Munich Cancer Registry



- ▶ Baseline statistics
- ▶ Selection Matrix
- ▶ Homepage
- ▶ Deutsch

Munich Cancer Registry at Munich Cancer Center Marchioninistr. 15 Munich, 81377 Germany

http://www.tumorregister-muenchen.de/en

Cancer statistics: Survival

GI-NET: Gastroint. neuroend. tumor

| Year of diagnosis | 1988-2013 |
|-------------------|------------|
| Patients | 1,920 |
| Diseases | 1,935 |
| Cases evaluated | 912 |
| Creation date | 05/13/2015 |
| Export date | 12/30/2014 |
| Population | 4.64 m |



http://www.tumorregister-muenchen.de/en/facts/surv/surv_hGNETE.pdf

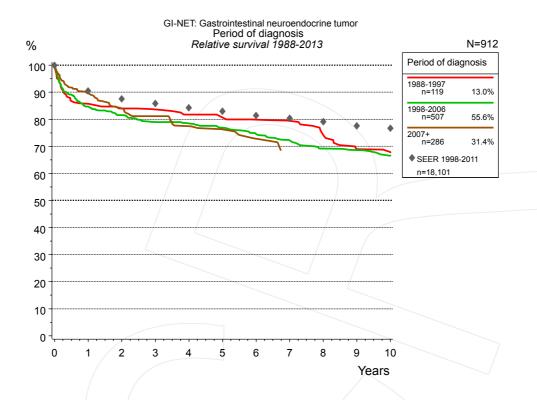


Figure 1a. Relative survival of patients with gastroint. neuroend. tumor by period of diagnosis. Included in the evaluation are 912 cases diagnosed between 1988 and 2013.

The presented survival curves are derived from clinical records with valid follow-up informations, which means that death certificate cases (DCO) cases are omitted from the analysis. With this one restriction, the MCR has provided population-based statistics since 1988, collecting data on all cancer cases in the region of southern Bavaria. Historical data of previous time periods can be heavily selected, therefore, univariate survival comparisons of the presented time periods must be carefully considered. Nonetheless, all calculable survival curves are depicted to facilitate the comparison of long time follow-up analyses of relative survival between particular cancers.

| Period of diagnosis | | | | | | | |
|---------------------|--------|--------|--------|--------|--------|--------|--|
| | 1988- | 1997 | 1998- | 2006 | 200 | 7+ | |
| | n=119 | | n=5 | 507 | n=2 | 286 | |
| Years | obs. % | rel. % | obs. % | rel. % | obs. % | rel. % | |
| 0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | |
| 1 | 83.2 | 85.8 | 83.0 | 84.7 | 88.0 | 89.6 | |
| 2 | 79.8 | 83.9 | 78.5 | 81.6 | 81.2 | 84.0 | |
| 3 | 78.2 | 83.6 | 74.6 | 79.0 | 77.8 | 81.2 | |
| 4 | 74.8 | 81.8 | 72.9 | 78.5 | 73.1 | 77.5 | |
| 5 | 72.2 | 80.7 | 70.0 | 76.9 | 70.3 | 76.3 | |
| 6 | 70.5 | 79.8 | 66.7 | 74.6 | 66.0 | 72.8 | |
| 7 | 68.8 | 79.4 | 63.3 | 72.2 | 61.1 | 64.7 | |
| 8 | 63.6 | 74.1 | 59.5 | 69.2 | | | |
| 9 | 57.6 | 68.9 | 58.0 | 68.7 | | | |
| 10 | 55.7 | 67.8 | 54.8 | 66.6 | | | |
| | | | | | | | |

Table 1b. Observed (obs.) and relative (rel.) survival of patients with gastroint. neuroend. tumor by period of diagnosis for period 1988-2013 (N=912).

