4.6 Evaluation Report for Münster

Original year of application	2010
Application to be considered for both years:	Yes

1. Local contribution to global climate change

Main Evaluator: Bert Metz
Co-Evaluator: Henrik Gudmundsson

Score **9.5**

Main Evaluator
Moderately high emissions per capita, but >20% reduction since 1990. High emissions from transport. Low share of renewable electricity. Strong programmes on low carbon energy, district heating/CHP (municipal plant), low carbon buildings, climate education and transport. Moderate achievements on waste. Strong performance on targets and budgets, but plans only partly approved. Adaptation plan in place.

Co-Evaluator
Agreement with main evaluator

2. Local mobility and passenger transport

Main Evaluator: Henrik Gudmundsson
Co-Evaluator: Birgit Georgi

Score **12.5**

Main Evaluator
High performance in cycling network and successful application of range of measures to further improve long established position as bicycle city with specific financial commitments disclosed in the application. 90% of citizens have access to frequent public transport within 300 meters, which is similar to several of the shortlisted cities. The share of cars among short trips is around 23%, one of the lowest figures, while the bicycle share is very high, around 45%. 90% of buses are or will soon be low emissions with regard to particulates. Münster appears to have some of the most extensive Mobility Management promotion efforts of the cities, involving also measures to shift the municipality's own internal employee transport away from cars. Also major plans for improvements to Public Transport flow and quality improvements. There is an ambitious strategy for investments in cleaner Public Transport vehicles. No info on freight/goods transport. Extra credit for a School program and the mobility policy for city employees.

Co-Evaluator
High share of cycling; good access to public transport but relatively low use; very slight decrease in car use; strategy. City of short distances; new residential areas close to stations.

3. Availability of green areas open to the public

Main Evaluator: Birgit Georgi
Co-Evaluator: Maria Berrini

Score **13**

Main Evaluator
Very high accessibility; long tradition in green structures policy which they further follow - even increased the green areas over the last 10 years by 10%; very positive: including the urban rural interface, systematic green structure, considering climatic functions, green areas combined with walking and cycling network, providing intensively and extensively managed green areas; further upgrading the very high status in the future, focus on malignance, convincing also the customer related approach.

Co-Evaluator
The Promenade, botanical garden, the recreational park around the Aa Lake, numerous municipal parks, 3 green belts, 7 green corridors stretching radically from the open landscape parks and recreational areas, into the city centre. Moreover, the municipal area is crossed by the Dortmund-Ems Canal. 14 m² per capita (32 m², including also allotments etc.), 95% of the resident population is in the position to reach a green space within 300 m. More than 300 public playgrounds dispersed throughout the municipal area. The few uncovered zones comprise some rather rural border areas of Münster which are directly situated in the so-called “Münsterländische Parklandschaft” - an agricultural man-made landscape characterised by hedges and landscaped elements. The surface of public green spaces and playgrounds has been increasing, within the past decade, by a total of 23% (898 ha).In 1965, Münster was one of the first cities in Germany to establish a green structures policy. An extensive list of measures for new green area development and improvement of existing ones are under going (details in application). During the European competition “Entente florale" (hosted by the AEFP - the European Association for Flowers and Landscape) Münster was awarded a gold medal in 2007 for its commitment to its green structure which was also a core element in its being voted the "World's most liveable city" during the LivCom- Award 2004 (hosted by UNEP – the United Nations’ Environmental Programm)."

4. Quality of local ambient air

Main Evaluator: Matthias Ketzel
Co-Evaluator: Bert Metz

Score **14.5**

Main Evaluator
Reduced price for public transport ticket in case of ozone warning!!, national leader in Bike traffic, national capital in climate protection 2007, cleaner buses, long list of concrete plans given (Clean air plan) and documented as appendices. Informative web pages on AQ-

Co-Evaluator
Agreement with main evaluator

5. Noise pollution

Main Evaluator: Luis Bento Coelho
Co-Evaluator: Matthias Ketzel

Score **13**

Main Evaluator
Clear description of achievements and measures taken. Targets for action (70 dBA daytime and 60 dBA nighttime) are too high. Noise action plan does not seem too organized.

Co-Evaluator
Agreement with main evaluator

6. Waste production and management

Main Evaluator: P.J. Rudden
Co-Evaluator: Maria Berrini

Score **11.4**

Main Evaluator
An 'ecological' waste management system is in place using 4 bins for separate collection and MBT for residual waste. The waste management concepts (AWK) are documented for achieve this objective. The waste company AWM created incentive schemes for waste avoidance based on bin size and type. A free paper bin has been introduced to minimise residual waste. The recycling levels are very impressive through a combination of materials recycling and MBT though the destiny of the MBT 'products or outputs' are unclear as either landfill or incineration is needed to treat residuals further.

Co-Evaluator
Agreement with main evaluator

7. Water consumption

Main Evaluator: Beate Werner
Co-Evaluator: P.J. Rudden

Score **11**

Main Evaluator
Medium range consumption, but good performance on metering and leakage. Good awareness rising. Network maintenance could be better described, no mentioning of CC preparedness, but some achievements on rain water percolation presented. Further commitments are focusing on CC and infrastructure; however no financial commitments are given.

Co-Evaluator
There is 100% metering of water and water consumption /capita is falling since 2001. Leakage is relatively low at approx 4% and there are ongoing public awareness programmes. Rainwater harvesting has been promoted to consumers as part of the water saving measures.

