Comparator Report on Patient Access to Cancer Drugs in Europe

Nils Wilking MD PhD
Karolinska Institutet, Stockholm, Sweden

Bengt Jönsson, Professor
Stockholm School of Economics, Stockholm, Sweden

Daniel Högberg and Nahila Justo, i3 Innovus, Stockholm, Sweden

January 15, 2009.
www.comparatorreports.se
supported by a research grant from EFPIA

The presentation is based on three reports.

2005

A pan-European comparison regarding

patient access to cancer drugs

http://ki.se/content/1/c4/33/52/Cancer_Report.pdf

2007

A global comparison regarding

patient access to cancer drugs

http://annonc.oxfordjournals.org/content/vol18/suppl_3/

2009

Comparator Report on Patient Access to Cancer Drugs in Europe

www.comparatorreports.se

Karolinska Institutet

Key Learnings (1)

- European cancer incidence is increasing and mortality decreasing
  - indicating the efficacy of screening programs and modern treatments
- Survival for most cancers is improving significantly
  - but there is great variation between countries within Europe and across diagnoses
- European countries spend more on cancer screening, prevention and treatment
  - but costs for cancer as share of health care expenditures (6-8%) is still far lower than the relative burden of the disease (16% of DALYs lost).
- There is a trend towards more ambulatory treatments,
  - which reduced the number of hospital-days for cancer, despite more patients being treated

Karolinska Institutet

Key learnings (2)

- Indirect costs
  - Are reduced due to reduced mortality and morbidity
  - The average duration per case of inability to work due to cancer is dropping for most diagnoses
  - But still twice as high as the direct costs
- Cost of cancer drugs
  - Has increased rapidly, but still only 15 per cent of total direct costs
  - Will continue to increase but at a slower pace
- Role of HTA for access has increased
  - But still no evidence of major impact on access
  - Differences in access explained by economic, health care, and medical practice factors

Karolinska Institutet

Recent cancer survival data in selected countries
5 year survival (%) in Europa and the US.

Please note that SEERS data do not cover uninsured patients.

EUROCARE-4 data. (Lancet Oncology sept/2007).

	Eurocare-4 mean	England	Sweden	Poland	SEERS USA
Overall Men Women	 47.3 55.8	 44.8 52.7	 60.3 61.7	 38.8 48.3	 66.3 62.9
Breast cancer	79.0	77.8	86.3	73.9	90.1
Colorectal cancer	56.2	51.8	59.8	46.0	65.5
Lung cancer	10.9	8.4	13.9	14.0	15.7

Direct costs for cancer in Euro and % of total health care costs.

- Previous report (2004)
  - 125 Euro per capita (6.4)
- Current report (2007)
  - 148 Euro per capita (6.3). Examples below
    - Austria 6.4
    - Denmark 6.4
    - Finland 4.4
    - Norway 6.4
    - Sweden 7.2

Karolinska Institutet

Direct costs for cancer care in selected countries in 2004 and 2007.

Costs are PPP (Purchasing Power Parity) adjusted.

Per capita in euro, and share of total health care costs(%)

Country	2004	2007	2007 (%)
France	124	205	6.6%
Germany	147	216	7.2%
Italy	117	128	5.7%
Spain	102	125	5.7%
UK	94	132	5.6%
Hungary	49	61	5.0%
Poland	30	41	5.0%

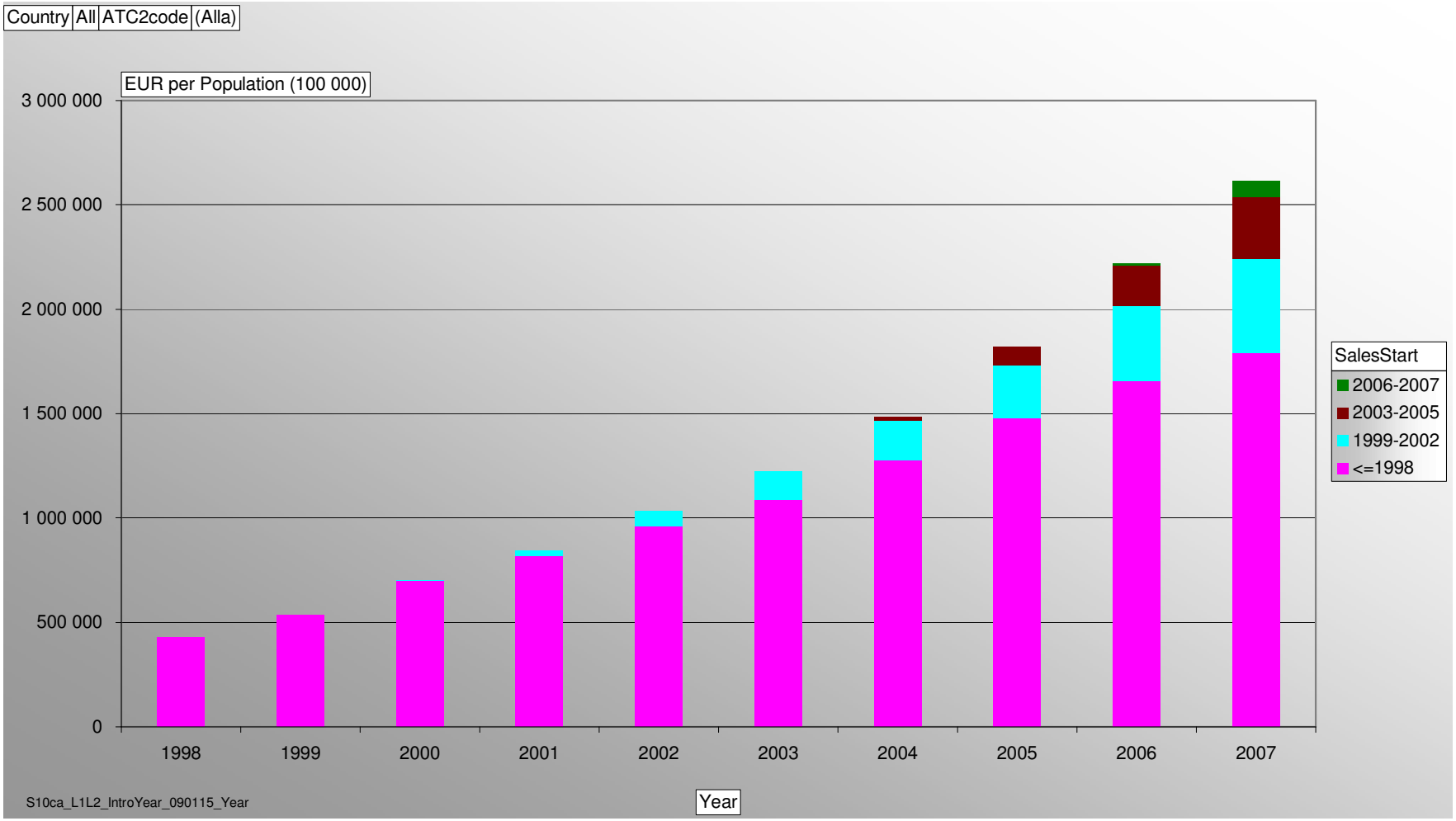
Direct cost of cancer in Euro per capita

Under 50	50-100	100-150	150-200	Over 200
Bulgaria Romania	Czech Republic	Italy	Belgium Netherlands	Austria Norway
Estonia Latvia Lithuania	Finland? Hungary	Spain Portugal	Denmark	France Germany
Poland	Slovenia	United Kingdom	Ireland Iceland	Luxembourg
Slovakia			Greece	Sweden Switzerland

