Natural disaster and the economic impacts on tourism

Global Environmental Change and Small Island States and Territories: Economic and Labour Market Implications of Climate Change on the Tourism Sector of the Maltese Islands

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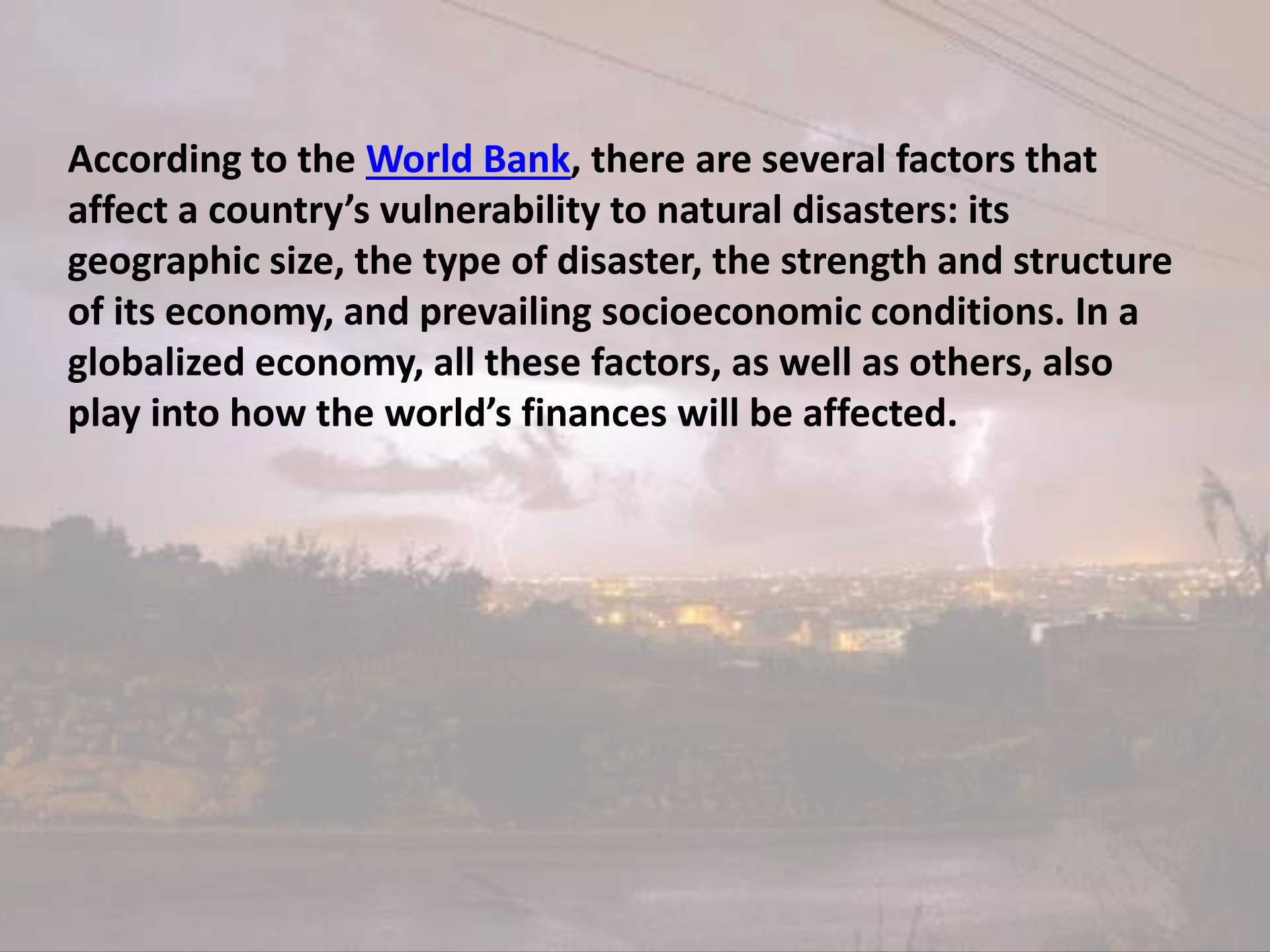
Due to rising population, climate change, and environmental degradation, natural disasters are increasing in frequency. They are also becoming costlier and deadlier, according to Swiss Re, a reinsurance company. In 2009, natural disasters cost insurers about $110 billion. In 2010, the cost was double that, at $218 billion.

The Economic Impact of Natural Disasters http://www.businesspundit.com/the-economic-impact-of-natural-disasters/



According to the World Bank, there are several factors that affect a country's vulnerability to natural disasters: its geographic size, the type of disaster, the strength and structure of its economy, and prevailing socioeconomic conditions. In a globalized economy, all these factors, as well as others, also play into how the world's finances will be affected.

Europe has witnessed a major growth in the scale and frequency of extreme weather events. Between 1980 and 2006, extreme weather-related events represented 89 per cent (€238 billion) out of the €366 billion of overall losses from disasters caused by the impact of natural hazards

Europe is facing an annual economic loss burden of €12 billion as a result of extreme weather events, of which 28 per cent has been compensated by insurers,
Recent studies indicate that over much of Europe, one-in-100-year floods will occur every couple of decades

NatCatService, GeoRisksResearch, Munich Re, December 2006 - the figures are cited in 2005 values.