8. Waste water management

Main Evaluator: Beate Werner
Co-Evaluator: P.J. Rudden

Score **11.5**

Main Evaluator
Very good performance on P and N removal. Very good rain water management, with this over flow capacities not needed to elaborate but storm water preparedness should have been mentioned. OK energy efficiency, points lost on land fill and WW re-use. Fine further commitments in financial terms used for malignance, achieving WFD. But some real innovative projects e.g. energy self-supply by sludge use are missing.

Co-Evaluator
100% of wastewater produced in Munster complies with EU UWWD and more than 98% are connected to central system. There are 6 treatment plants serving the city with over 95% nutrient removal. The Werse river does not yet meet WFD targets but there is a noticeable improvement in recent years. The issue of energy efficiency in sewage plants being addressed but sludge is digested currently.

9. Sustainable management of the local authority

Main Evaluator: Maria Berrini
Co-Evaluator: Beate Werner

Score **13**

Main Evaluator
Overall integrated participated policy and Vision: In 1992 established an advisory committee for climate and energy to draw up recommendations for abating the CO2 emissions by 25% until 2005. Introduction of an environmental management system for the entire municipality of Münster in September 2001, as a result of a well participated Local Agenda 21 and adoption of the Charta of Aalborg, since 1999. Budget: The ongoing budget for the environmental management amounts to approx. EUR 810,000 annually. Future investment costs for implementation measures are not included here, since these costs are distributed on various budgets (e.g. energetic renovation of buildings). EMS/ Six locations have been certified to this day. With the certification according to EMAS, important measures in environmental management were implemented (details in the application) Commitments: All municipal building yards and accommodations of green and sports area maintenance will be included into an environmental management system and certified according to EMAS and ISO by late 2009 Sustainable Purchasing: municipal tendering and awarding guidelines since March 1999. Eco-labels such as the Blue Angel, Energy Star, and TCO are used. Consequences of this policy include, for example: • Only paper with the “Blue Angel“ is procured, • The use of CFC, PVC, and tropical wood materials is abandoned, • Spray chemicals (pesticides) are not used any more, • Separation of recyclable materials is mandatory, • The annual heat consumption of new municipal buildings may not exceed the value of 50 kWh/m² (decision of the city council), • In the case of new acquisitions, natural gas vehicles are procured if available on the market, and Diesel vehicles are fitted with soot filters, • Municipal buses are fitted with state-of-the-art Ad-Blue- and EEV technologies, respectively. The procurement with the “Blue Angel“has been mandatory also for photocopiers since 2004, reaching almost 100% by now. PC and computer screens have to be certified according to Energy Star 4.0 for many years now; 100% by now.

The municipal canteens pay attention to predominantly local products. Furthermore, some products are procured from ecological cultivation and/or fair trade. Municipal buildings / energy consumption: The average consumption of all public buildings is monthly monitored and amounts to approx. 120 kwh/m² of heat and 15 kwh/m² of electric power. Several buildings have been refurbished during recent years. 80% of all employees work in these three buildings. Consumption in the administrative buildings adds up to 43 kwh/m² of heat in the “Stadthaus 2” or 83 kwh/m² of heat in the “Stadthaus 1”. The specified limit value of the annual heat consumption for the construction of new municipal buildings must not exceed 50 kWh/m² (decision of the city council). The project “Saving energy and waste in schools and daycare facilities for children” 101 schools and day-care facilities are participating by now, with more than 25,000 children. The day-care facility for children Loddenbach has been constructed as a pioneering project in passive house (15 kWh/m²/a) architecture in 2001.The public buildings employees have been motivated by the power saving campaign “power devourers” to adjust their behaviour, saving energy. The city of Münster is supplied with approx. 2 million kWh of green electricity. Commitments: Energy consumption is to be reduced by 10% and waste quantities by 15%. In the same fashion, the storage of substances hazardous to water is to be safeguarded at all sites. Average consumption values are to be decreased below 100 kwh/m² within a period of five years. Based on technical measures and a comprehensive campaign, power consumption is to be reduced by 20%. Further locations will be included in the audit according to EMAS each year.

Co-Evaluator
Very good achievements in nearly all areas including agenda21 and mobility management and awareness campaign; commitments are described in a rather short manner but with some financial perspectives.

10. Sustainable land use

Main Evaluator: Birgit Georgi
Co-Evaluator: Luis Bento Coelho

Score **10**

Main Evaluator
Slogan is compact-urban-green and a centre oriented city of short distances (=good vision/approach); however, population densities in built up areas are the lowest among the 8 cities; overall population is stable but the city lost a major part to the neighbouring municipalities intensifying commuter relationships; good: brownfield developments, currently 38% of residential development on derelict and reorganised areas; innovative: for future developments creation of framework requirements to keep citizens in the city; strategic concept for demographic change; cooperation with hinterland - all together good vision and approaches but current performance behind other cities.

Co-Evaluator
Agreement with main evaluator

11. Dissemination programme

Main Evaluator: Thea Pieridou

Score	**20**

Main Evaluator

Clear understanding of viewing the EGCA as an extraordinary opportunity to exchange ideas and experiences, related to green cities; very strong network of partners at all levels; motivation and commitment to communicate EGCA; wide use of communication tools, internet, events (including launch and closing ceremonies), advertising, media etc. Clear coherent full programme of events and actions. Lots of creative elements such as portal, wikis, Google earth, green dream camp, plush event, conclusive report with guidelines for all cities.

12. Presentation at meeting 12-13 January 2009

Criteria evaluated:

1. Technical Presentation/QA
2. Vision/ambition/credible
3. Stakeholder involvement/leadership
4. Integration/holistic approach

Score	**16**
Total Score	**155.4**