Parliament on 13 March, 2008.

Medium-term policy planning documents

At the top of the hierarchy of medium-term policy planning documents is the National Development Plan, which is below the Sustainable Development Strategy of Latvia.

Medium-term planning documents are below the Sustainable Development Strategy of Latvia, the National Development Plan and regional and local-level spatial plans, by mutually coordinating national, regional and local-level medium-term planning documents.

Short-term policy planning documents

Short-term policy planning documents and concept papers are below long-term and medium-term planning documents in the hierarchy.

Internationally-initiated policy planning documents

Internationally-initiated policy planning documents are included in the hierarchy of national planning documents according to the type of policy planning document set in this law.

Lower-level policy planning documents and spatial plans

When developing lower-level policy planning documents and spatial plans, higher-level policy planning documents, spatial plans of the respective level of administration are taken into consideration.

Higher-level policy planning documents

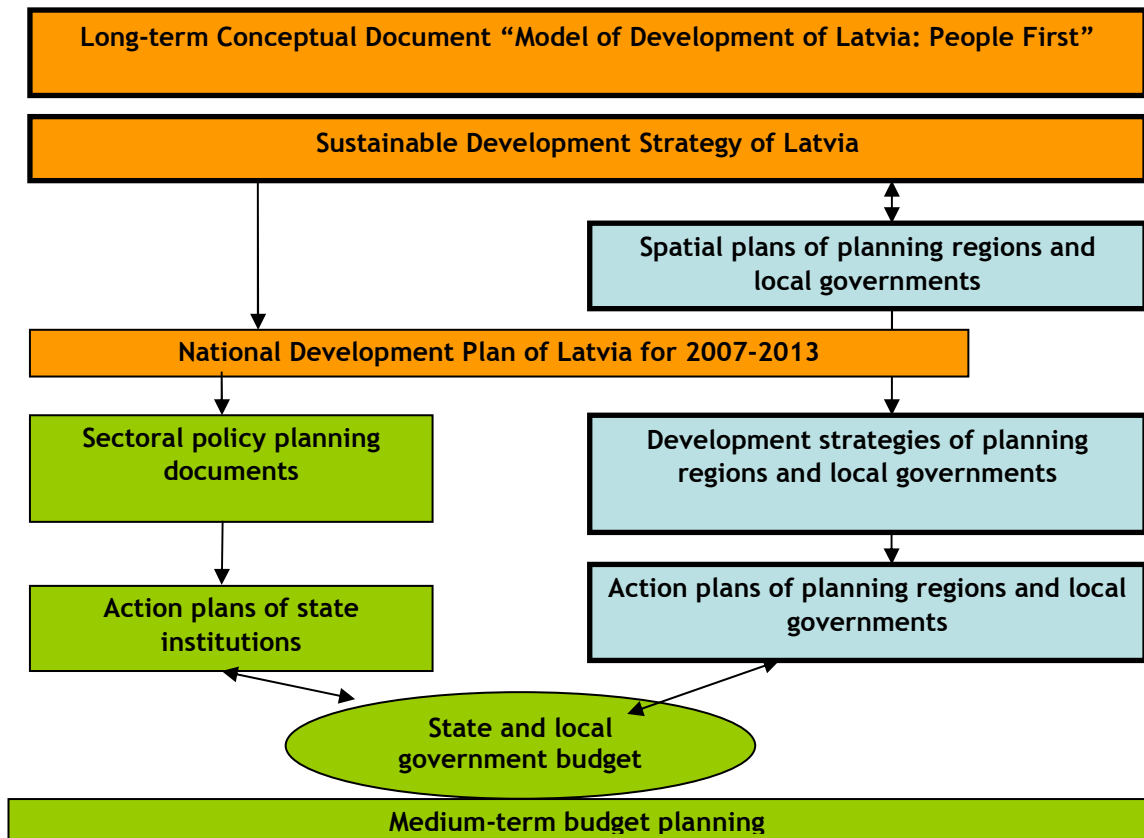
When developing higher-level policy planning documents, the goals, priorities and intended activities included in lower-level planning documents are considered and, if possible, taken into consideration. The relations between, firstly, the contents of regional and local-level planning documents, and, secondly, national-level planning documents, are determined by the State Administration Structure Law.

If the goals, priorities and intended activities of a policy planning document that is to be developed differ from the goals, priorities and intended activities of lower-level policy planning documents in effect, then the policy planning document or legal act approving this document will include the task to accordingly update or repeal the related lower-level policy planning documents.

If the goals set in political guideline documents change, then also the effective policy planning documents of the respective level are reviewed and updated if necessary.

The Spatial Planning Law establishes that when developing planning documents the principle of interest co-ordination is to be observed, which ensures that a spatial plan is developed in accordance with other spatial plans and the plan co-ordinates state, planning region, local government and private interests.

The *planning system* in Latvia is shown in the following diagram.



Local Government Development Strategy and its structure

The Regional Development Law and the draft Law on Development Planning System determine that a local government development strategy (hereinafter -development strategy) is a medium-term planning document (up to 7 years), which sets forth development priorities of the particular local government and includes a set of specific measures.

When developing a development strategy, the following will be taken into consideration:

- The existing development strategy and spatial plan of the planning region, part of which is the particular local government;
- Effective development strategies and long-term development planning documents (including the spatial plan and the long-term development strategy²) of the local governments that are within the area of responsibility of the respective local government. This will be taken into account if the planning documents of the respective planning region do not specify the role of the local government within the region and its area of responsibility;
- Long-term development planning documents in force (including the spatial plan and the long-term development strategy³) of the respective local government.

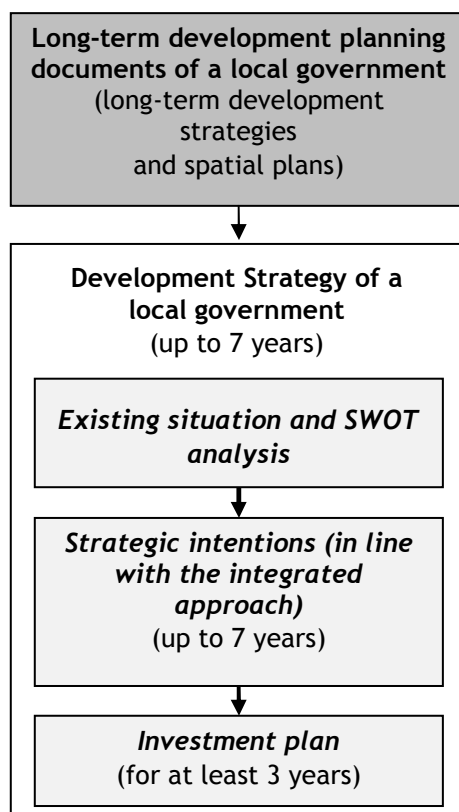
² If the local government has developed such a document.

³ If the local government has developed such a document.

Part 1: Urban Planning Principles and Energy Policies

If it is not possible to resolve conflicting interests of other local governments within the area of responsibility of the respective local government, then these issues are submitted for consideration to the Coordination Council.

A development strategy consists of several sections, which are in line with the goals and priorities defined in long-term development documents of the local government; see Diagram 2⁴.



A development strategy is developed or updated in line with an integrated approach in development planning.

Integrated approach in development planning

A spatial dimension allows for the implementation of measures, coordinating them spatially, taking development problems of a local area into consideration both on the scale of the administrative area and also on a larger scale, i.e. in context with the growth of the surrounding areas. The spatial dimension is reflected on three levels.

Local level

Local level - coordination of measures with the goal to ensure balanced development of separate districts of a particular local administrative area (e.g. by channelling support to development of run down areas, the city district can become more attractive (construction of new buildings, creation of parks, ensuring access to infrastructure for people with disabilities and other measures supporting social inclusion). Thus the standard of living is increased not only in one district of a city but in the whole local administrative area).

⁴ Here only the main parts to be included in development strategies are listed. Local governments can include additional sections if they decide to do so.

Regional level

Regional level - coordination of measures with the goal to ensure the growth of a local administrative area as being the driving force for the development of a region, by showing in which way the growth of the particular city/ town influences development of the surrounding areas⁵, and it contributes to the strengthening of a polycentric structure of the region (e.g., by improving public transportation services, infrastructure, making it accessible for people with disabilities, improving access to the area and more diverse work opportunities and service availability not only for people living in the local administrative area but also for people from outside). At this level, it is essential to also promote partnership projects with the surrounding areas for dealing with common issues (e.g., environmental quality, waste management, water supply.)

National level

National level - contribution of a local government in promoting polycentric and balanced national development and promoting the international recognition of Latvia by developing existing and planned economic/social (functional) ties and cooperation projects with local governments outside the region. For example, if a local government plans to develop or is already developing a particular sector of the economy, then other local governments can use the specific services offered by this local government and in return can offer their services in a different sector.

A thematic dimension allows for the mutual coordination of sectors achieving a situation where support for dealing with the problems of one sector positively influences and contributes to the development of other sectors thus ensuring a complex support mechanism. For example, if parks/green areas are redeveloped then the surfaces of the surrounding streets should also be renovated and street crossings should be adjusted for people with disabilities. This should ensure that the amount of dust from unpaved streets will be prevented from reaching the parks/green areas and to reduce air pollution in recreational areas.

The time dimension ensures that project implementation takes place in the correct order, (e.g., the water mains are reconstructed first and then the pavement afterwards, not the other way round.)

When developing a document in line with the integrated approach, all of the above-mentioned dimensions and also the following principles shall be observed:

Strategic vision - based on a clear vision of development of an area, realistic long-term and medium-term goals and priorities;

Cohesion goals, priorities and activities are mutually coordinated and complement each other;

Coordination (participation and bottom-up approach) - maximum involvement of parties concerned including the public sector, companies, researchers and representatives of other areas who can significantly influence the development of the economy, social and environmental quality. This will enable the identification of the most urgent needs of the various sectors that are responsible for the management of growth, resources and the potential of a particular district. It is also important to involve concerned parties from outside the administrative area of the local government, taking into account the spatial dimension of the integrated approach;

Concentration - support is concentrated towards dealing with the most urgent needs by coordinating the use of funds including public and private investment.

⁵ To invest in the administrative district of the local area thus providing benefits also for the surrounding territories.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Latvia has planning principles which include EE / EER / RES which are based on national and EU standards.