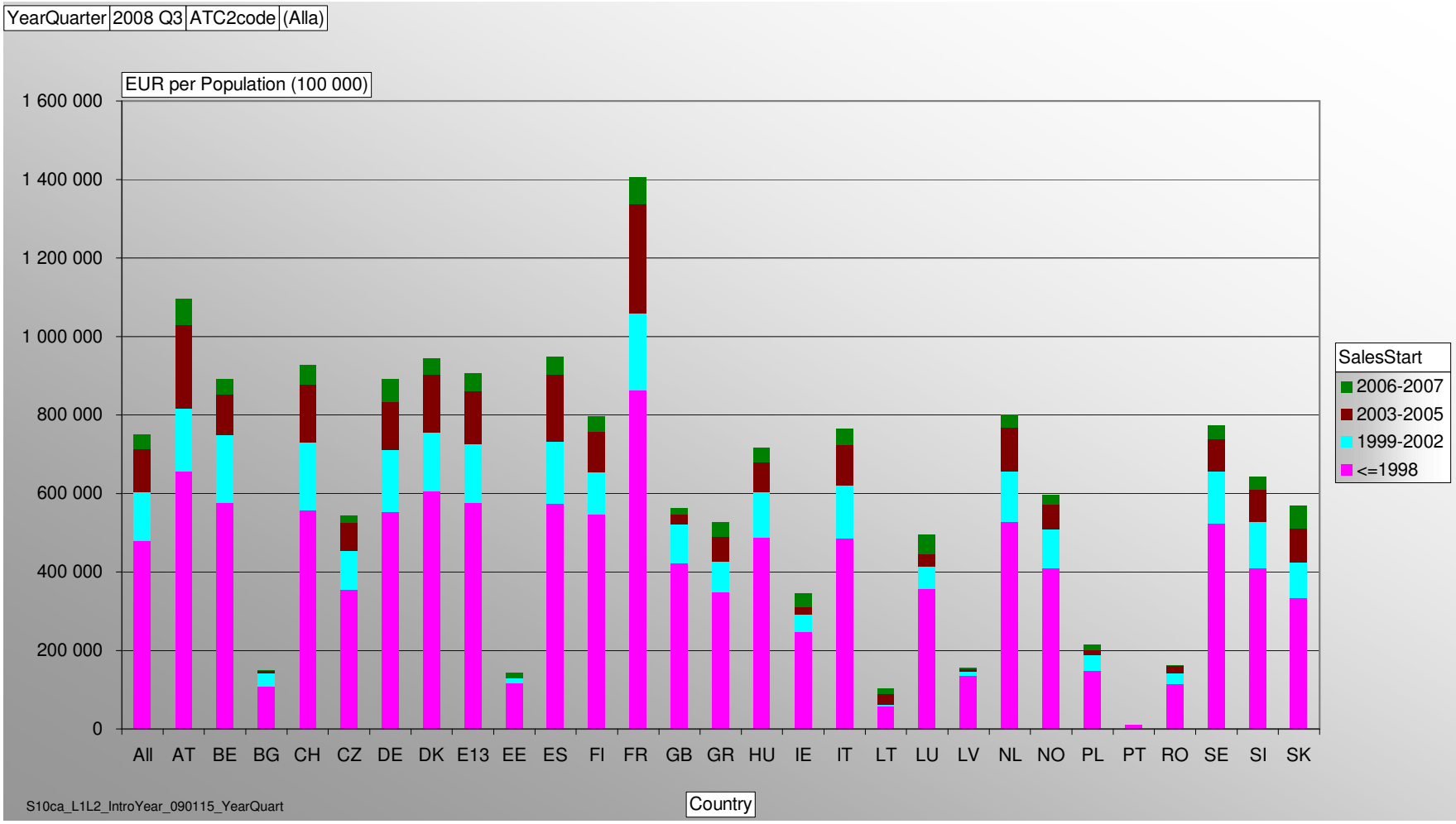
Cost of cancer in Europe – summary

- Hospital care still major cost item
  - But resources increase more in ambulatory care
  - Number of bed days are reduced despite growing number of patients treated
- Cost of cancer drugs has increased rapidly
  - But still only 15 per cent of total direct costs
  - Will continue to increase but at a slower pace
- Indirect costs
  - Are reduced due to reduced mortality and morbidity
  - But still twice as high as the direct costs
    - Example breast cancer

Total annual sales per 100 000 of population of cancer drugs (L1+L2 A and B) in Europe 1998-2007. Different colors of the bars indicate first year of sales for the product (”vintage”).

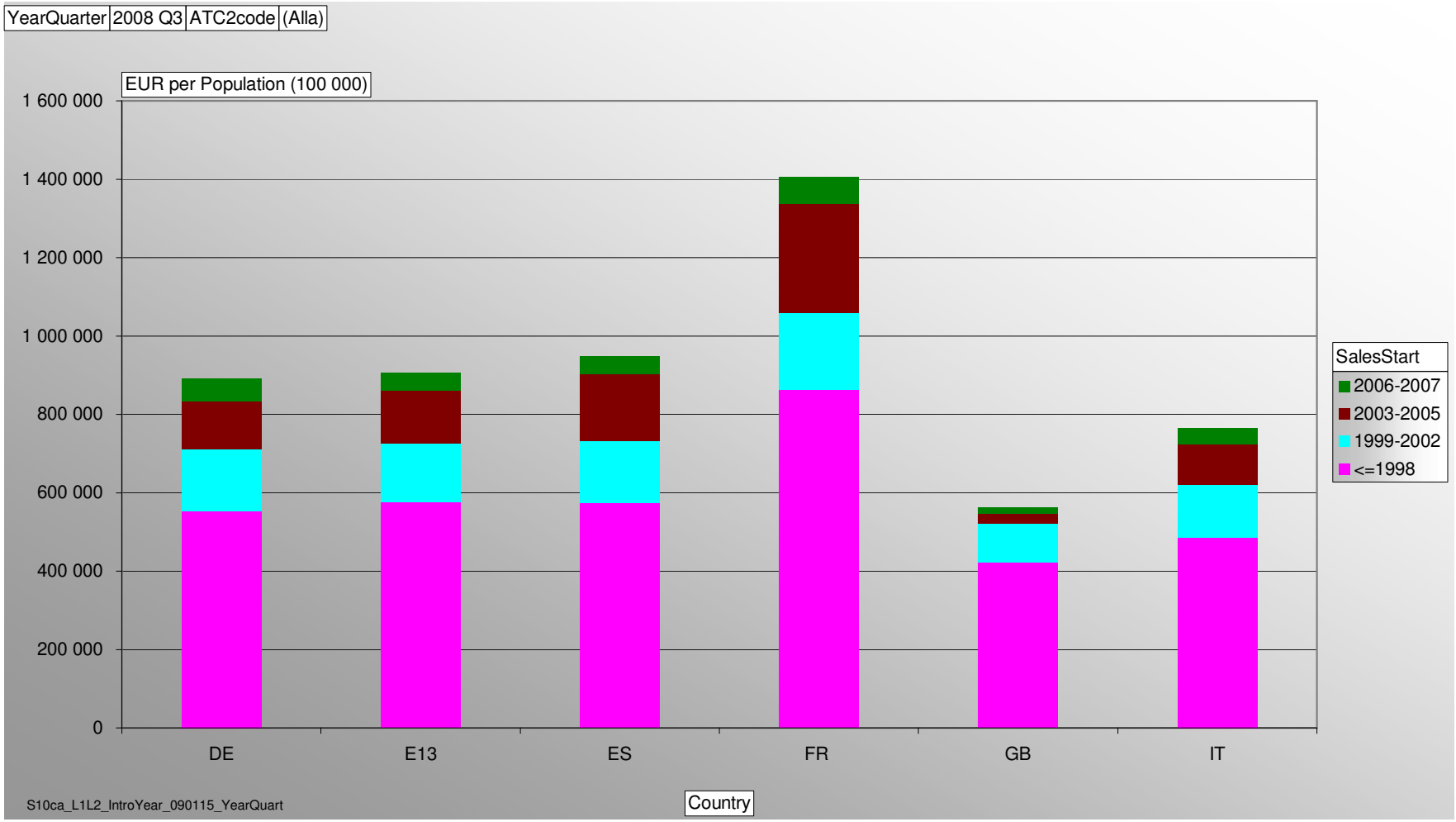


Sales of cancer drugs per 100 000 inhabitants in Europe in Q3 2008.



Karolinska Institutet

Sales of cancer drugs per 100 000 inhabitants in E13 (Wester European average), France, Germany, Italy, Spain and the UK in Q3 2008.



