

ENERGY EFFICIENT RENEWAL OF URBAN AREAS IN DORTMUND







Starting Point: Pilot Project Energy Efficient Renewal of Union District



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Municipal Climate Protection





Institutionell Setting:

UnionDistrict is urban redevelopment zone financed by urban development fundings through EU and State of NRW

Project organization: Planning/Environment authorities (first time) Stakeholders: Office for Real Estate, Economic Development, School Admnistration, Road and Civil Construction **District Institutions** e.g.: Neighbourhood Office, Police, **Representatives of** Churches and Religious Communities 2020 in Dortmund

Policy and legal regulation: **Planning: National** Settlement Policy; **Urban Planning** Framework **Climate Protection:** National Energy Saving **Regulations; Thermal** Insulation Regulation; EEG Feed-in Tariffs; **Municipal Action Programme for Climate Protection**

Reform approach:

So far: better Quality of life by enhancement of a district through urban restructuring and landscape upgrading **New:** combined with energy efficient measures **Demand by residents:** costs still affordable; liveable environment; Participation in the plan handlungsprogramm Klimaschutz 2020



Approach

Urban Upgrading



(Energy efficient)

Local Commitment



(Energy efficiency)

Expansion Social and Cultural Infrastructure



(Ideas for Energy efficiency)

Leisure and Recreational



Opportunities

Safeguard Inner **City Housing**



(Energy efficient)

Safeguard/Expansion Jobs + Business









old new

Architectural Advisory for Energy Efficiency





100 EnergyPlusHouses for Dortmund



Energy Saving-Party for Tenants



Service Centre Energy Efficiency and Climate Protection (dlze)



Sewage Pipes Waste Heat for Buildings



House Estate Company as Energy Supplier





Lessons Learned

- Municipality must be able to try out new techniques
- Success is based on intensive consulting activities
- Special regard to the demograhic change (e.g. old aged real estate owners will be hard to convince for energy efficient renewal)
- Incentives such as government subsidies encourage real estate owners for energy efficient renewal
- Monitoring of measures must be carried out for an effective Roll Out for other districts (e.g. Integrated Consultation Board for Energy Efficiency and Climate Protection KEK)



Energy Monitor for households





Managing Energy Efficient Renewal of Urban Areas Practice transfer processes



Decision makers



Corporate Design

Necessary preconditions?

- District must be part of a national development programme (fund raising)
- Local council decision
- Concerted institutionell Action Programme for participation of private and municipal stakeholders
- Analyse of existing legislation and policies

First steps

- Data collection
- CO₂ emissions district inventories for monitoring
- Mapping the project area (real estates and their age, households, infrastructure, population structure
- Good **p**ublic **r**elation work