

Environmental performance in numbers

In-house environmental audits at the Eschborn, Berlin and Frankfurt-Rödelheim locations are drawn up in accordance with the auditing principles published by the Association for Environmental Management in Banks, Savings Banks, and Insurance Companies (VfU). Energy and transport-related CO₂ emissions are calculated using the emissions factors published by the German Federal Environment Agency (UBA), while for air travel the emissions calculator provided by Atmosfair is used (www.atmosfair.de). Emissions figures for air travel are based on information provided by Deutsche Bahn, which they have obtained in cooperation with the HaCon traffic software company and the Heidelberg Institute for Energy and Environmental Research (ifeu).

Operations in Eschborn

2009 system boundaries

Staff numbers are expressed as weighted posts.¹ All figures are based on an assumed 250 working days in 2009. All Head Office employees, project personnel and trainees working at Head Office are included. Interns have been included since 2006; however, their number is only taken into account when calculating travel data. Canteen and security personnel supplied through external agencies are included in the calculation of consumption and waste data. The kindergarten's consumption figures are not included.



Audit
reference:
staff

	2003	2004	2005	2006	2007	2008	2009
Weighted number of staff excluding external personnel	1,156	1,128	1,122	1,121	1,230	1,380	1,481
Weighted number of staff including external personnel	1,187	1,156	1,148	1,153	1,261	1,421	1,521
Weighted number of staff including external personnel and interns				1,231	1,353	1,518	1,647

¹ A weighted post is equivalent to one full-time post. Part-time posts and other types of employment are combined into one weighted full-time post.

Operations in Eschborn 2009 list of indicators

Indicator	Quantity	Reference/boundary
Facilities		
Net internal area	52,939 m ²	
Net internal area per staff member	35.8 m ²	All buildings incl. kindergarten
Consumables		
Paper consumption, total	10,620,689 sheets	Excl. documentation and publications
Total paper consumption per staff member	7,174 sheets	Excl. external personnel and interns, excl. documentation and publications
Recycled paper as % of total	100 %	Proportion of recycled paper in overall consumption
Energy		
Total energy consumption	10,342,407 kWh	Electricity, heating oil, natural gas
PV	3,740 kWh	
Electricity consumption	4,477,264 kWh	Incl. PV, excl. kindergarten
Electricity consumption per staff member	2,944 kWh	All staff incl. external personnel, excl. interns
Electricity consumption per unit net internal area	84.6 kWh/m ²	Net internal area (see above)
Heating energy consumption	5,865,143 kWh	Excl. House 5
Heating energy consumption per staff member	3,857 kWh	All staff incl. external personnel, excl. interns
Heating energy consumption per unit net internal area	110.8 kWh/m ²	Net internal area (see above)
Water and wastewater		
Total water consumption	18,641 m ³	All buildings
Potable water consumption, total	11,846 m ³	All buildings
Non-potable water consumption, total	6,795 m ³	From well water installation
Potable water consumption per staff member	7,789 l	All staff incl. external personnel, excl. interns
Potable water consumption per staff member per day	31.2 l	Assuming 250 working days
Total water consumption per staff member	12,257 l	All staff incl. external personnel, excl. interns
Total water consumption per staff member per day	49 l	Assuming 250 working days
Contribution of non-potable water to total consumption	36 %	
Solid waste		
Total waste arisings	315.5 t	Incl. paper
Total waste arisings per staff member	213.7 kg	All staff incl. external personnel, excl. interns
Paper waste	82.4 t	All staff incl. external personnel, excl. interns
Paper waste per staff member	54.2 kg	All staff incl. external personnel, excl. interns
Wastes remaining for final disposal	83.8 t	Excl. hazardous wastes
Wastes remaining for final disposal per staff member	54.9 kg	All staff incl. external personnel, excl. interns
Recovery ratio	73.4 %	Proportion of total waste arisings

Operations in Eschborn 2009 list of indicators

Indicator	Quantity	Reference/boundary
Transport		
Proportion of commuters using local public transport	27 %	According to 2005 mobility survey, corrected in 2008
Jobticket	1,071 tickets	Number of Jobtickets issued
Official journeys within Germany by all staff members in Germany by rail (in km)	5,150,383 km	
Official journeys within Germany per staff member (in km)	3,479 km	Excl. external personnel and interns
Proportion of rail km (within Germany)	71.1 %	Proportion of official journeys within Germany
Proportion of air km (within Germany)	27.3 %	Proportion of official journeys within Germany
Proportion of company car km (within Germany)	1.6 %	Proportion of official journeys within Germany
Official journeys abroad, all staff members (in km)	75,352,089 km	All international flights booked through the central travel agency
Official journeys abroad, all staff members in Eschborn (in km)	39,993,347 km	Only flights booked by Head Office staff
Emissions		
CO ₂ emissions, energy	1,574 t	Emission factors according to UBA (2004)
CO ₂ emissions, commuting	1,720 t	Emission factors according to UBA (2004)
CO ₂ emissions, weekend commuters	452 t	Emission factors according to UBA (2004)
CO ₂ emissions, official journeys	12,966 t	Emission factors according to Atmosfair (2006-2009)
CO ₂ emissions, total	16,712 t	