CEA Report "Reducing the Social and Economic Impact of Climate Change and Natural Catastrophes," July 2007.

Vulnerability and Adaptation to Climate Change; European Environment Agency; 2005

Hurricane Katrina 2005

- /
- **Its effects on small business owners were also devastating, destroying almost 60% of them. Over 18,000 businesses across Louisiana permanently closed their doors after the 2005 hurricane season**
- **In 2004, the year before the Category 3 hurricane struck, New Orleans saw a record 10.1 million visitors. In 2006, the year after the floods, the numbers shrank to 3.7 million. Last year the number was up to 7.9 million visitors (2012)**

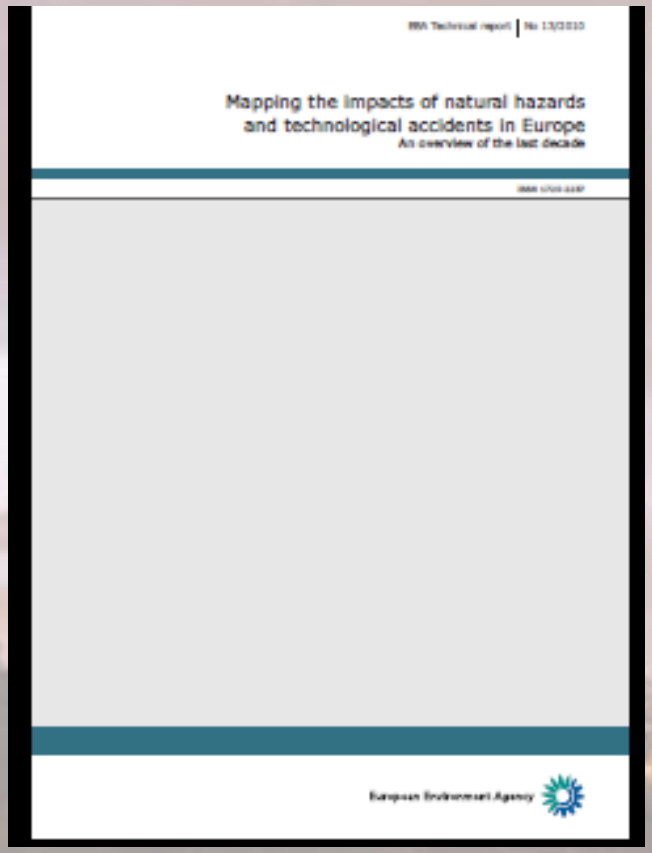
- Hurricane Katrina-http://www.dailyfinance.com/2010/08/27/five-years-after-hurricane-katrina-new-orleans-tourism-rebounds

Flood Disaster, Impacts and the Tourism Providers' Responses: The Kota Tinggi Experience

J. Hamzah, et al

- From the data gathered during field visit, tourist arrivals during and after the disaster inKota Tinggi had shown an extreme decline, dropped almost 90%
- The Archipelago Travel Sdn. Bhd. revealed that their business had declined 20% to 30% during the flood event
- Johor'stourism sector had a 90% decline in occupancy rate
- EG Hotelier = The flood had caused this hotel to cease its operation for 2 months, and had incurred losses of RM100, 000 euro 230,000 due to damages of the furniture, elevators and other equipment failure.

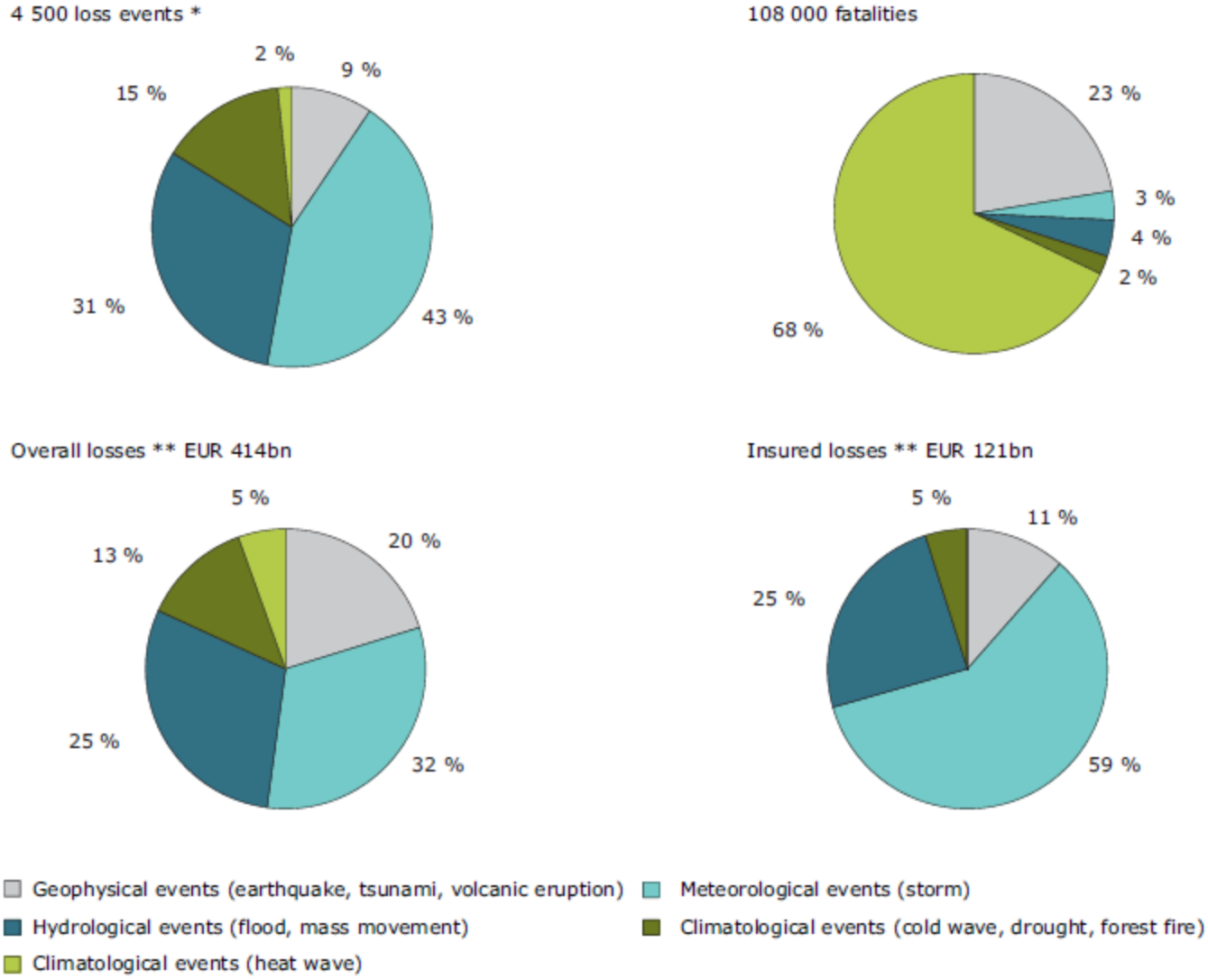
- *"My hotel took almost a half year to recover and I really need to plan to face any risk with the changing climate"*