Munich Cancer Registry 05/13/2015 surv hGNETE.pdf

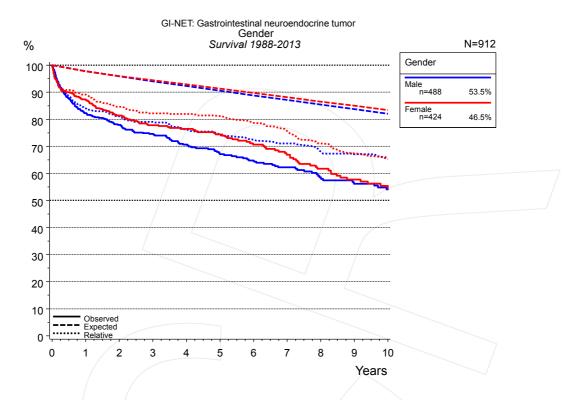


Figure 2a. Survival of patients with gastroint. neuroend. tumor by gender. Included in the evaluation are 912 cases diagnosed between 1988 and 2013.

| Gender | | | | | | | | | |
|--------|--------|--------|--------|--------|--|--|--|--|--|
| | Ma | ale | Female | | | | | | |
| | n=4 | 188 | n=424 | | | | | | |
| Years | obs. % | rel. % | obs. % | rel. % | | | | | |
| 0 | 100.0 | 100.0 | 100.0 | 100.0 | | | | | |
| 1 | 82.3 | 84.0 | 87.1 | 89.1 | | | | | |
| 2 | 77.9 | 81.1 | 81.4 | 84.6 | | | | | |
| 3 | 74.6 | 79.0 | 77.8 | 82.2 | | | | | |
| 4 | 70.6 | 76.2 | 76.4 | 82.0 | | | | | |
| 5 | 67.1 | 74.1 | 74.4 | 81.2 | | | | | |
| 6 | 64.8 | 72.5 | 70.6 | 78.7 | | | | | |
| 7 | 62.2 | 71.0 | 66.9 | 75.7 | | | | | |
| 8 | 58.5 | 67.9 | 61.7 | 71.1 | | | | | |
| 9 | 56.1 | 67.0 | 57.7 | 67.4 | | | | | |
| 10 | 54.1 | 65.7 | 54.5 | 65.3 | | | | | |

Table 2b. Observed (obs.) and relative (rel.) survival of patients with gastroint. neuroend. tumor by gender for period 1988-2013 (N=912).

Munich Cancer Registry 05/13/2015 surv_hGNETE.pdf

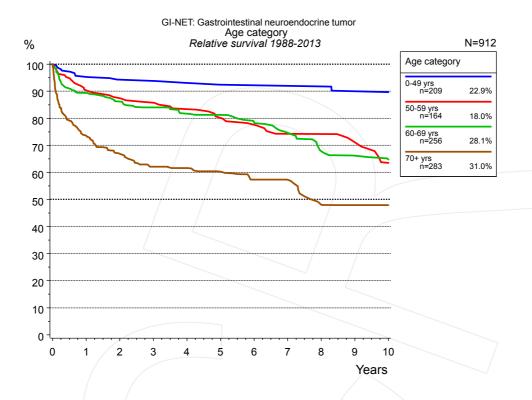


Figure 3a. Relative survival of patients with gastroint. neuroend. tumor by age category. Included in the evaluation are 912 cases diagnosed between 1988 and 2013.

| Age category | | | | | | | | | | |
|--------------|--------|--------|------------------|-------|-----------|--------|---------|--------|--|--|
| | 0-49 | yrs | 50-59 yrs | | 60-69 yrs | | 70+ yrs | | | |
| | n=2 | n=209 | | n=164 | | 256 | n=2 | 283 | | |
| Years | obs. % | rel. % | obs. % rel. % ob | | obs. % | rel. % | obs. % | rel. % | | |
| 0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | | |
| 1 | 95.6 | 95.3 | 90.2 | 90.3 | 88.5 | 89.4 | 69.5 | 73.5 | | |
| 2 | 94.0 | 94.2 | 86.9 | 87.4 | 84.0 | 86.2 | 60.3 | 66.9 | | |
| 3 | 94.0 | 93.8 | 84.8 | 85.8 | 80.7 | 84.0 | 53.1 | 62.1 | | |
| 4 | 92.6 | 93.1 | 81.6 | 83.4 | 77.2 | 81.7 | 50.1 | 61.6 | | |
| 5 | 91.7 | 92.4 | 78.0 | 80.1 | 75.3 | 81.3 | 45.4 | 60.3 | | |
| 6 | 91.7 | 92.2 | 75.0 | 77.6 | 71.4 | 78.4 | 40.7 | 57.4 | | |
| 7 | 91.7 | 92.0 | 70.6 | 74.3 | 66.3 | 74.6 | 38.1 | 57.3 | | |
| 8 | 91.7 | 91.8 | 70.6 | 74.2 | 58.8 | 67.8 | 30.5 | 48.0 | | |
| 9 | 88.7 | 90.0 | 66.0 | 71.1 | 55.7 | 66.2 | 28.3 | 47.9 | | |
| 10 | 88.7 | 89.7 | 58.6 | 63.5 | 53.2 | 64.7 | 26.9 | 47.9 | | |

