**Supplemental table 2: Prognostic factors for overall survival in patients with metastatic neuroendocrine neoplasms (cohort national cancer registry)**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | N | Univariable  HR (95% CI) | P-value | Multivariable HR (95% CI) | P-value |
| Gender |  |  |  |  |  |
| Male | 2,588 | Ref. |  | Ref. |  |
| Female | 2,157 | 0.90 (0.84 – 0.96) | 0.001 | 0.97 (0.91 – 1.04) | 0.39 |
| Age |  |  |  |  |  |
| ≤65 | 2,187 | Ref. |  | Ref. |  |
| >65 | 2,558 | 1.66 (1.56 – 1.77) | <0.001 | 1.64 (1.53 – 1.75) | **<0.001** |
| Primary tumor |  |  |  |  |  |
| GE | 1,499 | Ref. |  | Ref. |  |
| Pancreas | 488 | 1.18 (1.04 – 1.33) | 0.009 | 1.06 (0.93 – 1.19) | 0.40 |
| Lung | 1,220 | 2.68 (2.46 – 2.93) | <0.001 | 1.53 (1.39 – 1.69) | **<0.001** |
| Other | 335 | 2.41 (2.12 – 2.73) | <0.001 | 1.18 (1.03 – 1.36) | **0.015** |
| Unknown | 1,203 | 1.86 (1.70 – 2.03) | <0.001 | 1.39 (1.27 – 1.52) | **<0.001** |
| Tumor grade |  |  |  |  |  |
| Grade 1 | 1,123 | Ref. |  | Ref. |  |
| Grade 2 | 604 | 1.32 (1.15 – 1.51) | <0.001 | 1.24 (1.09 – 1.43) | **0.002** |
| Grade 3 | 2,985 | 5.50 (5.01 – 6.04) | <0.001 | 5.38 (4.87 – 5.95) | **<0.001** |
| Number of organs with metastases |  |  |  |  |  |
| 1 | 2,550 | Ref. |  | Ref. |  |
| 2-3 | 2,055 | 1.40 (1.31 – 1.50) | <0.001 | 1.21 (1.11 – 1.32) | **<0.001** |
| ≥4 | 140 | 1.69 (1.40 – 2.03) | <0.001 | 1.29 (1.01 – 1.66) | **0.042** |
| Location metastases |  |  |  |  |  |
| Liver | 3,110 | 1.03 (0.96 – 1.10) | 0.44 | 1.69 (1.51 – 1.89) | **<0.001** |
| Brain | 328 | 1.63 (1.45 – 1.83) | <0.001 | 1.09 (0.94 – 1.26) | **0.026** |
| Lung | 610 | 1.53 (1.40 – 1.68) | <0.001 | 1.19 (1.07 – 1.32) | **0.001** |
| Bone | 1,034 | 1.44 (1.33 – 1.55) | <0.001 | 1.24 (1.08 – 1.42) | **0.002** |
| Lymph nodes (distant) | 1,233 | 1.13 (1.05 – 1.22) | <0.001 | 0.84 (0.74 – 0.96) | **0.011** |
|  |  |  |  |  |  |
| Liver\*Bone1 | - | - | - | 0.77 (0.65 – 0.90) | **0.001** |
| Liver\*Lymph nodes1 | - | - | - | 1.17 (1.00 – 1.37) | 0.053 |
| Brain\*Lymph nodes1 | - | - | - | 1.06 (0.74 – 1.50) | 0.77 |

*Abbreviations: HR = Hazard Ratio; 95% CI = 95% Confidence Interval; Ref. = Reference; GE = gastroenteral.*

*1Interaction terms included in the final multivariable model.*

*Events = 3,787.*