EEA Technical report | No 13/2010
Mapping the impacts of natural hazards and technological accidents in Europe
An overview of the last decade
European Environment Agency

Mapping the impacts of natural hazards and technological accidents in Europe EEA 2010

- · In the period covered by the report, disasters caused nearly 100 000 fatalities, affected more than 11 million people and led to economic losses of about EUR 150 billion.
- · Extreme temperature events caused the highest number of human fatalities. In total, more than 70 000 excess deaths were reported in Europe during the hot summer of 2003.
- · Flooding and storms were the most costly hazards. The overall losses recorded in the study period added up to about EUR 52 billion for floods and EUR 44 billion for storms.

Figure 1.1 Disasters caused by natural hazards in EEA member countries, 1980–2009



Note: * Definition loss events: events can occur in several countries; events are counted countrywise; ** in 2009 values.

Source: NatCatSERVICE, 2010; © 2010 Münchener Rückversicherungs-Gesellschaft, Geo Risks Research, NatCatSERVICE — as at

Table ES1 Overview of the major events in Europe 1998–2009

Hazard type	Recorded events	Number of fatalities	Overall losses (EUR billion)
Storm	155	729	44.338
Extreme temperature events	101	77 551	9.962
Forest fires	35	191	6.917
Drought	8	0	4.940
Flood	213	1 126	52.173
Snow avalanche	8	130	0.742
Landslide	9	212	0.551
Earthquake	46	18 864	29.205
Volcano	1	0	0.004
Oil spills	9	n/a	No comprehensive data available (a)
Industrial accidents	339	169	No comprehensive data available (b)
Toxic spills	4	n/a	No comprehensive data available (c)
Total	**928**	**98 972**	**148.831**

Note: (a) Estimation is between EUR 500 and EUR 500 000 per tonne of oil spilled.
(b) Costs for major events reported in Table 12.1 aggregately amount to more than EUR 3.7 billion.
(c) Costs for one particular toxic spill amount to EUR 377 million, see Chapter 13.

Source: EM-DAT, 2010; EMSA, 2010; MARS, 2010.