Energy Development Conception for 2007-2013

Energy Development Guidelines for 2007-2016

The Strategy for the Utilization of Renewable Energy Sources 2006-2013

Energy principles/ policies

Energy strategies

National Energy Efficiency Action Plan for 2008-2010,

Energy Development Guidelines for 2007-2016

- to preserve and increase the effective use of renewable energy resources and the production of energy through the process of cogeneration
- to increase the average efficiency level of thermal energy production equipment from 68% to 80-90% by 2016
- to reduce the average loss of thermal energy in thermal energy distribution networks from 18% to 14% by 2016

Main objectives of energy policy in Latvia are

- safety of energy supply (continuity and sufficiency)
- preservation of environmental quality

Specific public and intermediate institutions dealing with energy and climate protection

The Ministry of Environment, Latvian Housing Associations

Energy efficiency / saving

Energy Development Guidelines for 2007-2016

Legislation on energy efficiency improvement in Republic of Latvia:

- Energy Efficiency Law on Buildings (April 16, 2008)
- Law on Management of Residential Buildings designates owners as being responsible for buildings' energy efficiency, (in force from January 1, 2010)

Regulations issued by the Cabinet of Ministers:

- MK 26 "Regulations for Energy Auditors" (January 30, 2009)
- MK 39 "Calculation Method of Buildings Energy Efficiency" (01.03.2009)
- MK 40 "Regulations on Energy Certification of Buildings" (January 30, 2009)

Riga

Urban planning principles / policies

Long Term Strategy of Riga by 2025

Development Plan of Riga 2006 - 2012

is a general aim to improve the living quality in the city of Riga. It is a division of Riga into 59 neighbourhoods.

In particular districts, there are no normative acts concerning urban planning.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Energy Law (2005)

Spatial Plan of Riga 2006 - 2018

Energy principles / policies

Energy efficiency

Energy Efficiency Law on Buildings (April 16, 2008)

Law on Management of Residential Buildings (January 1, 2010)

2 international projects

Energy strategies

Energy Management Agency (IEE)

Manage Energy (EK)

Sustainable Energy Europe

Covenant of Mayors

In 2009, the mayor of Riga signed a Covenant of Mayors agreement with the aim to increase energy efficiency in Riga by at least 20% and to use at least 20% of renewable energy resources till 2020.

According to this agreement, the development of the “Sustainable Energy Action Plan for 2009-2020” for Riga was started:

- One of the main sections is the strategy of energy efficient renovation of buildings in Riga
- The local government of Riga is preparing regulations on financial support for EER up to 30%

Specific public and intermediate institutions dealing with energy and climate protection

Riga Energy Agency

The agency was established in 2007 with 50% EU financial support.

Its main tasks include management and coordination of energy supply, energy efficiency issues in the administrative territory of the city of Riga and providing information for residents.

Energy efficiency / saving

According to the information submitted by the project partner, there are no specific normative acts, development or strategies.

Riga - Target Area

Urban Planning principles / policies

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Long term strategy of Riga till 2025

Riga Development Plan 2006 - 2012

Site Detail Plans

Energy principles / policies

Energy strategies

According to the information submitted by the project partner, there are no specific energy strategies to date.

Specific public and intermediate institutions dealing with energy and climate protection

According to the information submitted by the project partner, there are no specific institutions public and intermediate institutions dealing with energy and climate protection to date.

Energy efficiency / saving

According to the information submitted by the project partner, there are no specific strategies to date.

Jelgava

Urban planning principles / policies

Integrated Development Strategy 2007 -2013 (IDS 2007 - 2013)

All planning documents have an Environmental Report - this is an initial assessment of their environmental impact.

When developing all documents the principle of long-term development is observed.

The graphic part of a Spatial plan which outlines the planned legal use of the territory and regulations for the use of the territory and building regulations. They are issued as binding regulations of the municipality.

Around 2% of the city's territory is covered by local plans for spatial development.

Jelgava Long Term Development Strategy 2007-2020,

Jelgava Spatial Plan for 2009 - 2021(SP 2009 - 2021)

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

IDP 2007-2013

IDP 2007-2013 is to improve energy efficiency and promote public awareness about the importance of energy efficiency activities.

Biomass Cogeneration

Jelgava City Council has approved the construction of a biomass cogeneration facility in Jelgava (EU cofinanced project, 66 million EUR, 2011).

Energy principles / policies

At present, there are no legal acts in Jelgava concerning the energy efficiency of buildings and energy supply systems.

Energy strategies

Covenant of the Mayors

Jelgava city mayor signed the Covenant of the Mayors in 2009.

Development Strategy for the heating supply system of the city of Jelgava

Specific public and intermediate institutions dealing with energy and climate protection

Zemgale Regional Energy Agency

In 2009, Zemgale Regional Energy Agency was founded in partnership with Jēkabpils, Auce, Bauska and Ozolnieki local authorities.

Energy efficiency / saving

Renovation

2 multi-storey residential buildings on 4. līnija 1 and Helmaņa Street 3 were renovated as part of a Germany-Latvia pilot project.

Jelgava - Target Area

Urban planning principles / policies

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Spatial plan for the City of Jelgava 2009-2021 - determines the legal use of territories, including mixed type residential and business building areas and multi-storey residential building areas as well as defines specific requirements for buildings in these territories.

According to the information submitted by the project partner, there are no specific legal regulations or development plans for this district. It is necessary to develop detailed concepts as well as to implement the energy efficiency evaluation of buildings.

Energy Efficiency

Energy strategies

According to the information submitted by the project partner, there are no specific acts or development strategies that are applicable to date.

Specific public and intermediate institutions dealing with energy and climate protection

According to the information submitted by the project partner, there are no specific public and intermediate institutions dealing with energy and climate protection to date.

Energy efficiency / saving

According to the information submitted by the project partner, there are no specific normative acts, development or strategies to date.

Estonia

Urban planning principles / policies

Planning principles

Planning Act

Planning activities in Estonia are regulated by the Planning Act.

The purpose of this Act is to ensure the conditions which take the needs and interests of the widest possible range of members of society into account for balanced and sustainable spatial development, spatial planning, land use and building.

This Act regulates the relationship between the state, local governments and other persons in the preparation of plans.

The strategic environmental assessment resulting from the implementation of the planning policy shall be organised according to the procedure outlined in the Environmental Impact Assessment and Environmental Management System Act.

The types of plan are as follows:

A **national spatial plan**, which is prepared with the aim of defining the prospective development of the territory of the state and the settlement systems located therein in a generalised and strategic manner;

A **county plan**, which is prepared with the aim of defining the prospective development of the territory of a county in a generalised manner and determining the conditions for the development of settlement systems and the location of the principal infrastructure facilities;

A **city master plan**, which is prepared with the aim of determining the general direction and conditions for the development of the territory of a rural municipality or city. It also sets out the foundations for the preparation of detailed plans for areas and in the cases where detailed planning is mandatory and for the establishment of land use provisions and building provisions for areas where detailed planning is not mandatory;

A **detailed plan**, which is prepared with the aim of establishing land use provisions and building provisions for cities and towns and for other areas. It is also prepared for areas where detailed planning is mandatory due to specific circumstances such as a new construction project.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

According to the information submitted by the project partner, there are no specific planning principles which include EE / EER / RES requirements to date.

Energy principles / policies

Energy strategies

The state is following EU directives.

Specific public and intermediate institutions dealing with energy and climate protection

The Energy and Climate Agency was established at the end of 2009.

Energy efficiency/ saving

Covenant of Mayors

Three towns in Estonia are members of the Covenant of Mayors.

A long-term energy programme exists on state level.

Rakvere - Target Area

Urban planning principles / strategies

Planning principles

A **city master plan** was established by Rakvere municipality one year ago. It includes a development strategy for Rakvere, for example mentioning the need for the development of green spaces and living environment including the target area; however it does not define a specific action plan for implementation. The city master plan is legally binding for both citizens, governmental and public authorities.

The target area does not, to date, have any **detailed plans**.

There is insufficient urban planning for residential areas and there is a clear need for well planned development of the living environment in urban areas.

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

General planning, including thematic plans until 2030 have been agreed by the city council.

Energy principles / strategies

Energy strategies

Covenant of Mayors

Rakvere city mayor signed the Covenant of Mayors. The Sustainable Energy Action Plan in order to achieve the goals set forth by the Covenant of Mayors. The plan explains how Rakvere intends to reach its objectives in terms of reduction of CO₂ emissions for 2020 (21% by 2020). Housing is however not included in the Sustainable Energy Action Plan, largely because it is owned by private owners. There is a huge potential for CO₂ to be reduced by building renovation but it is hard for municipalities to control due to the private ownership basis.

Long-term strategic plans

There are no long-term strategic plans for housing and its social and economic aspects in Estonia. There is a short-term strategic plan in Estonia however it is very general in its scope and ends in 2013.

Specific public and intermediate institutions dealing with energy and climate protection

The Union of Flat Owners Associations deals locally with energy saving advice. The city has provided support in the form of energy audits.

Energy efficiency / saving

In 2007 an Analysis of the Energy Consumption of Rakvere's Typical Dwellings was published which assessed various methods of energy saving.

The city has also developed energy databases for its own buildings and has an overview on the level of consumption. The Rakvere Music School has been renovated, which is a good practice example.

There is currently a target of 21% until 2020 in public buildings and apartment buildings. There is a potential to achieve around 20% savings in public buildings and apartment buildings even more generally.

Belarus

Urban planning principles / policies

Planning principles

State regulation on the development of city settlements is passed, in line with the laws of Belarus and other state regulations enacted by corresponding central state bodies.

Local management and self-management bodies develop and implement town-planning projects from general planning. These bodies are urged to interrelate decisions on social, economic and spatial development with the preservation of an ecologically viable environment. The major standard document defining the basic requirements of the layout and building of cities, building norms and rules of town planning is called “The layout and building of settlements”. The official design document forms the basis for the administration to develop the city and its functional zones. The development, coordination and production are carried out in strict conformity with the current legislation in the field of town planning. This includes the Law on architecture and town planning as well as statutory acts in the field of territorial planning.

At the present stage, the basic direction of state policy in the field of territorial development and town planning is generated under the conditions of a developing market economy. It focuses on maintaining the sustainable development of cities, rural settlements, transport systems, technical and social infrastructure.

In Belarus, the development of architecture is showing positive tendencies, such as an increase in the role of town planning, new principles of spatial planning and an integrated approach to the realisation of town planning.

The most complex approach to the formation of a policy for town planning and development is planned as part of the State Scheme for Complex Territorial Organisation in Belarus, of which substantive provisions have been approved by the Republic’s Governmental Order of February 2000. According to the Law "on Architecture and Town Planning in Belarus" the State Scheme for Complex Territorial Organisation is the main town planning document and it is aimed primarily at giving the State a dominant role in planning the development of settlements and territories. In order to protect the environment, maintain social justice and stimulate and support local territorial development initiatives, territorial conditions for effective competitive social and economic activity must be created. The need of Belarus’ transition to the principles of sustainable development and the creation of a highly effective socially-focused market economy were fully considered during the development of the scheme.

Since 2001, the Ministry of Architecture has monitored the implementation of the substantive provisions of the State Scheme for Complex Territorial Organisation, allowing processes that occur in the development of settlements and territories to be tracked using indicators of sustainable development. The results from the monitoring have allowed concrete conclusions to be formulated and the identification of the most effective directions of the implementation of the substantive provisions of the State Scheme for Complex Territorial Organisation. The results also show the accuracy of the indicators for measuring the short-term development of the Republic (up to 2000).