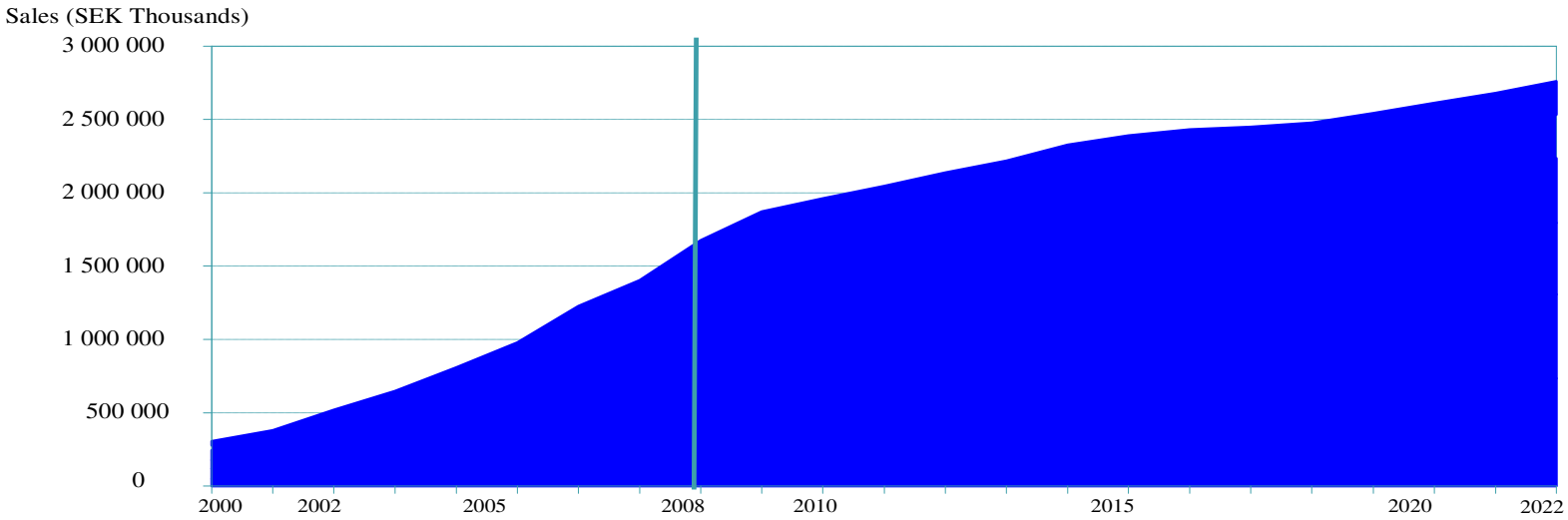
Cancer drug development and new drug introductions in the future.

- Cancer the most rapidly growing target for R&D in the pharmaceutical industry
  - 25-30 % of all R&D spending
- New products and new indications
  - 50 new products in the coming 5 years. (25 during 1995-2005)
  - 3-4 new indications for each marketed drugs
- Growth in sales more rapid than in other areas; increased 5 times during the last ten years
- Growth will continue but at a lower rate

Karolinska Institutet

The future of cancer drug sales. Sweden as an example (Sales 2000-2007 and forcast 2008-2022.)

http://www.lif.se/cs/Publik%20webb/Sidinnehall/Publik_Dokument/Rapporter%20och%20remisser/Rapporter_Riktlinjer_Policy/Rapporter/2008_6_L%C3%A4kemedelsutvecklingen%20inom%20canceromr%C3%A5det.pdf
(report in Swedish)



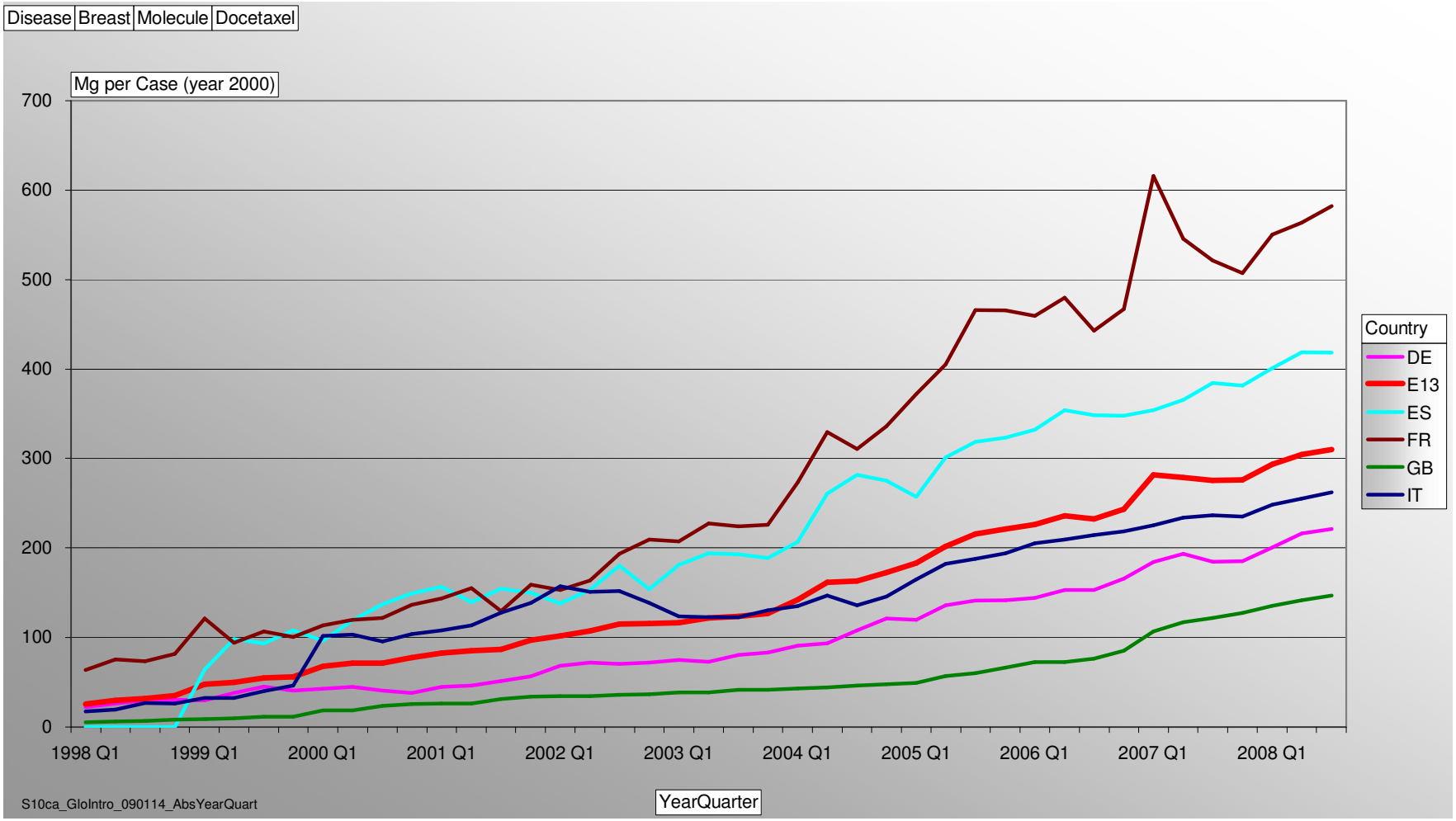
Examples of variations between countries in use of cancer drugs

Mg/case of cancer or mg/ 100 000 inhabitants Q1 1998 – Q3 2008.