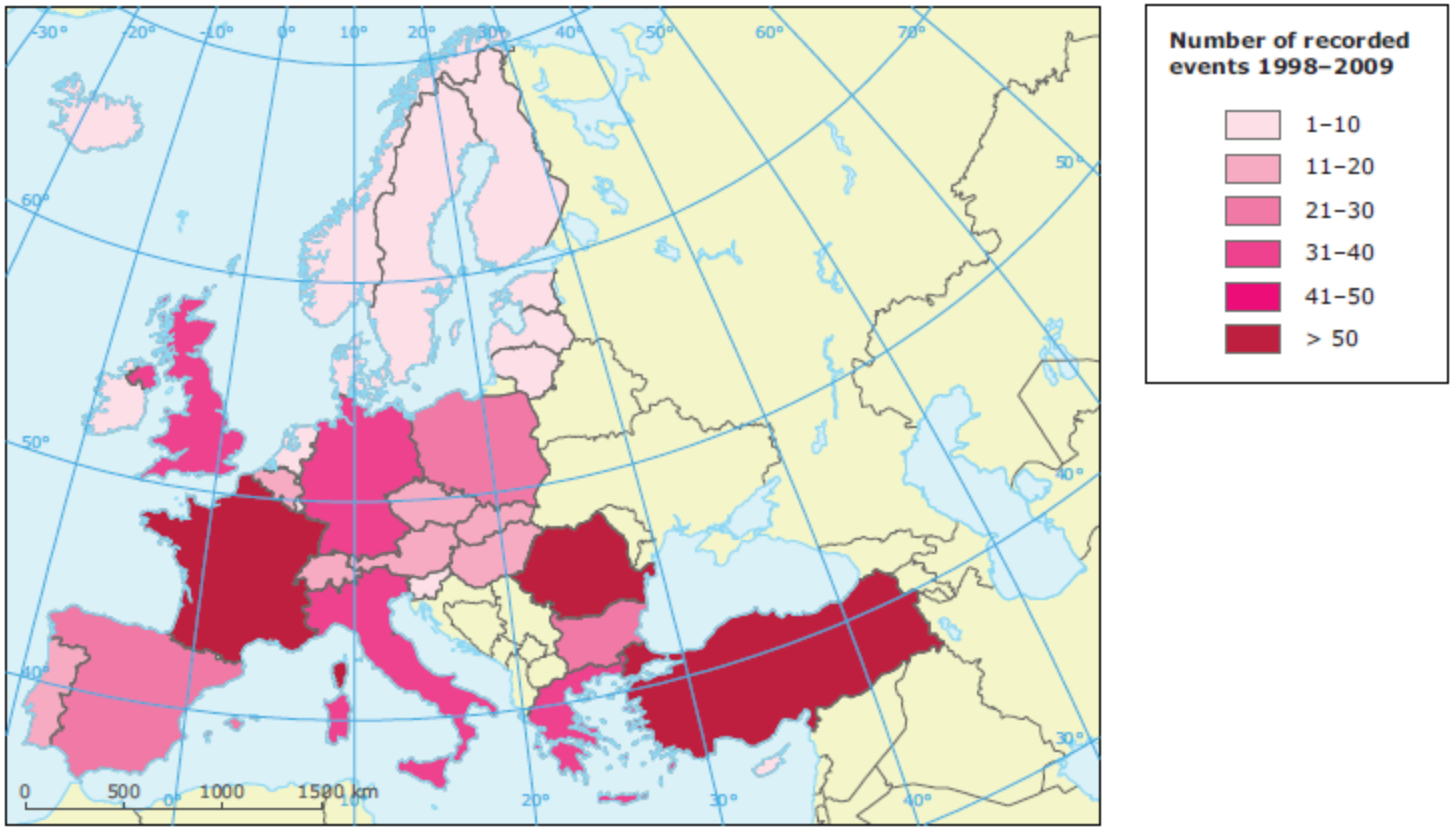
Table 2.1 Disasters caused by natural hazards in Europe in 1998–2009 as recorded in EM-DAT

Hazard type	Recorded events	Number of fatalities	Number of people affected (million people)	Overall losses (billion EUR (a))	Insured losses (billion EUR)
Storm	155	729	3.803	44.338	20.532
Extreme temperature events	101	77 551	0.005	9.962	0.186
Forest fires	35	191	0.163	6.917	0.097
Drought	8	0	0	4.940	0.000
Flood	213	1 126	3.145	52.173	12.331
Snow avalanche	8	130	0.01	0.742	0.198
Landslide	9	212	0.007	0.551	0.206
Earthquake	46	18 864	3.978	29.205	2.189
Volcano	1	0	0	0.004	0.000
Total	576	98 803	11.112	148.831	35.739

Note: (a) Loss values in US Dollars in EM-DAT are converted to euro per year using the respective exchange rates at the end of the corresponding year (EUR 1 = USD x; x: 1.18 (1998); 1.01 (1999);0.93 (2000); 0.88 (2001); 1.05 (2002); 1.26 (2003); 1.36 (2004); 1.18 (2005); 1.33 (2006); 1.47 (2007); 1.39 (2008); 1.44 (2009); cf. www.ecb.int/stats/exchange/eurofxref/html/eurofxref-graph-usd.en.html.

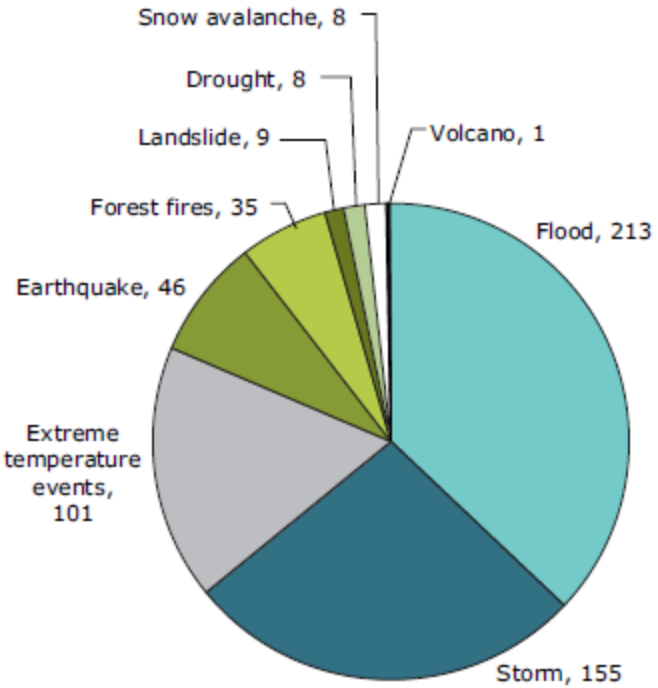
Source: EM-DAT, 2010.