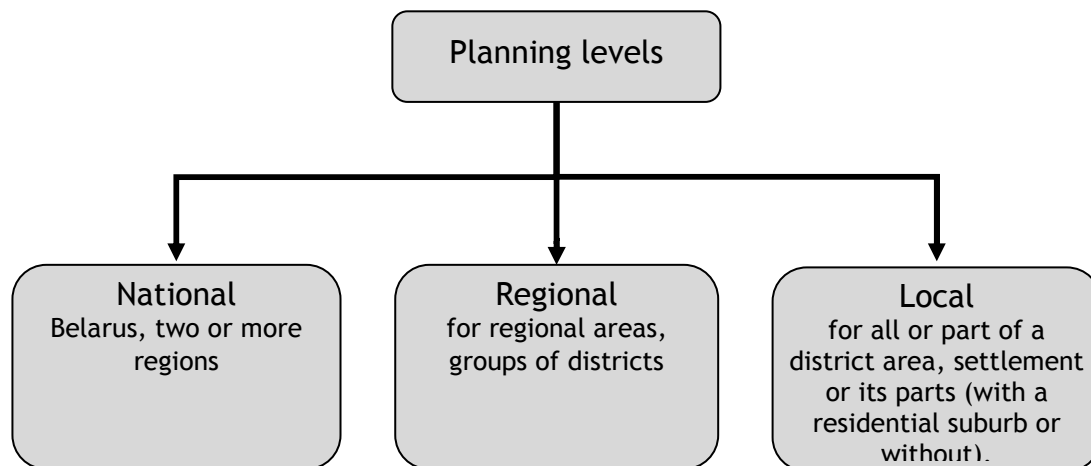
State regulation in the field of architectural, town-planning and building activity

State regulation in the field of architecture, town planning and construction is carried out by the President of Belarus, the Council of Ministers of Belarus, the Ministry of Architecture and Building of Belarus, local executive and administrative bodies, Local

Part 1: Urban Planning Principles and Energy Policies

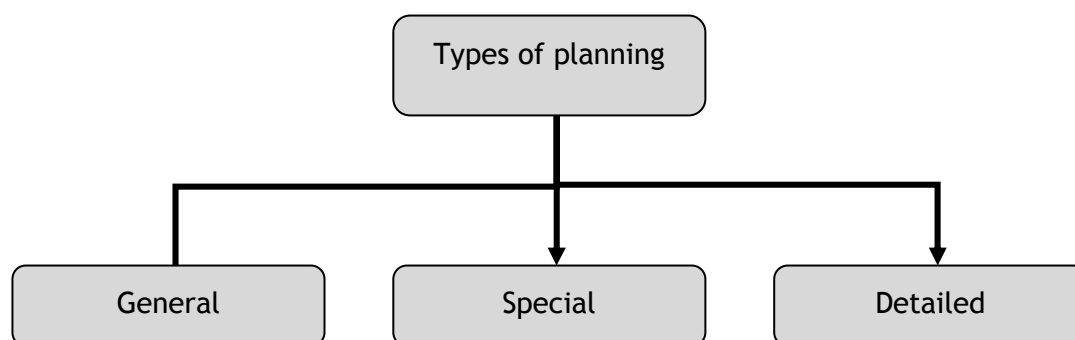
Councils of Deputies and other state structures within them. Their authority is designated in accordance to legislation.

Levels and Types of Town Planning



Types of planning

There are three types of planning in Belarus; “general”, “special” and “detailed”.



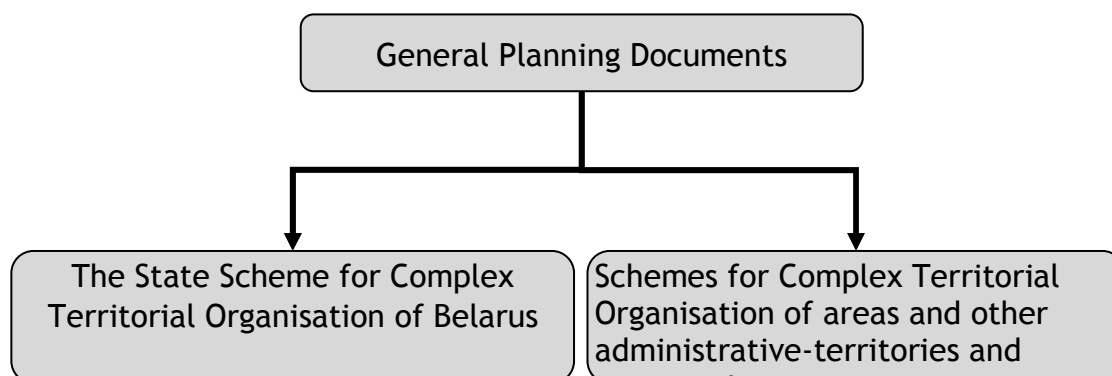
General planning can be described as complex urban construction planning aimed at defining priorities, major aims and strategies of development, establishment of settlements, utilization of territories and introducing restrictions for this utilization, as well as the development of social, industrial, transport and engineering infrastructure.

Special planning can be defined as urban construction planning aimed at the implementation of urban construction projects from general and detailed planning. It is implemented by developing schemes, forecasts, programmes, techno-economic substantiations of development and regulating of the establishment of settlements, of

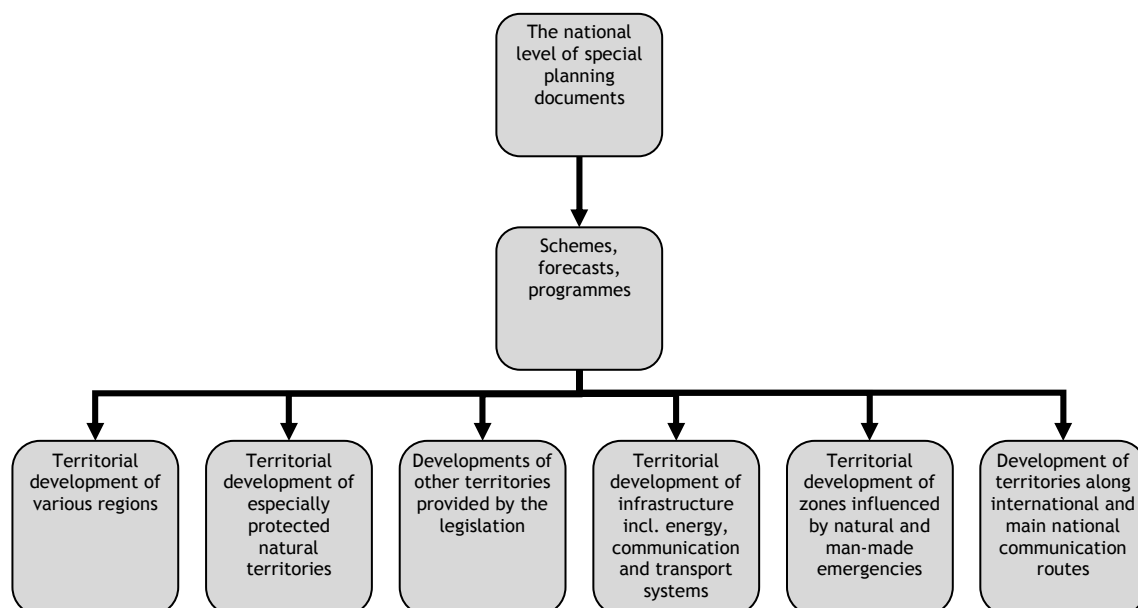
Part 1: Urban Planning Principles and Energy Policies

territory utilization, as well as the development of social, industrial, transport and engineering infrastructure.

Detailed planning is urban construction planning at the local level of developed and undeveloped sites, their parts (districts and other elements of planning structure).