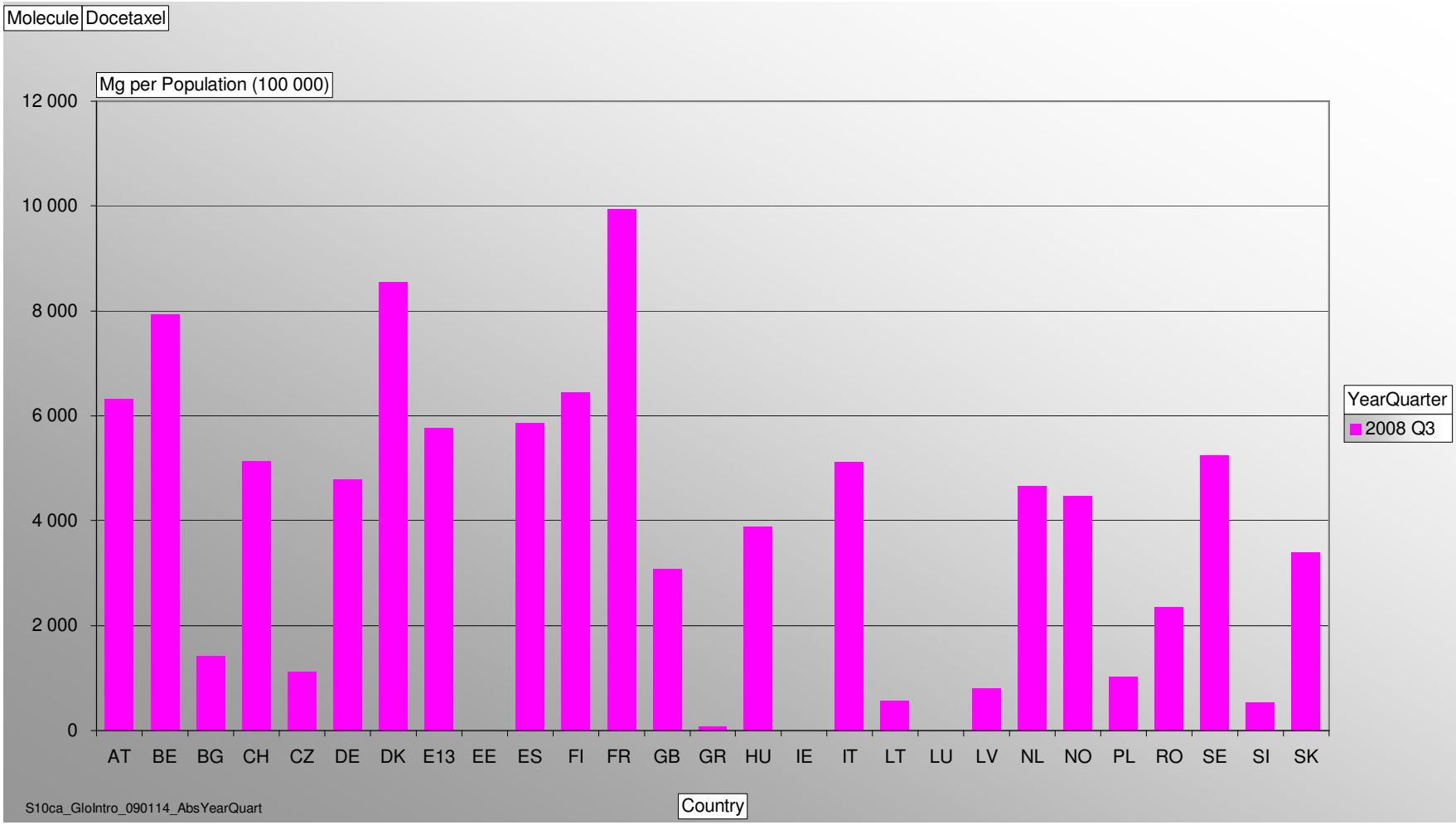
- Breast cancer
  - docetaxel- Taxotere®
  - trastuzumab- Herceptin®
- Colorectal cancer
  - bevacizumab-Avastin®
  - cetuximab- Erbitux®
- Chronic Myeloic Leukemia
  - imatinib- Glivec®
- Non- Hodgkin lymphoma
  - rituximab- MabThera®

Karolinska Institutet

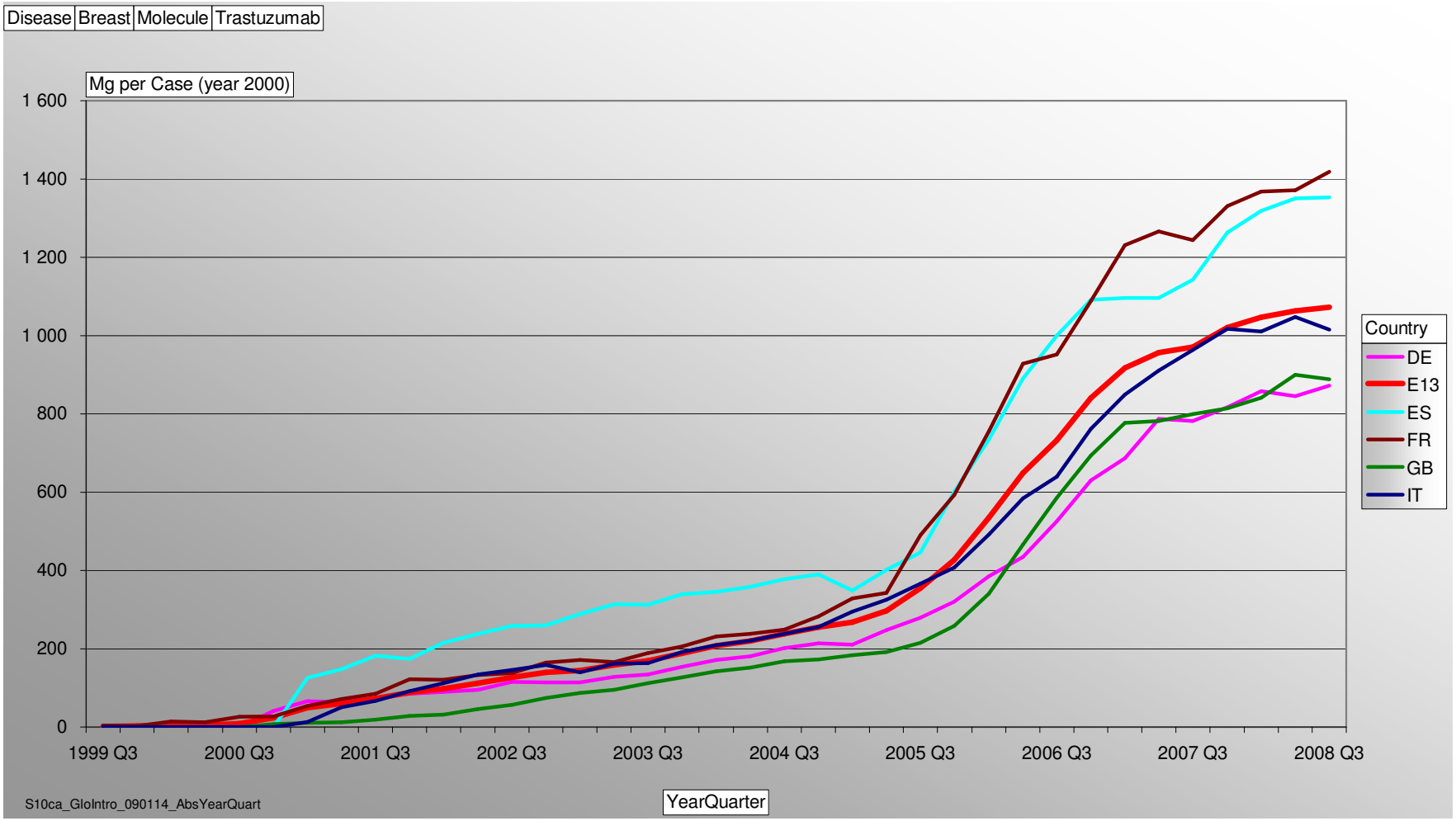
Use of docetaxel, Taxotere® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



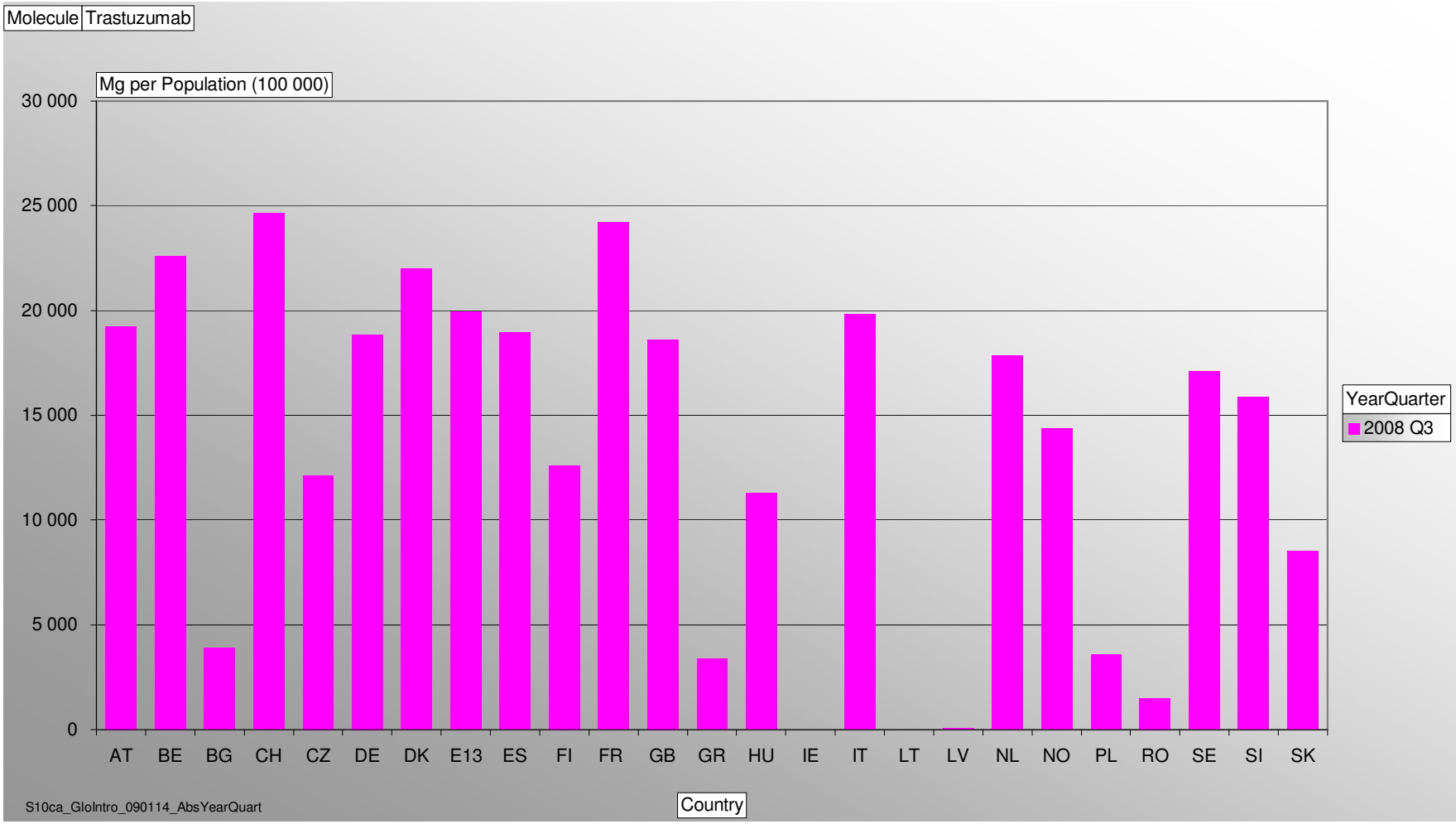
Use of docetaxel, Taxotere® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