Table 3b. Observed (obs.) and relative (rel.) survival of patients with gastroint. neuroend. tumor by age category for period 1988-2013 (N=912).

Munich Cancer Registry 05/13/2015 surv_hGNETE.pdf

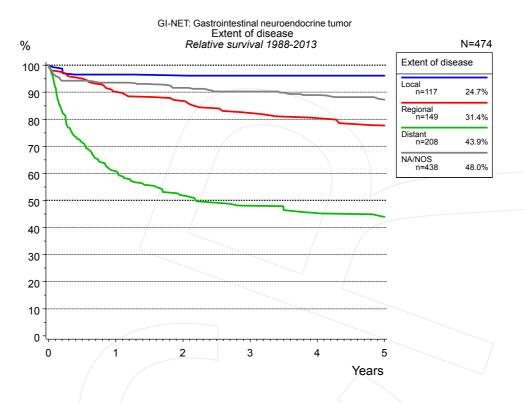


Figure 4a. Relative survival of patients with gastroint. neuroend. tumor by extent of disease. For 619 of 912 cases diagnosed between 1988 and 2013 valid data could be obtained for this item. For a total of 474 cases an evaluable classification was established. The grey line represents the subgroup of 438 patients with missing values regarding extent of disease (48.0% of 912 patients, the percent values of all other categories are related to n=474).

| Extent of disease | | | | | | | | | | | |
|-------------------|--------|--------|--------|----------|--------|--------|--------|--------|--|--|--|
| | Lo | Local | | Regional | | ant | NA/N | NOS | | | |
| | n=1 | 117 | n=149 | | n=208 | | n=438 | | | | |
| Years | obs. % | rel. % | obs. % | rel. % | obs. % | rel. % | obs. % | rel. % | | | |
| 0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | | | |
| 1 | 95.7 | 96.6 | 88.4 | 90.1 | 59.4 | 60.8 | 91.9 | 93.5 | | | |
| 2 | 93.0 | 96.2 | 84.0 | 86.7 | 50.1 | 51.9 | 88.1 | 91.6 | | | |
| 3 | 92.0 | 96.1 | 78.2 | 82.3 | 45.7 | 48.1 | 85.2 | 90.2 | | | |
| 4 | 89.5 | 96.1 | 75.0 | 80.4 | 42.9 | 45.3 | 82.6 | 89.0 | | | |
| 5 | 89.5 | 96.1 | 71.1 | 77.7 | 40.5 | 44.0 | 79.2 | 87.3 | | | |

Table 4b. Observed (obs.) and relative (rel.) survival of patients with gastroint. neuroend. tumor by extent of disease for period 1988-2013 (N=474).