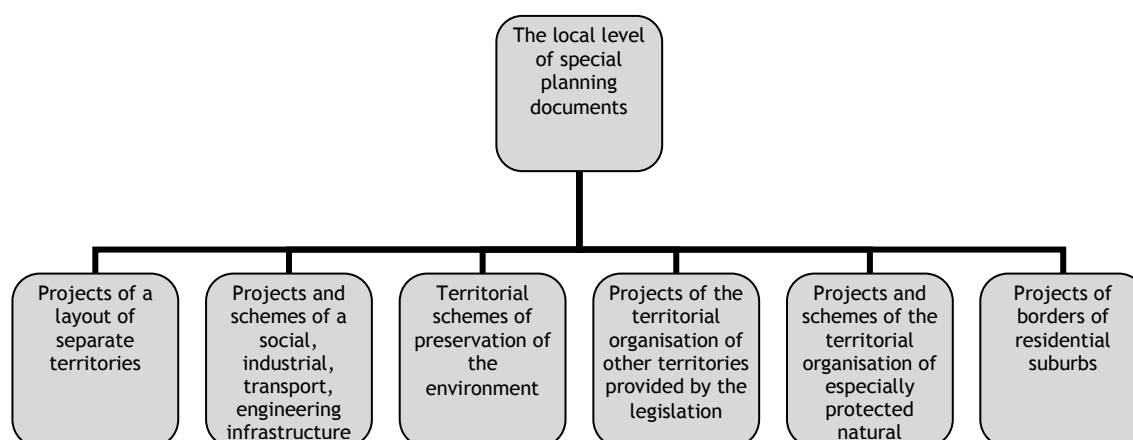


The national level of special planning documents

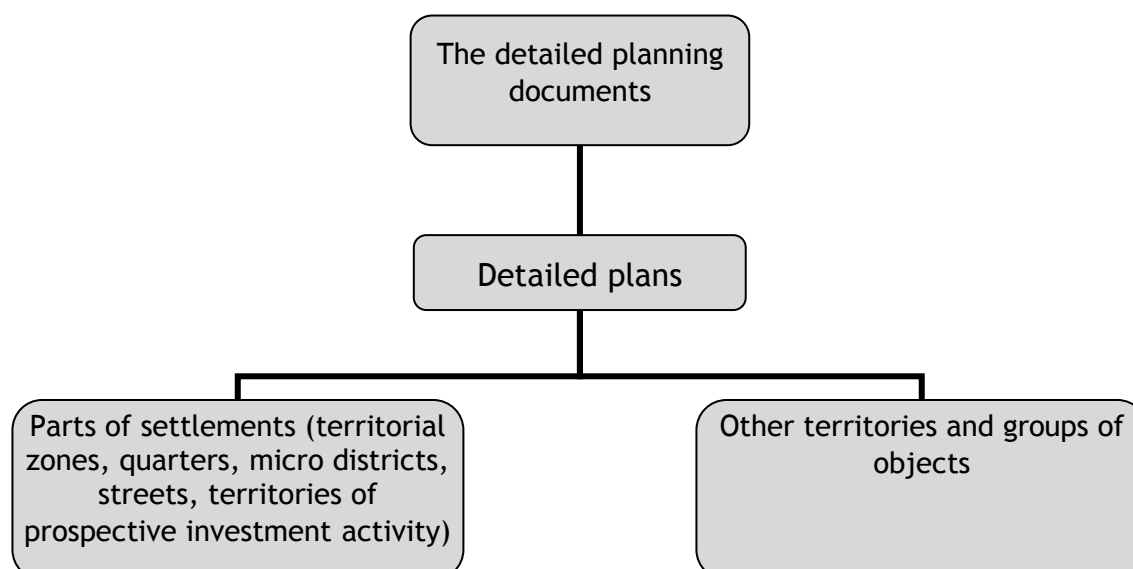


Part 1: Urban Planning Principles and Energy Policies

The local level of special planning documents

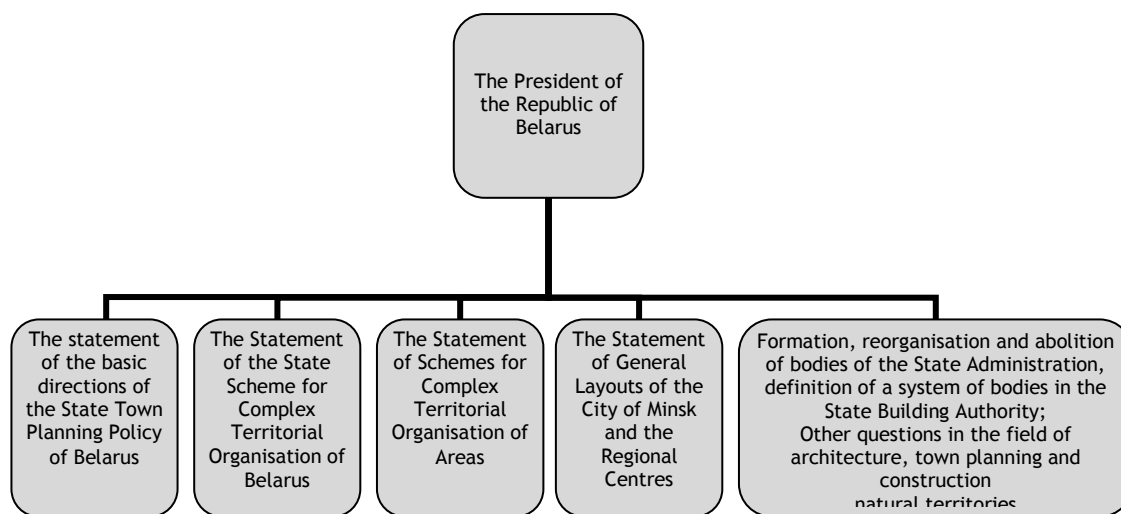


The detailed planning documents

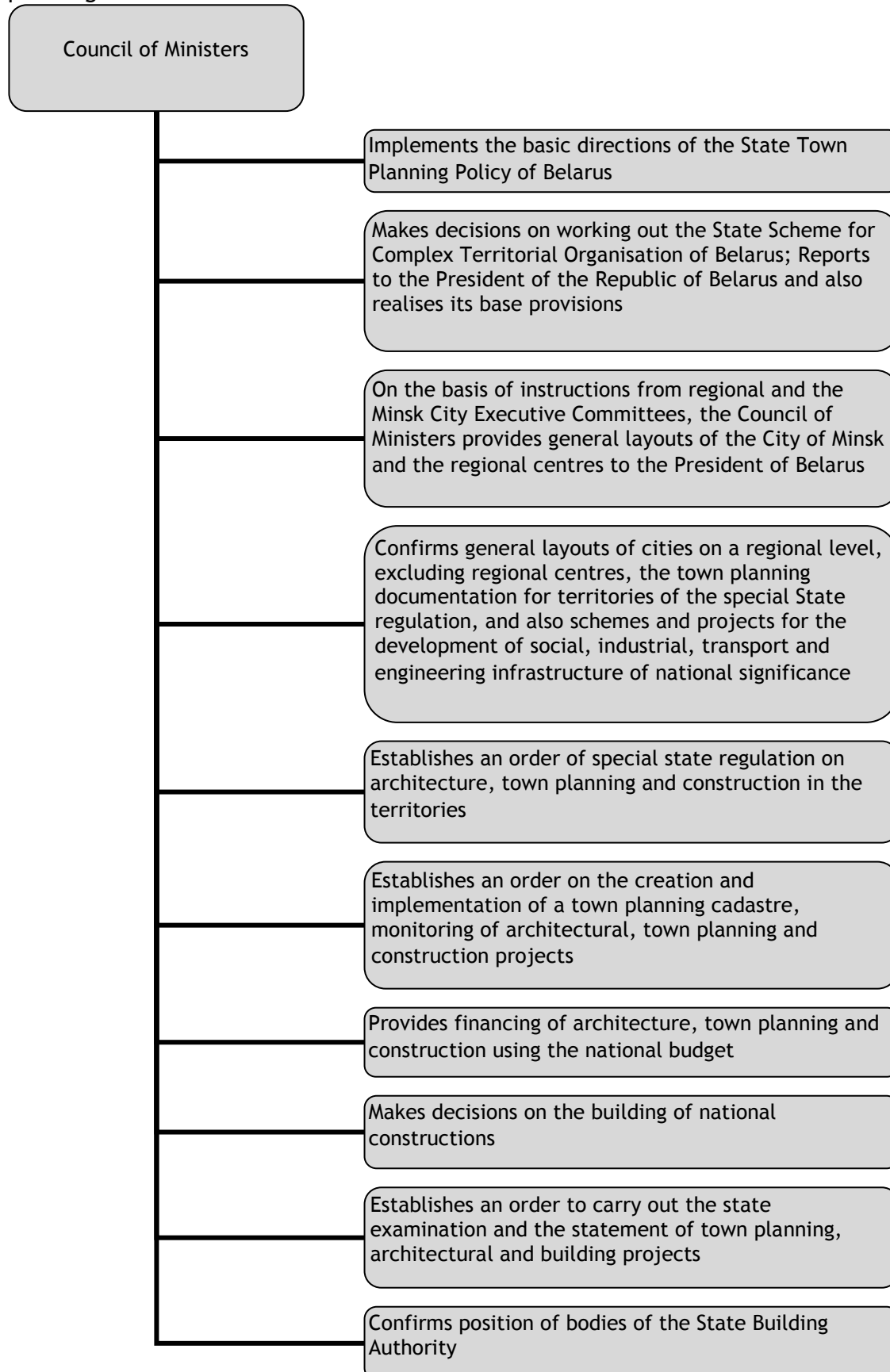


Part 1: Urban Planning Principles and Energy Policies

The competence of the President of the Republic of Belarus in the area of architecture, town planning and construction



The competence of the Council of Ministers of Belarus in the areas of architecture, town planning and construction



Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

- The decision of Belarus Council of Ministers from 7th June 2006, No720 "on the Programme for the Development of Housing and Communal Services in Belarus for 2006 - 2010"
- EER of the infrastructure of housing and communal services acts as one of primary factors in decreasing current expenses, improving the quality of already existing housing and municipal services, improving reliability, stability, the functioning and the profitability.
- The State Complex Programme for the Development of Small and Medium Settlements for 2007-2010, as stated by Belarusian President on 7th June 2007, No 265.

The *basic aims* of work in this area for 2006-2010 are:

- Introduction of less power-intensive equipment and progressive technologies,
- Completion of the installation of water, heat, gas meters, regulation of thermal energy both from sources and consumers,
- Continuation of the modernisation and reconstruction of municipal heating systems including adapting them to use natural gas and local fuel sources, ceasing to use uneconomical boilers and basement gas heating systems,
- Installing insulation around thermal chambers, networks and supply pipes giving priority to construction or renovation projects, using pre-insulated pipes and the introduction of individual heating units organised into groups,
- Modernisation and expansion of the capacity of buildings to provide clean and potable water and also the water supply and sewerage system;
- Supply all settlements with waste processing facilities, store solid household waste over a period of time and provide suitable sites for storage. Construction of municipal waste sorting and processing facilities by 2010 in Minsk and the regional centres with the application of a system of waste compression and other technologies.
- The infrastructure will be modernised keeping economic demands, new developments in science and technology and a supply system in balance with the needs of municipalities.
- With a view to improving living conditions and achieving an increase in the available housing, carrying out improvements and repairs, modernisation and development of available housing will be considered as a priority. Reforming the mechanism to finance the repair works will allow the stimulation of interest of citizens through receiving the corresponding payments to accelerate carrying out these works. This will result in nationally-available housing in the appropriate technical and sanitary condition.

Energy principles / policies

Energy strategies

Belarus has a policy to develop alternative energy sources based on local fuel and renewable energy. It is planned that private companies and investors in alternative energy sources will be eligible for tax subsidies.

On 25th August 2005, the President of the Republic of Belarus adopted Decree No. 399 ‘The State Comprehensive Programme of Upgrading Basic Production Assets of the Belarusian Energy System, Energy Conservation and Broader Usage of the Republic’s Indigenous Fuel and Energy Resources for 2006-2010’ - hereafter referred to as the Belarusian **State Energy Programme**. The Programme’s primary objective is the identification and implementation of measures and the required investment to ensure:

- the renovation of energy supply infrastructure,
- the reliable, efficient and environment friendly supply of energy to the economy and people and the
- national energy security.

A range of measures will be implemented to achieve these targets including:

- Centralized management of all stages of production, transportation and utilization of energy carriers,
- State regulation of electricity, heat tariffs, and fuel prices,
- Renovation and development of generating sources, electricity and heat networks,
- A two-stage process involving the stabilization of the energy system’s assets to slow down aging followed by ongoing renovation,
- The implementation of state, industrial and regional programmes of energy conservation and an economic mechanism that stimulates the application of energy-efficient technologies and equipment to all branches of the economy and society,
- Lower costs for the supply (extraction, preparation), transportation and consumption of all types of fuel, heat and electricity,
- The gradual diversification of suppliers of different types of fuel to Belarus,
- The uptake of economically viable amounts of local fuels and renewables.