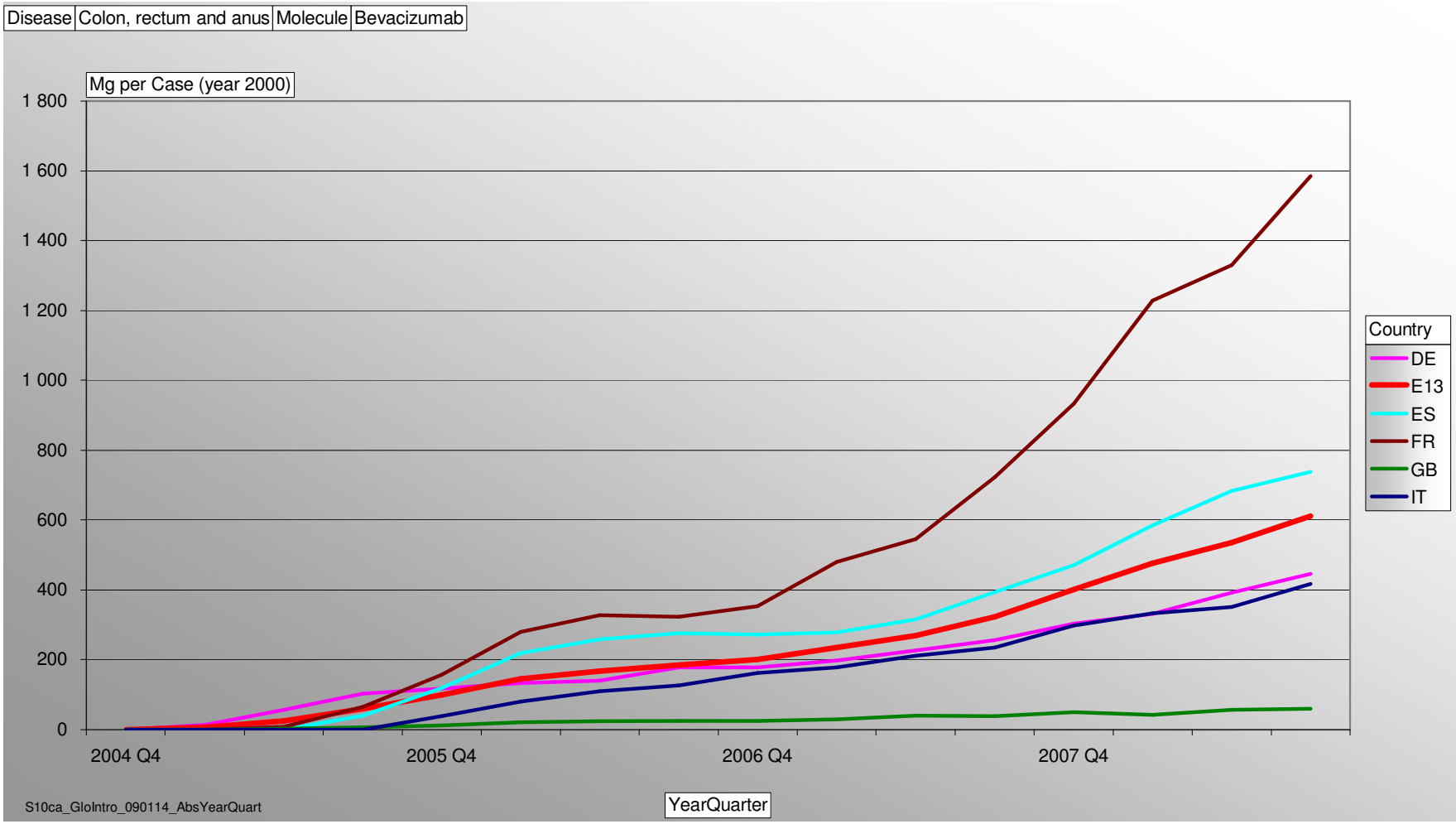
Use of trastuzumab, Herceptin® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



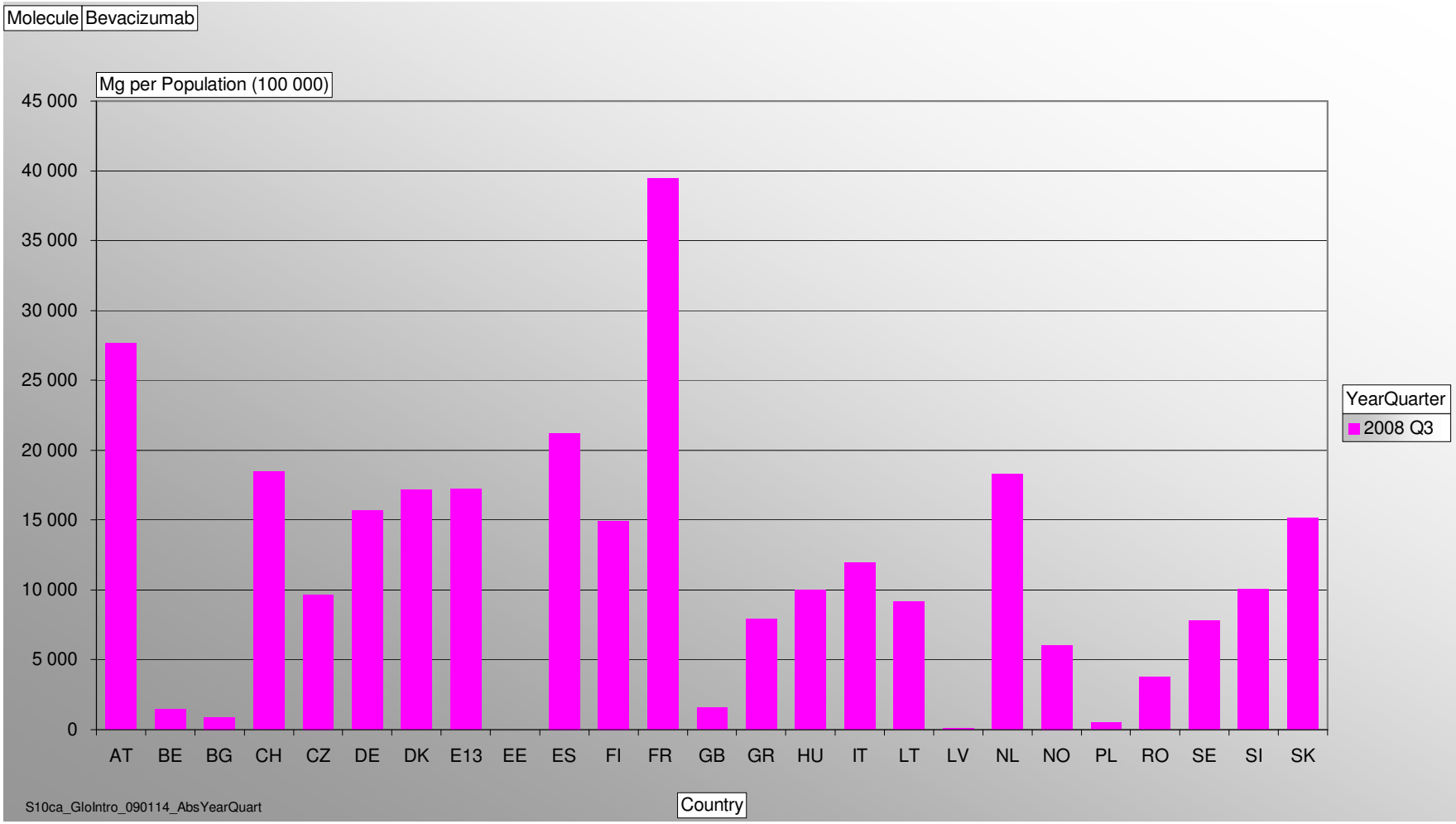
Use of trastuzumab, Herceptin® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