Figure 2.1 Number of disastrous events recorded in EM-DAT by country in 1998–2009



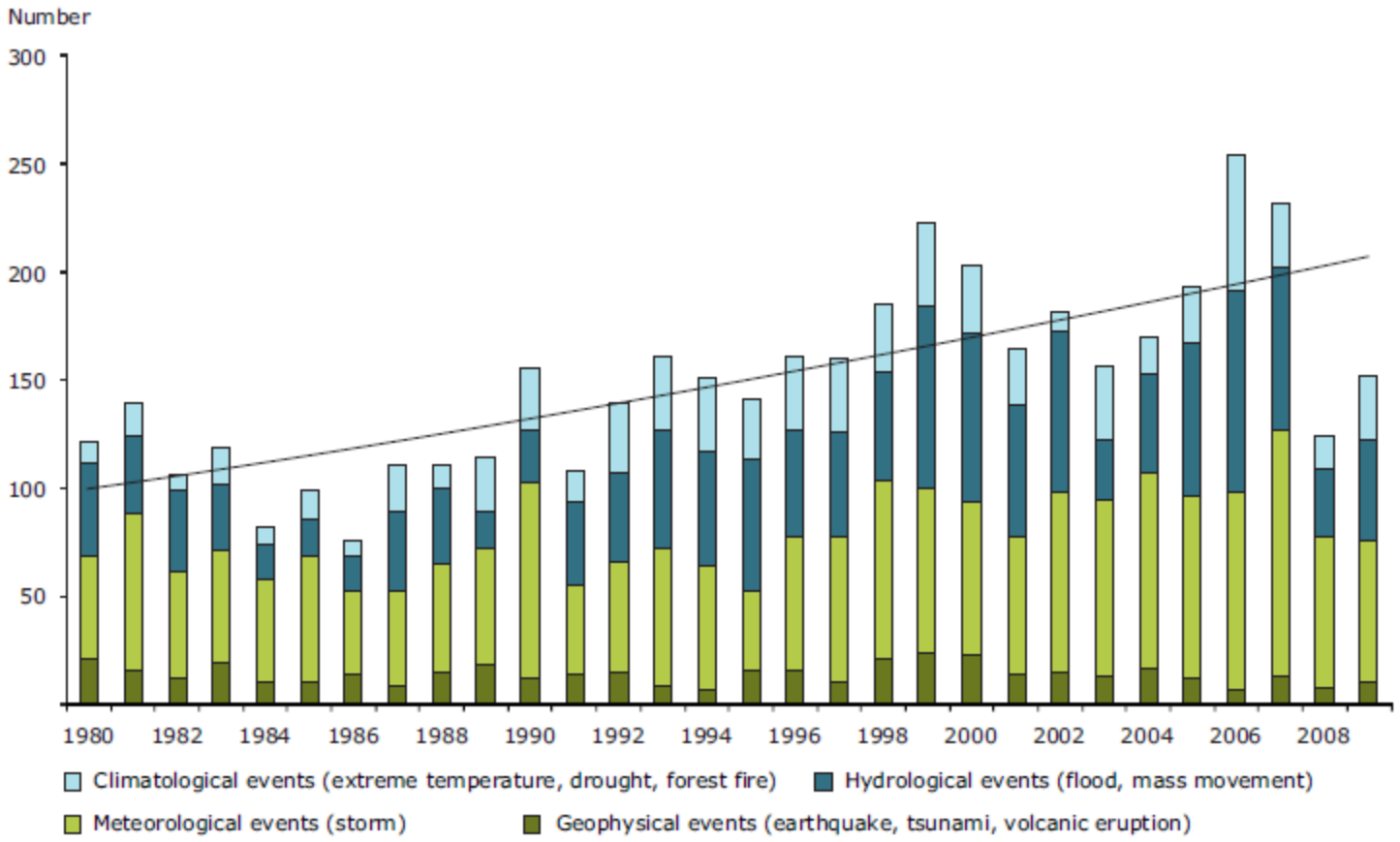
Source: ETC-LUSI based on EM-DAT, 2010.

Figure 2.2 Disastrous events recorded in EM-DAT by hazard type in 1998–2009



Source: ETC-LUSI based on EM-DAT, 2010.