A List of legal acts of the Republic of Belarus concerning energy saving

- Resolution of the Council of Ministers of the Republic of Belarus from 23rd February 2006, No 255 “On the measures of implementation in 2006 of the State Complex Programme of modernisation of the main industrial funds of Belarussian energy system, energy saving and extension of the share of utilization of national fuel energy resources in the Republic for 2006-2010”
- Resolution of the Council of Ministers of the Republic of Belarus from 2nd February 2006 No 137 “On the National Programme of Energy Saving for 2006-2010”
- Resolution of the Council of Ministers of the Republic of Belarus from 18th November 2005 No 1290 “On the approval of the plan for the main measures for the realization of the concept of energy security and extension of energy independence of the Republic of Belarus”.
- Resolution of the Council of Ministers of the Republic of Belarus from 17th May 2005 No 1680 “On the approval of the list of priority trends of fundamental and applied scientific research in the Republic of Belarus for 2006-2010”

Part 1: Urban Planning Principles and Energy Policies

- Resolution of the Council of Ministers of the Republic of Belarus from 30th December 2004 No 1680 “On the approval of the target programme of supply in the Republic to supply not less than 25% of the production capacity of electric and heat energy from local sources and renewable sources of fuel up to 2012”
- Resolution of the Council of Ministers of the Republic of Belarus from 18th October 2004 No 1301 “On the approval of regulations concerning the conveying of expertise to programmes and measures on energy saving.”
- Resolution of the Ministry of Economy of the Republic of Belarus, the Ministry of Energy of the Republic of Belarus, the Committee on Energy Efficiency of the Council of Ministers of the Republic of Belarus from 24th December 2003 No 252/45/7 “On the approval of instructions on defining the efficiency of utilization of funding aimed at the implementation of energy efficient measures”
- Resolution of the Council of Ministers of the Republic of Belarus from 11th November 1998 No 1731 “On the approval of regulations for the development and implementation of National sectoral and regional programmes on energy saving” (under the Resolutions of the Council of Ministers from 17th March 2004 No 302 and from 16th March 2006 № 353).
- Law of the Republic of Belarus from 15th July 1998 No1731 “On energy saving” (under the Law of the Republic of Belarus from 20th July 2006 No 162-3)

Specific public and intermediate institutions dealing with energy and climate protection

Institutions for energy saving and energy management

- State Committee on Energy Saving and Energy Supervision
- Regional and Minsk City Administrations for the Supervision of the Rational Utilization of Fuel and Energy Resources
- Coordinating Interdepartmental Council on Energy Efficiency and Effective Utilization of Local Fuel Sources
- Interdepartmental Commission on Energy Saving and corresponding commissions in the regions and in the city of Minsk
- Expert Council of the State Committee on Energy Saving and Energy Supervision
- State Enterprises “Belenergoberezhnie” and “Belinvestenergoberezhnie”

Energy efficiency / saving

Belarus is actively pursuing a consistent policy aimed at using energy resources efficiently; for example, the energy intensity of its GDP, i.e. the amount of power consumed for making products, fell by 25.5% between 2001 and 2005. The Government intends to cut energy intensity in the GDP by 31% by 2010 and by 50% by 2015. To achieve this aim, the Government plans to impose obligatory indicators for power saving on the private sector and to introduce measures to encourage managers to take responsibility for efficient consumption of energy resources.

In accordance with the State programme, the following improvements within Belenergo are scheduled between 2006 and 2010.

Upgrading power equipment at existing large power plants: Lukolm and Bereza power plant, Minsk CHP-2, CHP-3, and CHP-5, Novopolotsk CHP plant, Mogilev CHP-2 plant, Grodno CHP-2 plant and others.

Part 1: Urban Planning Principles and Energy Policies

Putting mini-CHP plants into operation at district heating systems in the cities of Molodechno, Mogilev, Borisov, Gomel and Zhlobin, and at the Vostochnaya communal heating system in Vitebsk, Severnaya communal heating system at Grodno and others.

A number of major energy efficiency projects will be established in Belarus by enterprises responsible to Belneftekhim (Belarusian State Concern for Oil and Chemistry), the Ministry of Architecture and Construction, Ministry of Industry, Ministry of Agriculture, Ministry of Housing and Communal Services, and others. The Government issued a resolution (No. 253) on 28th February 2007 supporting a number of cogeneration projects.

In order to expand the use of local fuels, the Programme envisages building mini-CHP plants and separate units running on biomass (wood, wood waste, peat) at communal heating systems in Osipovichi and Vileika, in the cities of Vitebsk, Rogachev, Luninets, at Pinsk, Zhodino and Bobruisk CHP plants and others. Use of hydropower resources is one way of solving the problem of the dependence on imports. Small hydroelectric power stations are planned including Grodno (17 MW), Dnepro (5 MW), Zel'va (0.2 MW), Braslav (0.3 MW) and Pogost (0.27 MW). Turbine expanders will be constructed at the Lukoml and Gomel CHP plants.

Grodno

Urban planning principles / policies

Planning principles

Planning in the target area of Grodno is carried out in accordance with:

- The State Complex Programme for the Development of Small and Medium Settlements for 2007-2010, stated by the President of the Republic of Belarus from 7th June, 2007 No 265 and other state laws;
- The Complex Programme for Grodno region including development programmes and indicators for 30 small cities and settlements.
- The development of small cities and settlements is under the control of the regional and district Council of Deputies. Issues in this field are also sometimes considered at sessions of presidiums and the permanent commissions.

There is a development plan for the city and a general construction plan for each town.

Renewal initiatives are carried out in accordance with the housing department plan, taking into consideration the age and state of dilapidation of the structures within regional and national programmes.

Buildings with private ownership are repaired at the cost of their owners.

The main aims of planning in Grodno are:

- The development of tourism
- Providing accommodation for the inhabitants of the city, including multi-apartment buildings
- Attracting investments to the Grodno region
- Restoring monuments and architecturally-significant buildings
- Ensuring a good living standard and improving the environment.

Part 1: Urban Planning Principles and Energy Policies

Planning principles which include Energy efficiency / Energy efficient refurbishment / Renewable energy sources requirements

Presidential Instruction No 3

Presidential Instruction No 3 "Economy and Safety - Main Factors for Economic State Safety" and other energy efficiency laws exists.

State Complex Programme for the Development of Small and Medium Settlements

The State Complex Programme for the Development of Small and Medium Settlements for 2007-2010 is stated by the President of the Republic of Belarus from 7th June, 2007 No 265.

Programme for the Development of Housing and Communal Services

The decision of Belarus Council of Ministers from 7th June 2006, No 720 "on the Programme for the Development of Housing and Communal Services in Belarus for 2006 - 2010".

Major state and sectoral programmes

- Housing and communal service organisations use the following major state and sectoral programmes Water supply and wastewater "Pure water", 2006 - 2010,
- Energy saving and an increase in the use of local kinds of fuel, production of waste, secondary, nonconventional and renewable sources,
- Municipal waste,
- land use planning and the development of settlements.

Energy principles / policies

Energy strategies

Grodno region consumes 12% of all energy consumption in the Republic of Belarus.

The technology in the industrial sector is old and has a high level of energy consumption. The main task is to modernise this technology in all industrial enterprises.

It is important to implement gas, steam gas, gas turbine and gas piston technologies and communal heating systems with modernised mini heat plants which should lead to an increase in the electric power produced and reduce fuel consumption.

The construction of cogeneration heating plants is also planned.

The strategy outlines the need to reduce using imported fuel and in particular domestic fuel oil.

It is planned to continue implementing energy efficiency projects and to provide not less than 25% of the volume of power and heat energy produced by local fuel sources and renewable sources by 2012.

A coal station is planned to be built in one district which will correspond to global environmental requirements.

Specific public and intermediate institutions dealing with energy and climate protection

There are regional departments and enterprises that are a part of the Energy Efficiency Department

- Energy Efficiency Department of the State Committee of Standardisation ,
- National utility enterprise "GRODNOENERGOSBEREZHENIE";
- Energy Efficiency Department of Lida Executive Committee;
- The Grodno Regional Committee of Natural Resources and Environmental Protection;
- Local natural resources and environmental protection inspectorate.

Energy efficiency / saving

In accordance with Resolution of the Council of Ministers of the Republic of Belarus from 2nd February 2006 No 137 “On the National Programme of Energy Saving for 2006-2010”.

At the present time, the housing stock has an energy consumption which is 1.5-2 times higher than in developed countries.

There are some measures for implementing the aims of energy efficiency:

- Installation of energy effective equipment, devices and materials: (heating, gas and water meters),
- The substitution of heat supplying networks using preisolated pipes;
- Increase of the overall effectiveness of heat distribution networks, optimisation of heat supply schemes, transfer of the thermal loads from communal heating systems to thermal power stations, decentralisation of the heat supply with the decrease of long-distance heating,
- Switching over of the communal heating systems to local fuel types (sawdust, wood, peat),
- Introduction of equipment for generating electricity,
- Heat modernization of the housing stock,
- Housing refurbishment,
- Energy-efficient lighting systems (introduction of systems for automatic light management),
- Introduction of electric vehicles.

PART 2 of the Compendium

Report on financing sources for EER and integrated urban development measures

Ministry of Science,
• Economic Affairs
and Transport



Responsible Project Partner: WP-leader (PP 6) Ministry of Science, Economic Affairs and Transport Schleswig-Holstein

Elaborated by: Energy Agency Investitionsbank Schleswig-Holstein



Introduction

The project partners jointly analyzed existing approaches in the countries and presented applicable integrated urban development strategies within three work packages (WPs) - “Urban Development”, “Energy” and “Financial Instruments”.

The three WPs are interrelated. For the target areas the partners developed and partly implemented specific urban development concepts, to be transferred as standardised transnational outputs to other urban districts in the Baltic Sea Region. The urban strategies and concepts include the preparation of complex Energy efficient refurbishment (EER) measures for buildings and the energy supply infrastructure.

WP 5 - Improved Affordability of Investments

The overall aim of this WP is to improve the mechanisms for providing financial support for integrated urban rehabilitation measures. Based on an analysis of the existing funding opportunities, appropriate funding instruments will be developed that lead to an improved affordability of investments in EER of residential buildings and integrated urban development measures. Special attention will be paid to EU Structural Funds and the setting up of revolving funds.

The project partners assigned to the coordination team of WP5 are the Ministry of Science, Economics and Transport of Schleswig-Holstein and Credit and Export Guarantee Fund KredEx, Estonia.

Update of BEEN-Results

Urb.Energy is a follow up project of BEEN (Baltic Energy Efficiency Network for the Building Stock 2005 - 2007). The BEEN Project had the overall goal of developing strategies and instruments that promote and enable the energy efficient refurbishment of the prefabricated multi-storey building stock in the Baltic Sea Region.

One goal of the project was to develop financing strategies and instruments that are crucial for implementing renovation to improve the energy efficiency of the building stock.

On the basis of the results from the BEEN project, the development in this field in the target areas were requested and summarized. The Urb.Energy project covers a broader scale of subjects than BEEN. The additional data concerning the existing support programs have been requested and integrated into this report as well.

Riga / Latvia

Update of BEEN-Results

In Latvia, there was a loan programme called the “Energy-Saving Pilot Programme”, which offered reduced interest rates and supported measures exclusively intended to save energy. It began in 2003 and ended in 2005. Its financial volume was € 1.6m and provided support for 466 flats.