Operations in Eschborn Input/output analysis for 2009

Account	Input	Stock		Output
1. Land and property				
1.1 Buildings		5		
1.2 Land area		34,703 m ²		
■ built-up		13,913 m ²		
■ landscaped		9,985 m ²		
■ sealed		10,805 m ²		
1.3 Floor areas				
■ net internal area	7,724 m ²	52,939 m ²		
2. Systems and facilities				
2.1 Building services systems				
■ well system		3		
■ heat recovery systems				
■ - water		1		
■ - air		8		
■ pv		2	House 2: 28 kWp *)	
■ solar thermal		1	House 3: 5 kWp	
■ sculleries				
■ grease traps		2		
■ petrol traps	3	3		3
■ transformers		8		
■ low-voltage switchgear				
■ medium-voltage switchgear				
■ lifts		24		
■ emergency power supply		4		
■ ventilation systems		64		
■ heating systems		5	boiler 7	
■ sprinkler systems		3		
■ uninterruptible power supply units	4	12		2
■ fire alarm systems		4		
■ wall hydrants				
- wet		55		
- dry		8		

* The unit of a kilowatt peak (kWp) describes the optimum performance of a solar unit. Depending on insolation, solar units in Germany with a capacity of 1 kWp can generate between 700 and 900 kWh per year

Account	Input	Stock	Output
2.1 Building services systems			
■ smoke extracts		13	
■ water treatment units		5	
■ water lifting units		6	
■ pressure boosting systems		4	
■ gas control stations		4	
■ fire dampers		350	
■ indirect free cooling	1	3	
■ evaporative chillers		2	
■ safety lighting unit		1	
■ gas extinguisher system		1	
■ electro-acoustic systems		7	
■ frequency converters	1	5	
■ CO warning systems		3	
■ chillers		3	
2.2 Central EDP	46	224	
2.3 Distributed EDP			
■ PCs incl. laptops	163	1,729	294
■ printers		925	75
2.4 Photocopiers			
■ GTZ-owned		0	
■ rented	2	49	2
2.5 Office equipment		5	
2.6 Communications equipment		8	25
2.7 Kitchen equipment			
■ refrigeration, freezing		7	
■ sculleries		2	
■ dishwashing systems (canteen)		2	
■ dishwashers		57	2
■ refrigerators	2	54	

Account	Input	Stock	Account	Output
2.8 Electronic household equipment				
■ washing machines		1		
■ condensing driers		1		
2.9 Motor vehicles				
■ utility vehicles		1		
■ company cars	2	4		2
3. Consumables				
3.1 Paper (excl. photocopies, documentation and publications)	10,620,689 sheets			
3.2 Hazardous substances	1	8		
4. Incoming post and goods			4. Outgoing post and goods	
4.1 Incoming post	16,281 kg		4.1 Outgoing post	56,060 kg
4.2 Incoming goods	282,280 kg		4.2 Outgoing goods	4,157 kg
5. Energy			5. Emissions (energy)	
5.1 Heating energy	5,999,681 kWh		5.1 Heating energy	1,527 t CO ₂
5.2 Electricity, total	4,477,264 kWh		5.2 Electricity	47 t CO ₂
Of this, conventional sources	74,140 kWh			
5.3 Photovoltaics	3,740 kWh			
6. Water			6. Wastewater	
6.1 Potable water	11,846 m ³		6. Wastewater, total	18,641 m ³
6.2 Well water (recirculated)	6,795 m ³			
7. Solid waste			7.1 Solid waste for recovery	
			- mixed paper for recovery	71.1 t
			- file material for recovery	11.3 t
			- 'Green dot' labelled wastes	n.d.
			- commercial wastes handled as municipal solid waste	83.5 t
			- green waste	n.d.
			- kitchen and canteen waste	82.7 t
			- electroscrap	9.7 t
			- glass waste	n.d.

Account	Input	Stock	Output
7. Solid waste			
		7.3 Hazardous waste, recovered	18.00 t
		7.4 Hazardous waste, to final disposal	0.34 t
8. Transport			
8.1 Commuting			
- local public transport	3,404,977 km	- local public transport	252 t CO ₂
- motor vehicles	9,817,322 km	- motor vehicles	1,468 t CO ₂
- cycling	340,578 km		
- pedestrians	32,130 km		
8.2 Weekend commuters			
- local public transport	3,214,285 km	- local public transport	
- motor vehicles	1,607,143 km	- motor vehicles	
8.3 Official journeys within Germany			
- road	82,595 km	road	19 t CO ₂
- rail	3,660,334 km	rail	159 t CO ₂
- air	1,407,454 km	air	267 t CO ₂
8.4 Official journeys abroad			
- air	38,585,893 km	- air	12,521 t CO ₂