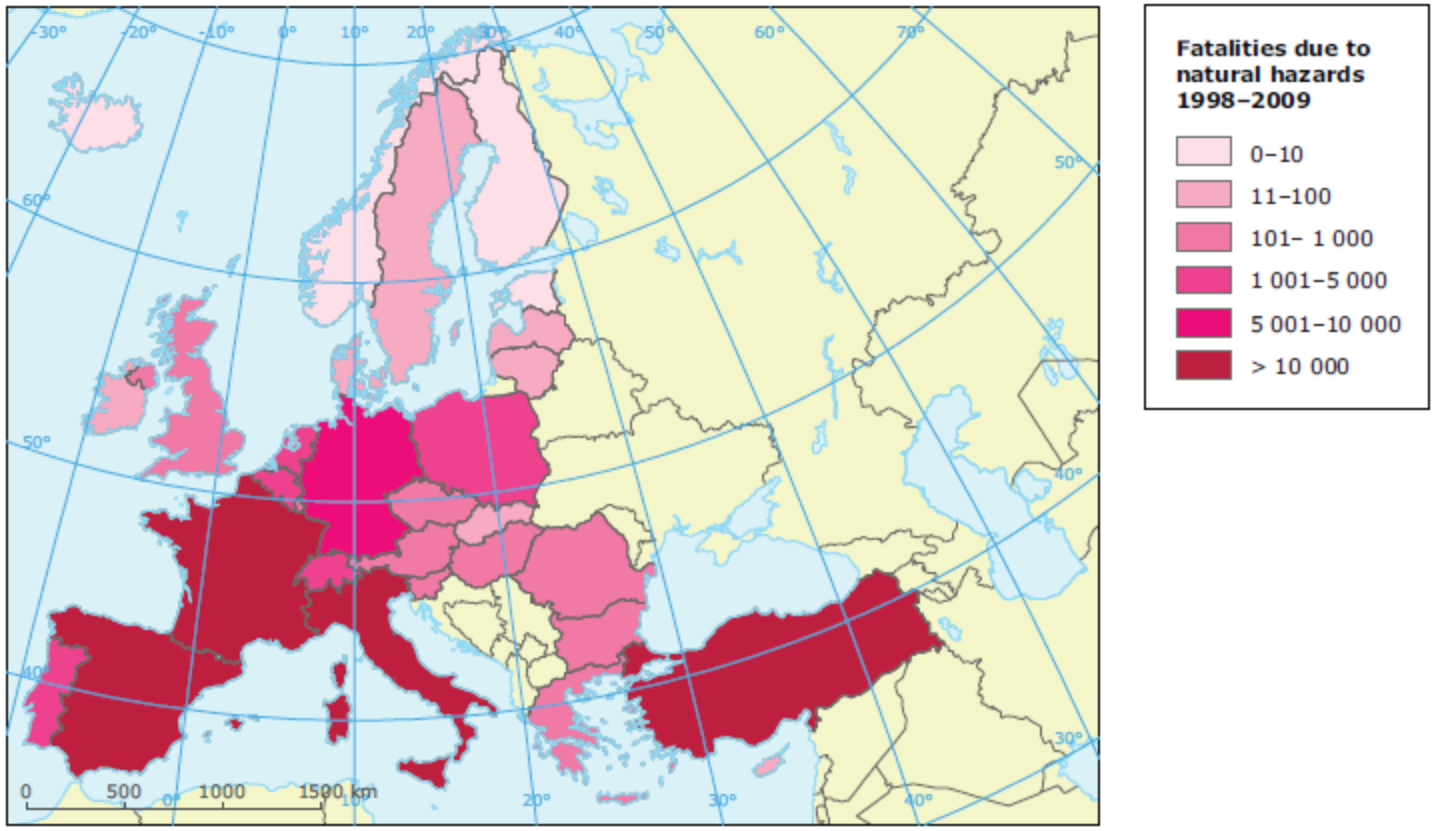
Figure 2.3 Disasters due to natural hazards in EEA member countries, 1980–2009



Note: Definition loss events, events can occur in several countries, events are counted countrywise.

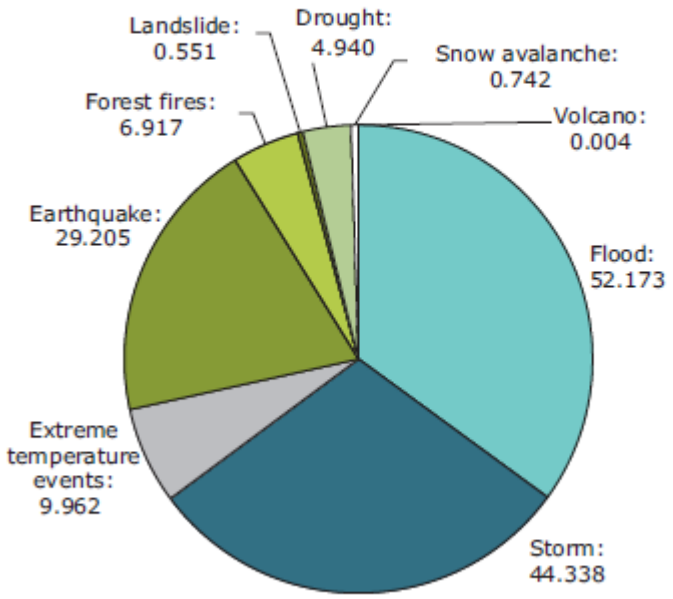
Source: NatCatSERVICE, 2010; © 2010 Münchener Rückversicherungs-Gesellschaft, Geo Risks Research, NatCatSERVICE — as at August 2010.

Figure 2.5 Number of human fatalities caused by natural hazards in Europe in 1998–2009 as shown in EM-DAT



Source: ETC-LUSI based on EM-DAT, 2010.

Figure 2.7 Overall losses by hazard type 1998–2009 according to EM-DAT (billion EUR)



Source: ETC-LUSI based on EM-DAT, 2010.