Since 2001, a programme has been in place that issues state guarantees as a bank security for loans. In that period of time, approximately 2000 flats have been supported with € 1.6m.

Latvia is using € 29.9m of EU funds (ERDF) in the period between 2007 and 2013 which will be around 1.3 %. The maximum percentage that could be used would be 3.0 %.

Additional Support Programmes

There are some further programmes that are relevant for the aims of the project:

- In the 2009 budget of the city of Riga, there are 2.8 million lats (4.0 million €) provided for the renovation of educational institutions (schools and kindergartens);
- From 2009, the “*Climate Changes Financial Instrument*” which follows on from the law “*On participation of the Republic of Latvia in the Flexible Mechanisms of the Kyoto Protocol*” (from greenhouse gas emission quotas trading, which are at state disposal) is available. The total financial volume for 2009 was 17.57m lats (€ 25.1 m). The grant rate was 85%. The available amount for the municipality of Riga was 4 m lats (€ 5.7 m) for the renovation of schools.
- From 2009, the EU Structural Funds support was available for the renovation of residential buildings. The total amount for 2009 was 16 m lats (€ 22,9 m). Riga has submitted 6 multi-apartment buildings for renovation. The grant rate was 50%.

The EU Structural Funds support has been available to increase the efficiency of CHP (*combined heat and power unit*) since 2009. The total amount of support will be about 40 million lats (57.2 million €). The requested sum of the first call in 2009 was 16 million lats (22.9 million €). The grant rate is from 40 to 50% of the investment. Riga has submitted an application for the replacement of the existing heating grid.

From 2009, the EU Structural Funds support is available for the development of cogeneration systems. The total sum of this programme is about 17 million lats (24.3 million €). The grant rate amounts up to 50% of the investment. Riga has submitted an application for one project (approx. 4 million lats ≈ 5.7 million €).

The Cabinet of Ministers issued a regulation on the mandatory power procurement for electricity networks from combined heat and power stations (No.221 from 10 March, 2009) which control the power feed from CHP.

Concerning the support of urban development or house building, the municipality of Riga manages to construct new residential rental houses by using bank loans (Municipal Ltd. "Rigas pilsētbuivnieks").

In the field of social housing, the municipality of Riga regularly finances the development of residential constructions for citizens with low income. 13 social houses have already been supported by this programme.

The EU Structural Funds support has been available for the renovation of social housing since 2009. The amount for the first call was approximately 7 million lats (10 million €). The grant rate is up to 75%. Riga participates in this subsidy program.

Vilnius / Lithuania

Update of BEEN-Results

Lithuania is developing a new support programme for refurbishment measures to save energy. It will be a subsidy programme financially supported through the JESSICA initiative (*Joint European Support for Sustainable Investment in City Areas*). It will be possible to receive 15 - 50% of the investment costs as a grant. The actual support amount will depend on the rate of energy savings that will be achieved by the refurbishment measures. The budget from this programme will comprise of € 137.5m from Structural Funds and € 65m from the states budget.

The Energy Efficiency Pilot Project (started in 1996) ended in 2004. The "Modernization of Multi-family Houses Programme" began subsequently (2004 - 2020). For 2009 and 2010, a total investment sum of about € 49m is expected thanks to this programme. That means an average refurbishment investment of € 8,600 and an average support amount of € 4,300 per flat.

There are also urban support programmes with a financial volume of about € 26m. The time period of these programmes was between 2005 and 2009 and they supported 16,230 flats which amounts to a total of 309 fully implemented projects.

Additional Support Programmes

The law on heating economy is the main piece of legislation concerning the feed-in of power from CHP from conventional or renewable energy sources. In general it is regulated by a second piece of legislation and contains rules on the provision of heating.

There are no financial instruments for central urban development in Vilnius/Lithuania. The local municipalities are responsible for developing urban development concepts. They were responsible for the preparation of general and detailed plans which are funded from European Union Structural Funds.

Low income single citizens and families are supported by the law on social support. According to this law, heating and hot water expenses are covered for those households. This programme likewise offers funding for residents of multi-family buildings which participate in the Modernization Programme of Multi-family Buildings. The initial financial contribution covers a loan, interest rates and insurance fees of the loan.

Piaseczno / Poland

Update of BEEN-Results

The Thermo-Refurbishment-Programme which supports energy efficiency measures is still in place in Piaseczno. There are two options to benefit from this programme:

- The implementation of energy-saving measures providing at least 25% energy savings based on an energy audit or
- The implementation of measures solely for refurbishment in multi-family buildings that were in use before 14 July 1961 with at least 10% energy savings calculated in refurbishment audit.

The Thermo-Refurbishment-Programme began in 1998. The requirements for the programme are:

- A 25% reduction of the capital of the loan for at least 20% of the equity capital and
- Energy savings of at least 25%.

On the 19 March 2009 the programme was expanded to buildings that were in use before 14 July 1961. In the case of thermal refurbishment, it is possible to get a 20% reduction of the loan capital but at most 16% of the investment cost and not more than 2 years of cost savings for heating. Measures solely for refurbishment with at least 10% energy savings can receive a 20% reduction of the capital of the loan, but not more than 15% of the actual investment costs.

In the period between 1999 and June 2009, the capital volume of the programme was about € 177m and supported measures for 398,000 flats in 13,500 buildings. The average funding per flat amounts to € 445 which means an investment of about € 2,000. The total investment sum of all measures amounts to € 796m.

In the period from 2007, Poland has used approximately € 243.1m from EU funds (ERDF) which means 1.47% of a possible maximum percentage of 3.0%.

There is a subsidy programme for low income households that supports up to 50% of the housing costs depending on the income of the applicant.

Additional Support Programmes

In addition to the support options mentioned above, there are also loans with subsidised interest rates available (at least 3.5% per annum), which are provided by the *Voivodeship Funds of Environment Protection*. These loans can be used for financing EER measures, including the implementation of RES. There are also subsidies available from ERDF via the *Regional Operational Programmes* for the period 2007-2013, where the EER measures in residential buildings are eligible, but through the implementation of the "local development plans" developed by municipalities only.

In addition to this, there are loans available with subsidised interest rates (at least 3.5% per annum), which are provided by the *Masovian Voivodeship Fund of Environment Protection*. These loans can be used for financing EER measures including the implementation of RES, and the modernization of heating devices as well as district heating systems. The loan can be extended for up to 90% of the investment costs, for 15

years with 18 month grace period. The ERDF funds in the Masovian Voievodship are available for RES and measures for the revitalization of city areas.

The CHP market in Poland is regulated through a certification system. The CHP producers sell the power to the grid based on its market price and have the right to issue the certificates for power produced by CHP (red certificate) or by RES (green certificate). These certificates are traded between different public utilities providers (power distribution companies), which are obliged by law to purchase a certain proportion of power each year from RES and from cogeneration.

Poland does not have any specific financing instruments to support urban development (excluding the ERDF funds available via Regional Operational Programmes mentioned above). There are only financing instruments for the support of house building in the form of a grant on the interest of the loan (interest rates should be 5% per annum at the most). This can be extended to up to 70% of the investment costs for long credit periods. The beneficiaries can be municipalities, housing co-operatives and TBS (social housing societies).

In addition to these programmes, there are different options for the funding of low income households. Social housing, in narrow terms (dwellings for low-income families only), is defined in the *law on security of tenants, municipal housing stock* from 2001. The housing stock in focus belongs to municipalities and is characterised by rents which are limited to 50 % of the average rent of the municipal housing stock. Individuals eligible for social housing include those who are in poverty, who do not have an income that allows them to pay the bills and individuals who have been served an eviction notice by court. The flat should be at least about 5m² per person or 10 m² per family in size. The financing instrument for low income families was introduced in 1994 by the *law on the ownership of dwellings and dwelling cost allowances*. The law was renewed in 2001. Those applying for the allowance should normally fulfil the following three conditions:

- Have a legal right to the dwelling (all types of ownership are eligible),
- Their monthly income is less than 175% of the lowest pension for a one-person household and 125% of the lowest pension for multi-person households and
- The dwelling area should not exceed 30-50% of the standard area.

The standard area is set as follows: one person 35 m², two people 40 m², three people 45 m², four people 55 m², five people 65 m² and six people 75 m², if the sum of area of all rooms and the kitchen of the flat do not exceed 60% of the total usable area of the dwelling. The value of the allowance can not exceed 70% of the expenditures that apply to a standard dwelling area. The allowance is paid by the municipality's social care services.

The mentioned allowance depends on the expenditure on the standard dwelling area and the income. The subsistence allowance system was introduced in 1990 and is now regulated by the *law on social aid* from 2004. Eligible expenditures are: rent, maintenance and refurbishment costs of cooperative housing, down-payments for the management of condominiums (up to the level of the communal rent), costs for heating, water and wastewater and waste disposal for all types of ownership. Individuals are eligible if they are in a difficult life situation and have a low income. A low income equates to 119 €/month for a one-person household and 87 €/person per month for more person households.

As an example, for a two-person household with an area 35,86m², which is equipped with central heating and gas, the joint income is 215 € (107.5 €/person). The expenditures

would be on maintenance, heating, water & wastewater, waste disposal amounting to 56 € plus hot water for 4 €. The sum is 60 €.

Allowance = 60 € - 25 € = 35 €/month per dwelling

There also is the subsistence allowance system that was introduced in 1990 which is now regulated by the *law on social aid* from 2004. Individuals experiencing difficult life situations and with a low income (for a one-person household this would equate to 119 €/month and 87 €/person per month for a more person household) are eligible. The subsistence allowance is calculated as the difference between the eligible income and the actual income.

Grodno / Belarus

Support Programmes

In Belarus there are only support programmes for new buildings. It is possible to get an interest-subsidised loan for investment in new houses, but not for refurbishment measures. For these projects it is necessary to get loans on the capital market. The conditions for these credits are so unfavourable that it is hardly possible to demonstrate the efficiency of the renovation.

Most of the flats in multi-family buildings in Belarus are owned by private owners. The building shell and approximately 30% of the flats are owned by the state. The capital for refurbishing all dilapidated buildings is not available. The residents have saved funds for the building maintenance, but this is only a drop in the ocean.

Tallinn / Estonia

Update of BEEN-Results

1. The Operational Programme for the Development of the Living Environment 2007-2013 guides the use of the European Regional Development Fund (ERDF) and Cohesion Fund (CF) in the areas of environmental protection, energy, local and regional development, education and health and welfare infrastructure development.

Includes:

- Renovation Programme financed by a revolving funds scheme has been available from 2009. Energy efficient refurbishment measures are supported with reduced interest rate long term loans. The whole funds capital is about € 49million and supports approximately 68,000 residential flats (ERDF 17million €).
- Performance of expert assessments and energy audits in block houses (1 600 000 €)
- Functioning of the KredEx as a provider of information and training to consumers concerning the possibilities and importance of energy conservation (575 000 €)
- Improvement of the district heating systems and the production of electricity and heat from renewable energy sources (9,5m €).