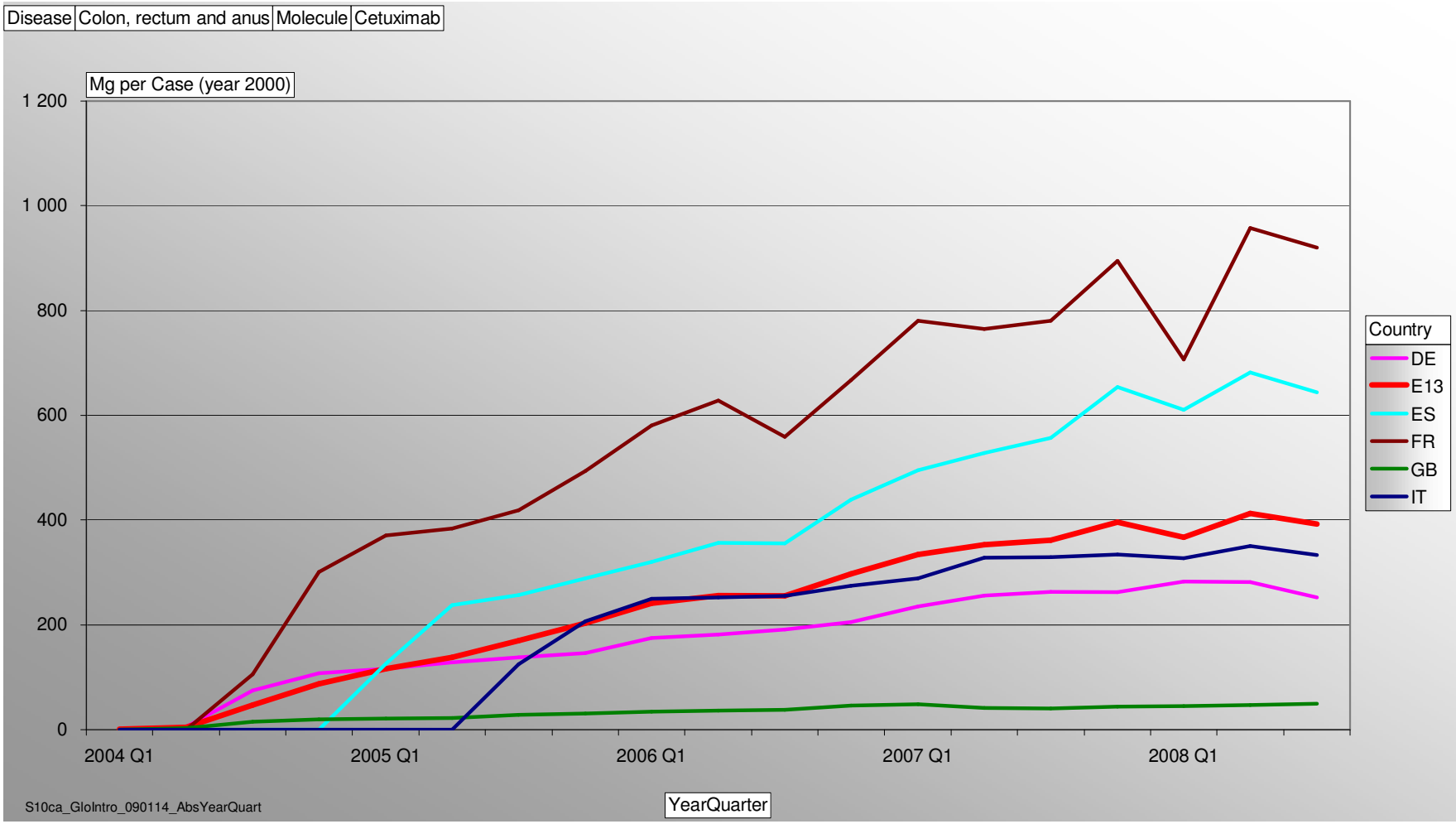
Use of bevacizumab, Avastin® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



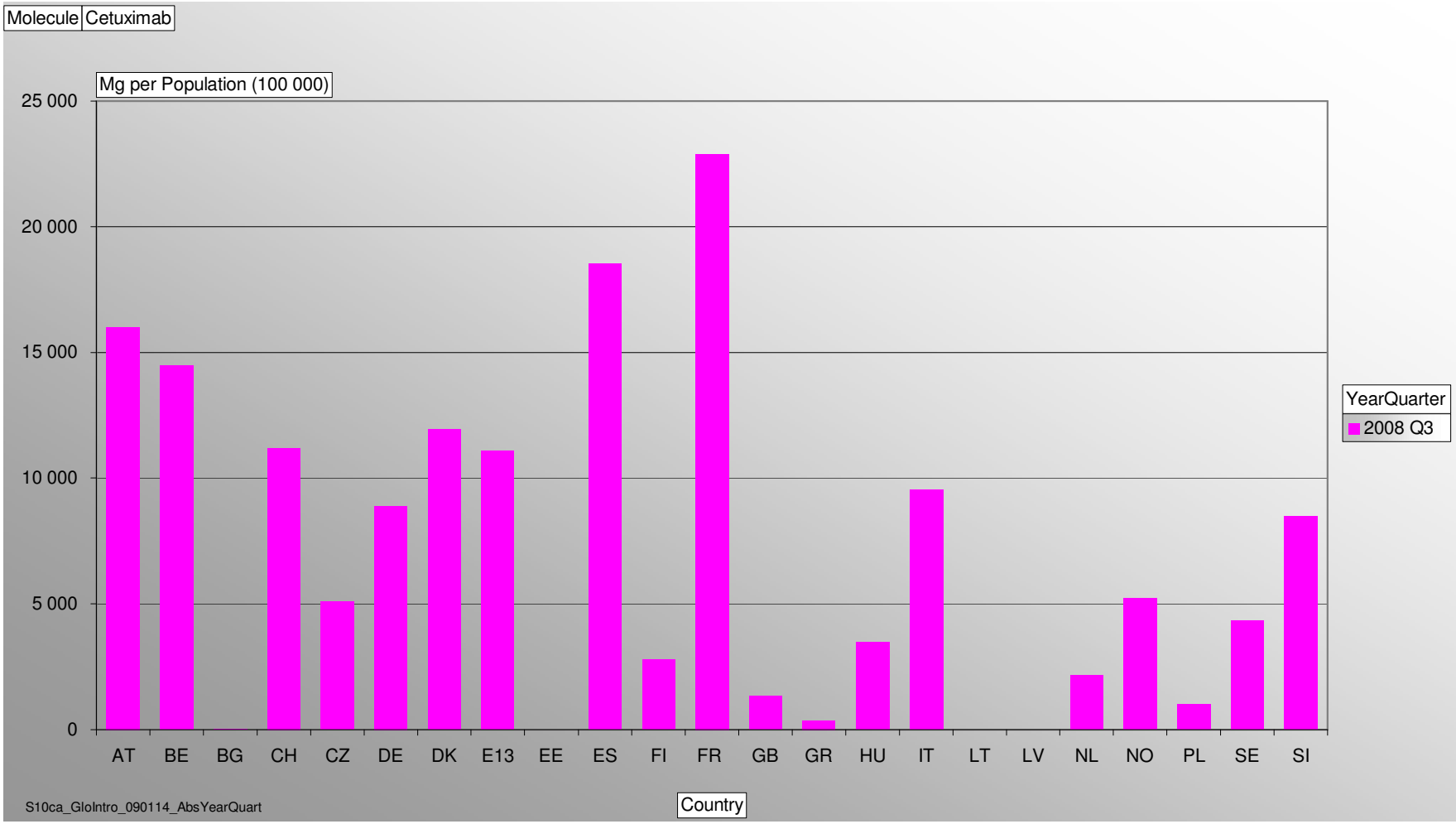
Use of bevacizumab, Avastin® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