Figure 2.8 Overall losses by country in 1998–2009 according to EM-DAT

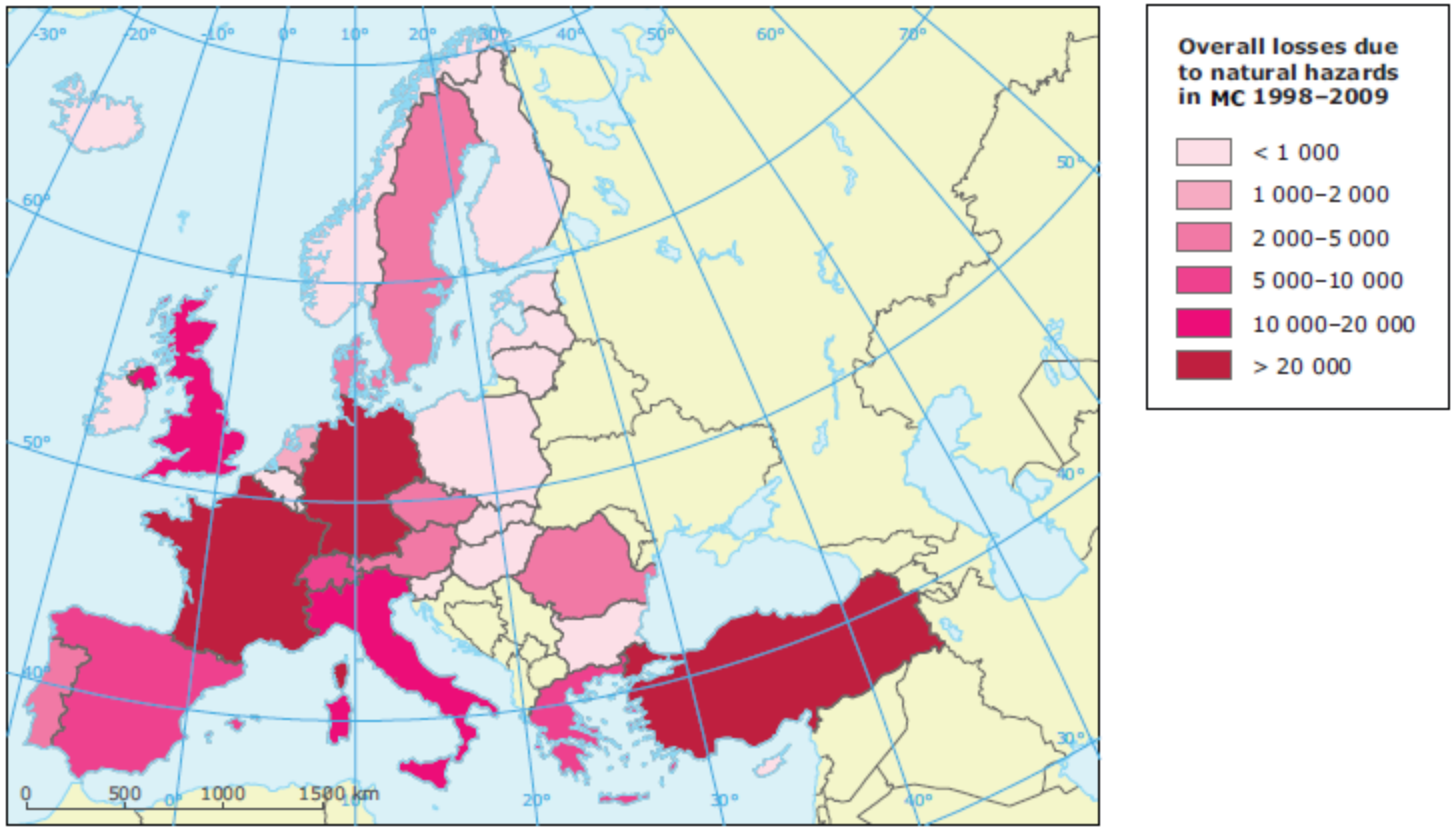
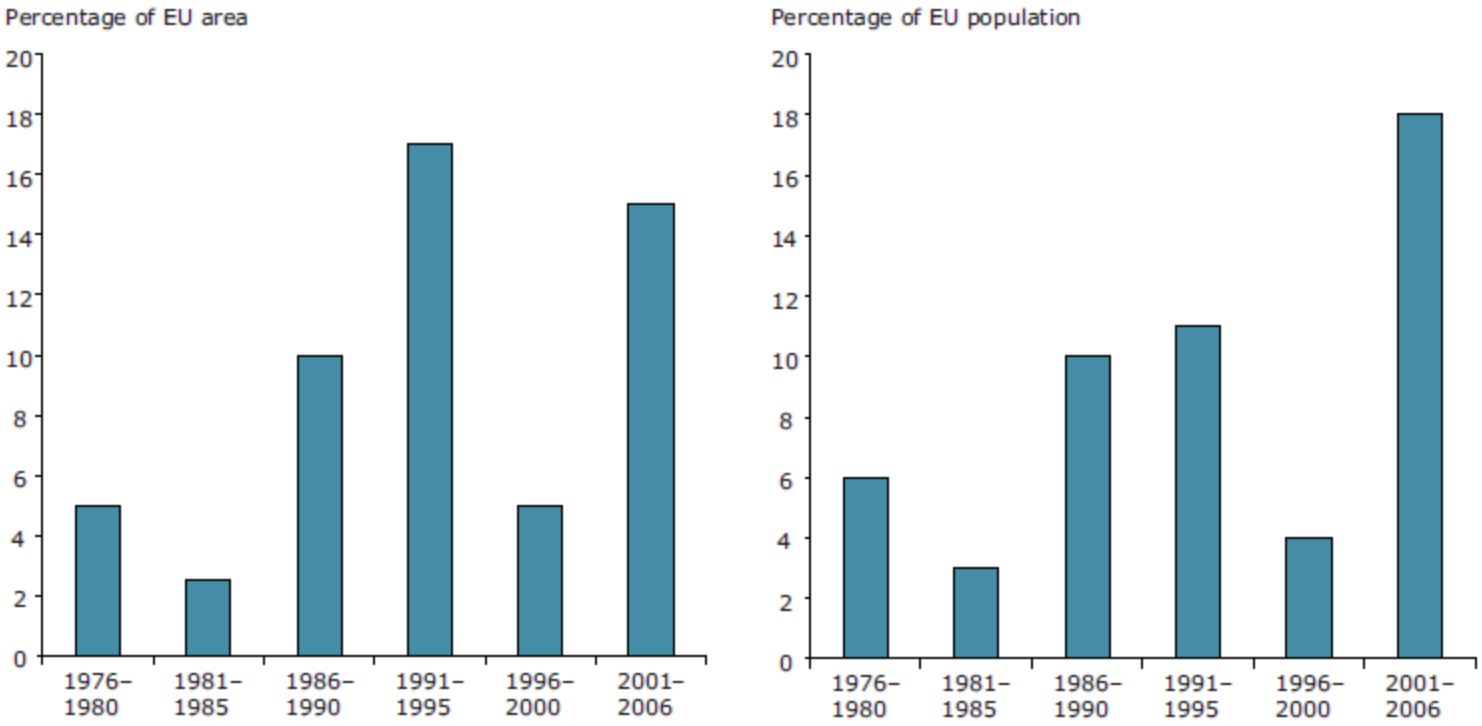
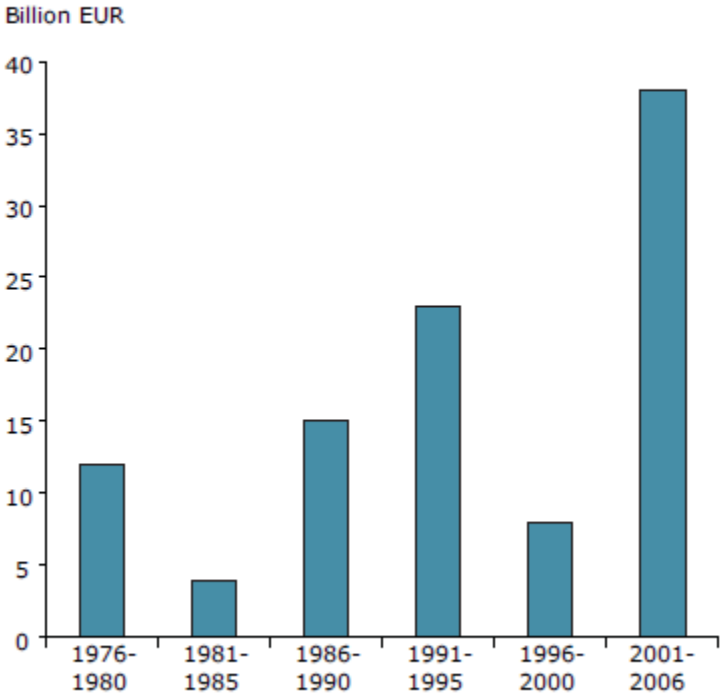