2. Estonian Government has signed contract to sell part of its excess Assigned Amount Units (AAU) through the Green Investment Scheme (GIS) 30m €. The GIS measure is targeted to support comprehensive refurbishment works in apartment buildings by



reducing energy consumption by minimum 20%. Grant financing under this measure is offered as a share of total project cost and may range from 15% to 35%, depending on the level of complexity of reconstruction works to be undertaken and the energy saving rate to be achieved.

Additional Support Programmes

Since 2003, the development of district heating and the renewable energy supply in municipalities was supported with 50% from new construction costs. In 2008 the funds were abandoned.

There are instruments to support urban development or house construction available in Estonia. These financial sources are managed by the Ministry of Environment.

Also there are instruments/measures to support of energy efficient refurbishments in apartment buildings and use of renewable energy in municipal level. Tallinn city has program to support apartment building associations to cover self financing obligation if they want to take renovation loan from bank, program to support development of surroundings in apartment building areas and program to support energy labeling of apartment buildings.

The subsistence benefit is a form of state assistance for those in difficulty which is paid by the local government. The subsistence level is set by the Riigikogu (the national parliament) in the state budget. The subsistence level is established on the basis of minimum expenses incurred in the consumption of food, clothing, footwear and other goods and services satisfying primary needs.

EU recast the Energy Performance in Buildings Directive

In Estonia, the implementation is the responsibility of the Ministry of Economic Affairs and Communications. The requirements of the EPBD were transposed into the Building Act (includes terms like Certification of Energy Performance of Buildings, Energy audit, Minimum energy performance requirements for new and existing buildings, Mayor renovation) and the Energy Efficiency of Equipment Act. Implementation of new requirements of the EPBD will go through changes in mentioned Acts.

Brandenburg / Germany

Support Programmes

There are several support programmes for EER and RES measures available on federal level. These include programmes for energy consulting, environmental protection, energy efficient refurbishment measures, heat pumps and solar technology. These programmes provide support in different ways: either by grants, interest reduced loans or by subsidised payments (for RES).

In addition, there is the Investment Pact Programme on federal level which supports refurbishment measures in municipal buildings of social infrastructure. The support is provided in the form of a grant and aims to bring the building's energy requirements at least up to the standard of a new building (defined by the Energy Saving Regulation) and reduction of costs of primary energy demand for fossil fuel (incl. use of renewable energy).

The grant rate is up to 85% allowance of the relevant costs, the municipality has to contribute at least 15%.

In the state of Brandenburg, the ILB Municipality Loan drafted by the KfW (German Development Bank) is available. It supports renovation to improve the energy performance of buildings and its aim is to fund renovation projects in urban redevelopment cities and regional development centres (RWK) in schools and day nurseries in Brandenburg. The improvement of the programme compared to the standard Municipality Loan of the KfW is the reduction of the interest rate at 0.1% for a maximum of ten years.

Furthermore, there is an additional variation of the KfW's ILB Municipality Loan available in Brandenburg. It is also a loan, but it also aims to save energy and facilitate the changeover to environmentally-friendly energy sources. The conditions are comparable with the loan mentioned above.

In the field of urban development there are different support programmes on federal level e.g. for social housing projects, the modernization of living area and also for the development of rural areas.

In Brandenburg, energy efficiency and the use of renewable energy sources (REN programme / EDRF support) are funded. This support is issued as a grant. Its aim is to improve energy efficiency, to increase the rate of use of renewable energy sources, innovative technologies etc. The conditions of support depend on the kind of measures that are implemented. The own contribution has to be at least 25% and the total of all grants can reach 50% at most.

There is also the Brandenburg Loan for Rural Areas. The aim of the loan is to fund the long-term financing of investments including those in renewable energy and renewable resources. The support consists of the reduction of interest rates by 0.2% at most for the total investment sum.

The Federal Law for the Conservation, Modernization and Upgrading of Power-Heat Coupling (KWKG) regulates the commission for the feed-in of energy produced by CHP with conventional or renewable energy. The latest change was in January 2009. The commission is an extra charge for the power-heat coupling energy that is fed into the public power grid. The amount of the charge for power-heat coupling energy per kWh conforms to the system category that has been determined in an approval procedure.

Concerning the financing instruments which support the development of district heat and the supply of renewable energy in Brandenburg, there is the house building support which is already known from the "BEEN results".

There is also the urban development support which promotes the spatial concentration of urban development and house building resources in city centres as well as special fields of activities. In general the production of sustainable urban structures is important.

In the field of urban development support in the framework of the energy and climate policy, the preservation of the quality of life in the cities through energy saving and the implementation of environmentally aware measures in the building sector is an important topic. Therefore several programmes are available:

- Federal and state programmes: e.g. urban remediation and development measures, the Urban Reconstruction - East Programme, the Investment Pact (see above)

- EDRF-Programmes: e.g. sustainable urban development. The aim of the programme is to achieve integrated and sustainable urban development through the modification, improvement and adjustment of infrastructure. In this context, sustainability generally means that the measures are stimulate the economy and are sustainable, ecologically-sound and have a positive effect socially in the long term.

In the framework of social support, there is a housing subsidy available as a rental and debt grant. The programme provides a legal claim to a subsidy for low income citizens on top of the accommodation costs. The conditions of this fund depend on the number of members of the household, the total income and the acceptable rental/debt.

Schleswig-Holstein / Germany

Update of BEEN-Results

The main support programmes on federal level that were covered in the BEEN project have already been mentioned above. These programmes were mainly set up by the German Development Bank (KfW) and the Federal Office of Economics and Export Control (BAFA).

Additional Support Programmes

In Schleswig-Holstein, there are some subsidy programmes for municipal building measures (e.g. schools and kindergartens). There are special initiatives of the German Energy Agency in cooperation with the KfW that support highly efficient refurbishment measures in increasing the subsidy asset ceiling. Additionally, there are subsidy programmes offered by the Federal Ministry for the Environment, Nature Conservation and Nuclear Safety (BMU) for the development of EE concepts, the employment of energy auditors and managers in municipalities and for the implementation of energy efficient electrical devices.

There are programmes that are funded by ELER financial recourses that support, for example, the installation of biomass CHP facilities in rural areas. The subsidy asset ceiling depends on how innovative the approach of the plant is. There are support programmes from the BAFA for private households, for example for heat pumps, thermo-solar systems and energy efficient circulation pumps.

Concerning the regulations for the feed-in of power from CHP with conventional or renewable energy in Germany, there is a legal definition of what is conventional or renewable energy. Based on that, different payment levels and financing schemes are determined for different energy sources such as those mentioned above.

There are different programmes for supporting urban regeneration and development measures for example. For this, the support of the development of district heating and the renewable energy supply consists of a grant that offers approximately one third of the investment costs.

There are some social programmes mainly provided by the KfW. These programmes are generally low interest loans. One programme for example is aimed at young families with lower income and at least one child. It funds the purchase of a property or the building of a new house.

Evaluation of Financing Instruments in the European Union

EIB - European Investment Bank

The European Investment Bank was created by the Treaty of Rome in 1958 as the long-term lending bank of the European Union. The task of the bank is to donate towards the integration, balanced development and economic and social cohesion of the EU Member States.

The EIB raises considerable volumes of funds on the capital markets which it lends on favourable terms to projects furthering EU policy objectives. The EIB continuously adapts its activity to developments in EU policies. Besides supporting projects in the Member States, its main lending priorities include financing investments in future Member States of the EU and EU Partner countries. The EIB operates on a non-profit maximizing basis and lends at close to the cost of borrowing.

The EIB promotes projects in the public and private sector. Such a project promoted by the public or private client must be in line with the lending objectives of the EIB and be economically, financially, technically and environmentally sound.

The EIB finances a lot of different projects in many sectors of the economy. Projects must conform to at least one of the EIB lending objectives.

As a rule, the bank lends up to 50% of the investment costs of a project.

The EIB has two main financing facilities:

- Individual loans that are provided to viable and sound projects and programmes costing more than € 25 million which are in line with EIB lending objectives.
- Intermediate loans which are credit lines to banks and financial institutions to help them to provide finance to small and medium-sized enterprises with eligible investment programmes or projects costing less than € 25 million. Microfinance has also been provided by the EIB in some countries.

Support of Small and Medium-Sized Enterprises - SMEs

One of the EIB Group's aims is to fund investments in small and medium-sized enterprises (SMEs). Before the current financial crisis erupted, the EIB undertook a wide-ranging consultation of the SME market enabling it to develop a new financing programme, named EIB loans for SMEs. Available since October 2008 and given out by banks from the capital market, these new loans are simpler, more flexible and transparent, making it possible to reach a larger number of European SMEs.

Guarantees

Within the EU, the financial institute may provide guarantees for senior and subordinated debt. The guarantee is either a standard guarantee or debt service guarantee similar to that offered by a monoline insurer.

In some cases an EIB guarantee may be more attractive than an EIB loan. This depends on the funding structure of the operation. It can provide:

- higher value-added or
- lower capital charges - under Basel II, EIB guarantees provide a zero risk weighting to the guaranteed obligation.

In addition, the Loan Guarantee Instrument for TEN Transport (LGTT) is designed to guarantee revenue risks during a limited period following construction of TENs projects, notably under a PPP structure.

Technical Assistance

In addition to financial support the EIB offers some technical assistance. The form of this assistance varies according to geographical conditions. To facilitate project appraisal and provision of Technical Assistance, the EIB Projects Directorate employs specialised economists and engineers who assess and advise on individual projects.

Within the EU, the EIB performs detailed due diligence prior to investment. All projects must follow the environmental and procurement directives of the EU.

Different forms of technical assistance are available:

- Studies in the areas of legislation, regulatory reform and the award of concessions
- Feasibility studies
- Project management units to avoid delays and cost overruns

European Local Energy Assistance (ELENA)

The European Commission and the European Investment Bank have established the ELENA Technical Assistance Facility to make the mobilisation of funds for investments in sustainable energy at local level, financed through the Intelligent Energy-Europe programme, possible. ELENA support covers a share of the cost for technical support that is necessary to prepare, implement and finance the investment programme, such as feasibility and market studies, structuring of programmes, business plans, energy audits, preparation for tendering procedures - in short, everything necessary prepare cities' and regions' sustainable energy projects for EIB funding.

Investment programmes that can be supported by ELENA

Many EU cities and regions have recently started to prepare or are initiating large energy efficiency and renewable energy proposals to tackle energy and climate change challenges. However, most of them are still in the planning phase and their implementation is proving difficult because many regions and cities, particularly medium to small ones, often do not have the technical capacity to develop large programmes in this field. ELENA helps public entities to solve such problems by offering specific support for the implementation of the investment programmes and projects such as for example the refurbishment of public and private buildings, sustainable building, energy-efficient district heating and cooling networks, or environmentally-friendly transport.