Munich Cancer Registry 05/13/2015 surv_hGNETE.pdf

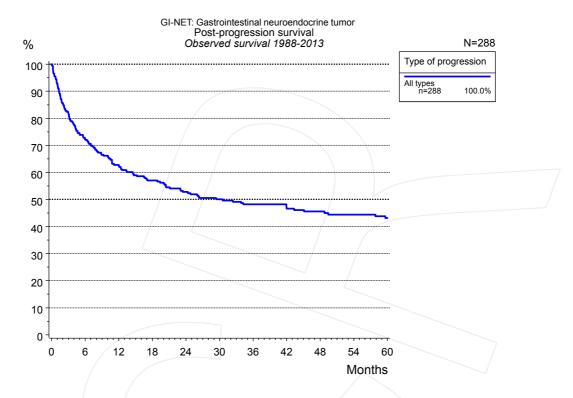


Figure 5a. Observed post-progression survival of 288 patients with gastroint. neuroend. tumor diagnosed between 1988 and 2013 (incl. M1). These 288 patients with documented progression events during their course of disease represent 31.6% of the totally 912 evaluated cases. Patients with cancer relapse documented via death certificates only were excluded (n=30, 3.3%).

Medical record documentation often lacks the linguistic severity to distinguish between local relapse, regional lymph node metastasis and distant spread in solid cancers. Frequently, the statement "not specified" is the only information in registries regarding relapse of the disease. The category "All types" denotes all cases who suffered from at least one relapse during the course of disease (incl. primary M1-status). Although, the real number of relapsed patients is likely to be much higher. The accumulated percentage of patients with local relapse or distant metastasis exceeds the 100% value because patients are potientially considered in more than one subgroup.

| | Type of progression | | | | | | | | |
|-----------|--|--|--|--|--|--|--|--|--|
| All types | | | | | | | | | |
| | n=288 | | | | | | | | |
| ths | s % | | | | | | | | |
| | 100.0 | | | | | | | | |
| | 62.4 | | | | | | | | |
| | 52.8 | | | | | | | | |
| | 48.2 | | | | | | | | |
| | 45.6 | | | | | | | | |
| | 43.2 | | | | | | | | |
| | 5 % 100.0 62.4 52.8 48.2 45.6 | | | | | | | | |

Table 5b. Observed post-progression survival of patients with gastroint. neuroend. tumor for period 1988-2013 (N=288).

Shortcuts

MCR Munich Cancer Registry, Germany (Tumorregister München)

NCI National Cancer Institute, USA

SEER Surveillance, Epidemiology, and End Results, USA UICC Union for International Cancer Control, Geneva

DCO Death certificate only. The death certificate provides the only notification to the registry.

NA Not available

NOS Not otherwise specified

OS Observed/overall survival (Kaplan-Meier estimate)
RS Relative survival, compared to the general population,
ratio of observed to expected survival (Ederer II method),

reflecting excess mortality among cancer patients

AS Assembled survival chart (observed, expected, relative)

PPS Post-progression survival, survival since first relapse (Kaplan-Meier estimate)

Date of entry: Date of first locoregional recurrence, distant metastasis, unspecified

progression

Event: Death of all causes

CS Conditional survival, survival probability under the condition of surviving a given period of time

Recommended Citation

Munich Cancer Registry. Survival GI-NET: Gastroint. neuroend. tumor [Internet]. 2015 [updated 2015 May 13; cited 2015 Jul 1]. Available from: http://www.tumorregister-muenchen.de/en/facts/surv/surv hGNETE.pdf

Copyright

The content of the public web site provided by the Munich Cancer Registry is available worldwide and free of charge. All documents are free to download, utilize, copy, print-out and distribute, providing that the MCR is referenced.

Disclaimer

The Munich Cancer Registry reserves the right to not be responsible for the topicality, correctness, completeness or quality of the information provided. Liability claims regarding damage caused by the use of any information provided, including any kind of information which is incomplete or incorrect, will therefore be rejected.

Index of figures and tables

| F | ıg./Ib | II. | Page |
|---|--------|--|------|
| | 1a | Relative survival by period of diagnosis (chart) | 2 |
| | 1b | Survival by period of diagnosis (table) | 2 |
| | 2a | Survival by gender (chart) | 3 |
| | 2b | Survival by gender (table) | 3 |
| | 3a | Relative survival by age category (chart) | 4 |
| | 3b | Survival by age category (table) | 4 |
| | 4a | Relative survival by extent of disease (chart) | 5 |
| | 4b | Survival by extent of disease (table) | 5 |
| | 5a | Observed post-progression survival (chart) | 6 |
| | 5h | Observed post-progression survival (table) | 6 |