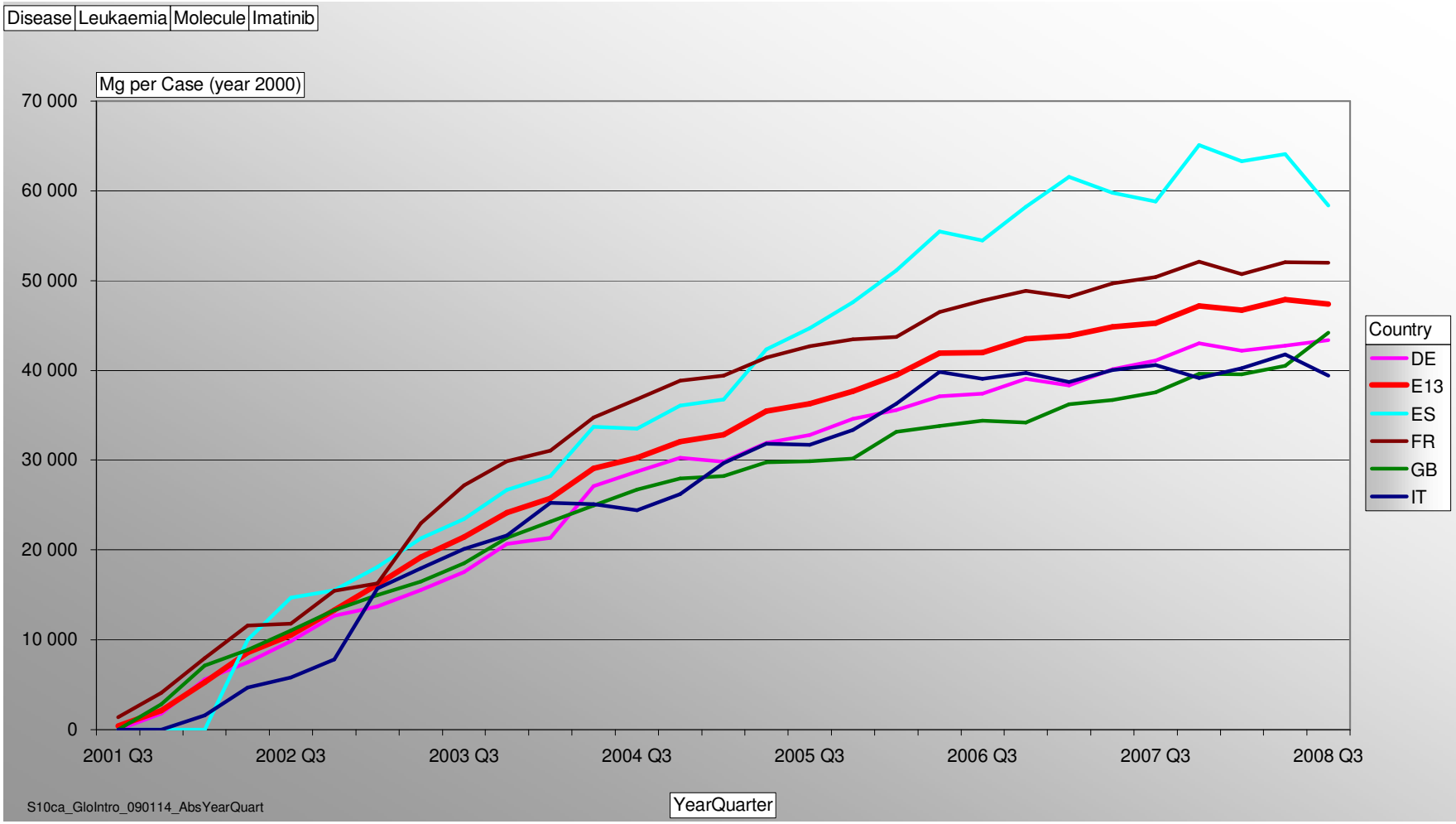
Use of cetuximab, Erbitux® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



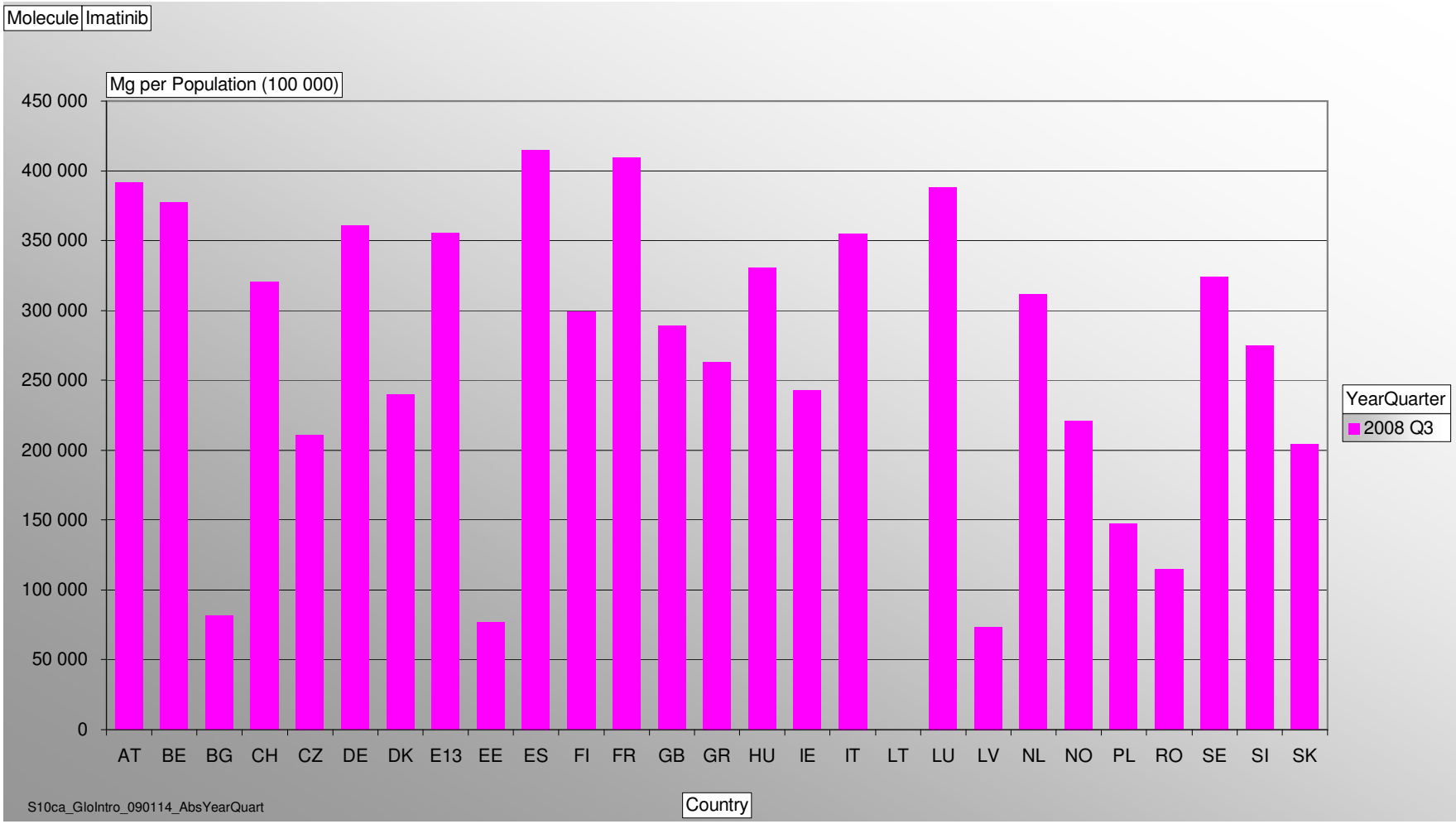
Use of cetuximab, Erbitux® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