JESSICA - Joint European Support for Sustainable Investment in City Areas

The main objectives of JESSICA are to help the authorities in the Member States of the European Union develop financial engineering mechanisms to support investment in sustainable urban development in the context of Cohesion Policy and to provide new opportunities to Managing Authorities responsible for the next generation of Cohesion Policy. JESSICA is a policy initiative of the European Commission supported by the European Investment Bank (EIB).

The Managing Authorities (MAs) in the Member States can use some of their Structural Fund allocations to invest in Urban Development Funds (UDFs) to accelerate investment in urban areas. These are mainly those supported by the European Regional Development Fund (ERDF) but also, where appropriate, the European Social Fund (ESF). JESSICA responds to the request by several Member States and the European Parliament to give special attention to the need for renewal and/or regeneration of certain urban areas.

The MAs can effect interim payments from Structural Funds to invest in UDFs through recyclable and recoverable financial mechanisms, essentially equity, guarantees and subordinated loans. Recovered funds can be reinvested through UDFs or returned to the MA to support other urban projects, including through conventional subsidies.

JESSICA offers an opportunity for the use of Structural Funds for the integrated development of urban areas. It gives a permanent availability of funds for revenue generating components of urban renewal and development programmes.

JASPER - Joint Assistance to Support Projects in European Regions

The main objective of the Joint Assistance to Support Projects in European Regions (JASPERS) is to provide the Member States which joined the European Union in 2004 and 2007 with technical assistance to make use more effectively of the grant finance made available by the EU for the implementation of EU Cohesion Policy during the 2007-2013 period. The support provided by JASPERS is comprehensive and covers all stages of the project cycle from the initial identification of a project through to the grant application to the Commission.

JASPERS operates on the basis of country action plans prepared annually for each Member State in cooperation with the beneficiary Member State concerned. A Managing Authority acts as a central coordinator for each country and it can request assistance from JASPERS. During the process of preparing the annual country action plans, JASPERS works in close cooperation with the Commission and the Member States to assist the latter in producing mature project proposals that are capable of meeting EU requirements, as well as to identify potential projects for assistance.

Attachments

Update of BEEN results



Overview of existing support Programms (from the BEEN project results)							
	Latvia	Poland	Lithuania	Estonia	Germany Brandenburg	Germany Schleswig Holstein	Belarus
Main support programs (Prog 1) Supplementary support programs (Prog 2)	Loan Program	Thermo-refurbishment program	Refurbishment program	Renovation program	KfW program	KfW program	
	Energy-saving pilot program		The new program (JESSICA instrument)	Supplementary grant scheme for audits, awareness raising	house building subsidy (actually no "energetic programs", but possible in addition to energetic subsidies): a) modernization / restoration of flats (Generationsgerecht ModInstR) b) condominiums in city centres - used by owner (Wohneigentum-InnenstadtR) c) condominiums in city centres - start-up funding (Wohneigentum-InnenstadtR)	supplementary state support	
Measures funded	All measures (Prog 2: only energy-saving measures)	A) Energy-saving measures providing at least 25% energy savings based on energy-audit. B) Starting 19.3.2009 also pure refurbishment measures in multifamily buildings used before 14 July 1961 with at least 10% energy savings calculated in refurbishment aud	Energy-saving measures	Energy efficiency measures	a) additional subsidy for special expenditures in connection with heat insulation that exceeds the legal minimum requirements or that cause the reduction of consumption, CO ₂ emissions and energy saving under special conditions b) + c) additional subsidies for proved costs for special energy saving measures in housing stock (if the binding requirements of the EEWaermeG [renewable energy heat law] for new buildings are fulfilled) and for new buildings (if the binding rate of renewable energy that is required by §5 EEWaermeG is exceeded by at least 50%)	All necessary measures; focus from 2000: energy-saving measures	
Start of programs	Since 2001 (Prog 2: 2003 to 2005)	A) 1998 B) 19.3.2009	Energy Efficiency Pilot Project (1996-2004) Modernization of multifamily buildings program (2004-2020)	Since 2003 grants/ 2009 loan scheme	a) - c) 2009	Since 1993 (Prog 2 in Berlin: till 2001)	
Type of support Prog 1	State guarantees as bank security for loans	A) 25% reduction of the capital of the loan by at least 20% of own equity and at least 25% energy savings B) in case of thermal refurbishment: 20% reduction of the capital of the loan, no more than 16% of investment cost and no more than 2-ye	15 to 50% subsidy of investment costs (depending on scale of heating cost saving)	10% subsidy and required guarantees for loan / low interest loan		Reduced-rate interest on loans (10 years 2% interest reduction)	
Type of support Prog 2	Loans with reduced interest (interest 1st year 4,3% to 9,1% in 11th year)		The new program (JESSICA instrument) is under preparation (it is planned to be loans with reduced interest rate to 3% and state support to 15% if energy saving is achieved. As well 50% support for technical documetation preparation costs and additional sup	50% support to energy audits, technical inspection and design projects	a) interest reduced loans (15 years interest free / repayment 4 % yearly, after 15 years interest and repayment at least 1%) b) grant (basic subsidy €12.000 plus €5.000 bonus (e.g. for energy saving measures) if necessary c) loan (for measures in building stock: max. 500€/m ² plus bonus max. 100€/m ² e.g. for energetic measures, for new buildings max. 350€/m ² plus bonus max. 100€/m ² e.g. for energetic measures if necessary	Additional interest subsidies for large-scale refurbishment Guarantees for loans	



Support program volumes and resulting refurbishment investments							
	Latvia	Poland	Lithuania	Estonia	Germany Brandenburg	Germany Schleswig Holstein	Belarus
Main support programs (Prog 1) Supplementary support programs (Prog 2)	Loan program	Thermo-refurbishment program	Refurbishment program	Renovation program	KfW program	KfW program	
	Energy-saving pilot program		Supplementary urban programs	Supplementary grant scheme for audits, awareness raising	a) modernization / restoration of flats (GenerationsgerechtModInstR) b) condominiums in city centres - used by owner (Wohneigentum-InnenstadtR) c) condominiums in city centres - start-up funding (Wohneigentum-InnenstadtR)	Supplementary state support	
Loan	Prog 1: €1,6 m				abovementioned programmes are new and actually no energetic programmes, but just additional support for energetic measures (whereas not applicable separately), only the temporary total planned numbers for the house building support can be scheduled: €26,3m (2009),		
Loan with interest rate reductions	Prog 2: €1,6 m			€ 49 m	€28,0m (2010), €29,9m (2011), €30,3m (2012)	Prog 1: €20.000m	
Construction costs subsidies			€26 mln				
interest reduction subsidies		€177 m (as reduction of the capital of the loan)				Prog 2 (Berlin): €500 m	
Time span for program indicated volumes	Since 2001 (Prog 2:2002 to 2005)	1999 to 30.06.2009	end 2005-till 2009 beginning)	2003 to 2007 (grants) from 2009 loan	since 2009	1993 to 2001	
Number of residential flats supported	Prog 1: 2.000 flats; Prog 2: 466 flats	A)13 500 buildings with around 398 000 flats B) not yet	16.230 (309 fully implemented projects)	68.000	not yet public, because programm start is 2009	Prog 1: 1.350.000 flats; Prog 2 (Berlin): 60.000	

Refurbishment investment achieved							
Prog 1	€1,6 m	€796 m	For 2009-2010 €49m	€84m (grantscheme)	<i>no numbers, because new programmes which actually are no energetic programmes but just additional subsidies for energetic measures; those additional subsidies are at present evaluable separately</i>	€19.000m	
	€1,6 m	-	€137,5 mln from Structural funds; € 65 mln State budget			€1.740m	
Prog 2							
Average refurbishment investment per flat							
Prog 1	€ 800	€ 2.000	€ 8.600	€ 1.235		€ 14.500	
Prog 2	€ 3.435	-				€ 29.000	
Average support (value of support) per flat							
Prog 1	-	€ 445	€ 4.300	€ 123,00		€ 2.900	
Prog 2	€ 1.120	-				€ 8.300	

Possible co-financing by using EU structural funds			
Country	Using the EU funds (ERDF) in the period 2007 - 2013		possible maximum percentage at the ERDF
	%	€	
Estonia	[0,5]	€87,2m	3,00%
Lithuania	2,22%	€58,9m (for problematic territories) + € 137,5 mln (for JESSICA instrument)	3,00%
Latvia	1,13%	€29,9m	3,00%
Poland	1,47%	€243,1m	3,00%
Belarus			

	Assistance through living-expense allowance for low-income households (<30% on Average)						
	Latvia	Poland	Lithuania	Estonia	Germany Brandenburg	Germany Schleswig Holstein	Belarus
Can housing costs (including operation costs) be reimbursed in full as part of assistance for living expenses?	yes	yes	yes	yes	yes	yes	
Are refurbishment appotionments reimbursed?	yes	yes	yes	yes	yes	yes	
Does the entitlement also apply to condominium owners?	yes	yes	yes	yes	yes	yes	
Does a calculable legal claim exist?	No, payments depend on budget of municipal authority				yes	yes	

Housing costs allowance (percentage subsidies) on refurbishment apportionments for low-income households (<90% on average)							
	Latvia	Poland	Lithuania	Estonia	Germany Brandenburg	Germany Schleswig Holstein	Belarus
Do income-based subsidies (for housing costs) exist for households with low incomes?	no	yes	yes	no	yes	yes	
Are percentage-based subsidies (housing costs) also paid for operation costs (heating, hot water)?	-	yes	yes	-	Yes	no	
Are percentage-based subsidies (for housing costs) also paid for refurbishment apportionments?	-	yes	no	-	yes, but the rent or debt can only be subsidised up to a defined limit	yes	
Does the entitlement also apply to condominium owners?	-	yes	yes	-	yes	yes	
Does the legal claim exist, which is calculable from the outset?	-	yes	no, depends on budget	-	yes	yes	
Are there upper limits for housing costs?	-	yes	yes	-	yes	yes	
Measuring principle for housing costs allowances	-	income-dependndent up to 50% of housing costs	-	-	the housing subsidy is oriented towards the number of members of the relevant household, the total income and the acceptable rental or dept; it is calculated with this formula (also see§19 WoGG): "(1) the unrounded monthly housing subsidy for up to 12 relevant members of household is $1,08 \cdot (M - (a + b \cdot M + c \cdot Y) \cdot Y)$ €. "M" is the rounded relevant monthly rental or debt [€], "Y" is the rounded total income [€], "a", "b" and "c" are values that are oriented towards the number of members of the relevant household (2) the relevant steps for the calculation and the rounding of the housing subsidy is discribed in an attachement (3) if there are more than 12 members of a Household, the housing subsidy for the following	income-dependndent up to 90% of housing costs	

Imprint

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Part 2: Financing Sources for EER and integrated urban development measures

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