Figure 6.1 EU area (left) and population (right) affected by WSD in the last 30 years



Source: Member States data, EC, 2006. Note that the diagrams present the average area and population being affected in the periods. In dry years a higher percentage is affected.

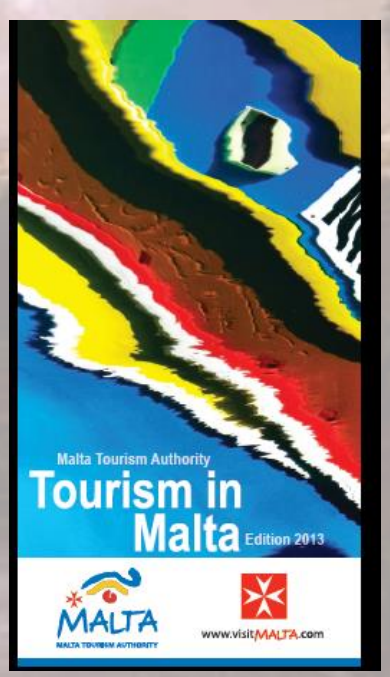
Figure 6.3 Economic impact of WSD events in Europe



Sources: Member States data (EC, 2006).

Main Indicators of Inbound Tourism to Malta

	2011	2012	2013	Change 2013/12
Inbound Tourists	1,415,018	1,443,414	1,582,153	9.6%
Tourist Guestnights	11,241,472	11,859,521	12,890,268	8.7%
Average length of stay	7.9	8.2	8.1	-1.2%
Tourist Expenditure (€ '000s)	1,221,321	1,326,474	1,440,379	8.6%



Grazie