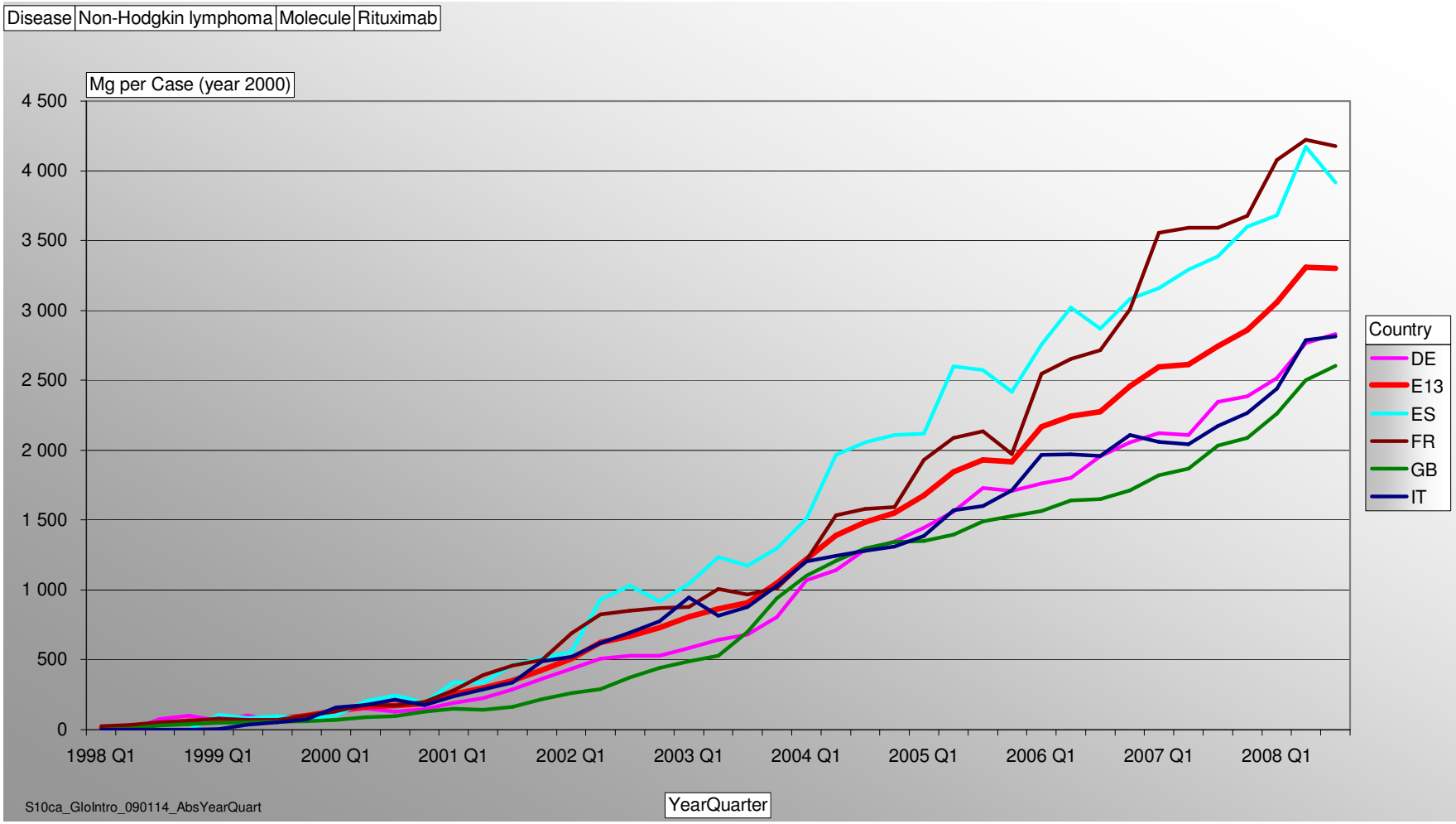
Use of imatinib, Glivec® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



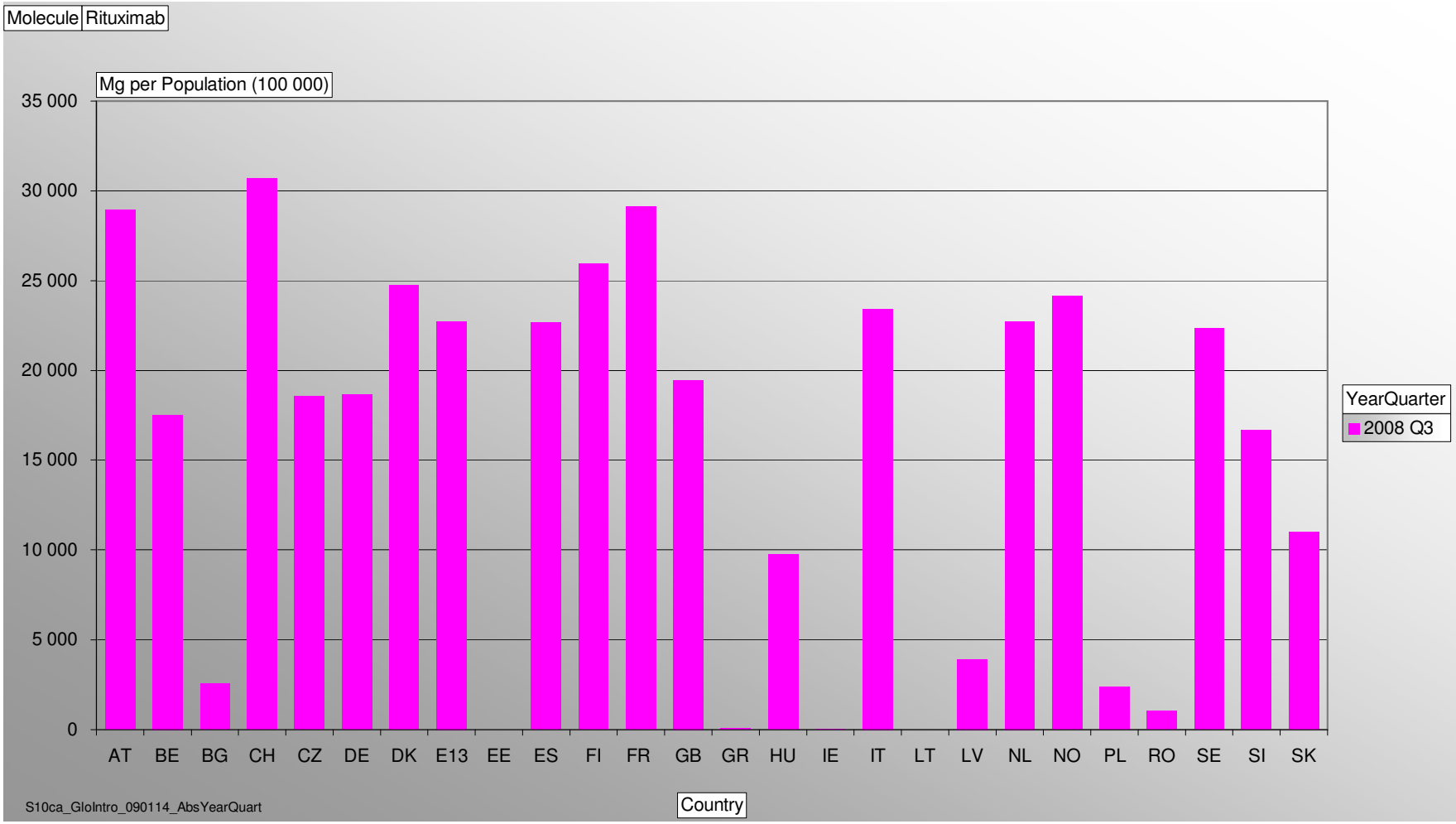
Use of imatinib, Glivec® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



Use of rituximab, MabThera® (mg/case) in E13 (western European average), France, Germany, Great Britain, Italy, and Spain.



Use of rituximab, MabThera® per 100 000 inhabitants in Europe in Q3 2008. Incomplete sales data from Greece, Ireland, Luxembourg and Portugal.



Role of economic factors in determining access

- Countries with low GDP and health care expenditures per capita have lower access
- A positive reimbursement decision or guidance for use is important but not decisive
- Specific funding mechansims for in- or outpatient use in hospitals is an important explanatory factor

The role of HTA and economic evaluation

- So far limited impact on access
  - Despite over 50 evaluations of cancer drugs by NICE
  - Weak link between assessment, guidance and resource allocation
- Problems to undertake a timely HTA
  - Limited clinical data
  - Need for long term follow up
- Cost-effectiveness is related to indication
  - Early indications may not be cost-effective
  - Products are available before the assessment is done
- But will be of increasing importance

Karolinska Institutet

Important policy issues for access

- Hospital versus ambulatory treatment
  - Different financing and reimbursement rules
  - Different incentives for providers
- Separate budgets for expensive drugs
  - May give opportunity to go outside traditional financing
  - In some countries limited to orphan drugs
- Registers and follow up data
  - May be an instrument for early access
  - But is also a management instrument for payers
- Regional health care budgets
  - Opportunity for establishing a therapy
  - Create variations in access

Karolinska Institutet