**Supplemental Information**.

**ESAS questionnaire**

**Table S1**. Univariate analyses for ESAS overall score

|  |  |  |
| --- | --- | --- |
| Variable | Effect (chi) | *p* value |
| Age | 24.43 | 0.75 |
| Gender | 0.51 | 0.47 |
| Race | 0.44 | 0.50 |
| Education level | 0.55 | 0.45 |
| Caretaker (spouse, siblings) | 3.15 | 0.67 |
| Tumor stage at diagnosis | 2.06 | 0.431 |
| Distant metastasis | 0.43 | 0.50 |
| Time of data collection | 0.24 | 0.34 |
| Current target therapy/chemotherapy | **4.44** | **0.03** |
| Knowledge of palliative aims of treatment | **4.88** | **0.02** |
| Reason for hospitalization | 4.70 | 0.09 |
| ECOG performance status | **9.40** | **0.05** |

ESAS, Edmonton Symptom Assessment Scale; ECOG, Eastern Cooperative Oncology Group.

Analyses performed with Kruskal-Wallis.

**Table S2**. Multivariate analysis for ESAS overall score

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Variable | Coefficient | T | *p* value | [95% conf. | interval] |
| Current target therapy/chemotherapy | -3.59 | -0.71 | 0.48 | -13.79 | 6.59 |
| Knowledge of treatment aims | 5.73 | 1.3 | 0.19 | -3.11 | 14.59 |
| Reason for hospitalization | -1.44 | -0.52 | 0.60 | -7.01 | 4.12 |
| ECOG performance status | 1.81 | 1.03 | 0.30 | -1.72 | 5.35 |
| Consolidated | **28.35** | **3.56** | **0.001** | **12.36** | **44.35** |

ESAS, Edmonton Symptom Assessment Scale; Conf, confidence; ECOG, Eastern Cooperative Oncology Group.

Analyses performed with multiple regression.

**Table S3**. Variable analysis of overall and individual ESAS scores according to chemotherapy use (subgroup, univariate analysis)

|  |  |  |  |
| --- | --- | --- | --- |
| Variable | No target therapy or chemotherapy | Current target therapy or chemotherapy | *p* value |
|  | n= 25 | n= 34  |  |
| Age | 60.64 ± 13.66 | 56.24 ± 10.01 | 0.16 |
| Knowledge of palliative aims | 21 (84.0%) | 20 (62.5%) | 0.07 |
| ECOG performance status | **2.5 [2.0, 3.0]** | **1.5 [1.0, 3.0] (** | **0.049** |
| ESAS (overall) | **33.0 [22.0, 44.0]** | **25.5 [17.0, 33.0]** | **0.035** |
| Pain | 0.0 [0.0, 2.0] | 0.0 [0.0, 3.0] | 0.68 |
| Astenia | **3.0 [1.0, 7.0]** | **0.0 [0.0, 3.0]** | **0.004** |
| Nausea | 0.0 [0.0, 4.0] | 0.0 [0.0, 2.0] | 0.4 |
| Depression | **3.0 [0.0, 7.0]** | **0.0 [0.0, 5.0]** | **0.048** |
| Anxiety | 4.0 [0.0, 8.0] | 5.0 [2.0, 8.0] | 0.28 |
| Sleep disturbance | **5.0 [3.0, 8.0]** | **3.0 [0.0, 5.0]** | **0.012** |
| Anorexia | 6.0 [2.0, 9.0] | 4.5 [0.0, 8.0] | 0.15 |
| Wellbeing | 5.0 [2.0, 6.0] | 5.0 [1.0, 7.0] | 0.79 |
| Dispnea | **1.0 [0.0, 5.0]** | **0.0 [0.0, 0.0]** | **0.017** |

ECOG, Eastern Cooperative Oncology Group; ESAS, Edmonton Symptom Assessment Scale.

*Except for age (mean ± standard deviation), values presented as median [interquartile range].*

Analyses performed with Kruskal-Wallis.

**Table S4.** Variable analysis of overall and individual ESAS scores according to knowledge of treatment aims (subgroup, univariate analysis)

|  |  |  |  |
| --- | --- | --- | --- |
| Variable | No knowledge of palliative aims | Knowledge of palliative aims | *p* value |
|  | n= 16 | n= 41 |  |
| Age | 60.44 ± 10.84 | 56.98 ± 12.34 | 0.33 |
| Gender (male) | 5 (31.2%) | 23 (56.1%) | 0.09 |
| Tumor stage | 4.0 [3.0, 4.0] | 3.0 [2.0, 4.0] | 0.05 |
| Current target therapy/chemotherapy | 1.0 [0.5, 1.0] | 0.0 [0.0, 1.0] | 0.08 |
| ECOG performance status | 1.0 [1.0, 2.0] | 2.0 [1.5, 3.0] | **0.023** |
| ESAS (overall) | **19.0 [12.5, 26.0]** | **30.0 [22.0, 41.0]** | **0.027** |
| Pain | 0.0 [0.0, 0.5] | 0.0 [0.0, 3.0] | 0.24 |
| Astenia | **0.0 [0.0, 2.0]** | **2.0 [0.0, 5.0]** | **0.049** |
| Nausea | 0.0 [0.0, 1.5] | 0.0 [0.0, 3.0] | 0.61 |
| Depression | **0.0 [0.0, 0.5]** | **2.0 [0.0, 6.0]** | **0.016** |
| Anxiety | 4.5 [0.0, 7.0] | 5.0 [2.0, 8.0] | 0.37 |
| Sleep disturbance | 2.0 [0.0, 6.5] | 5.0 [1.0, 6.0] | 0.42 |
| Anorexia | 3.5 [0.0, 9.0] | 5.0 [0.0, 8.0] | 0.58 |
| Wellbeing | 4.0 [0.0, 5.5] | 5.0 [2.0, 7.0] | 0.26 |
| Dispnea | 0.0 [0.0, 2.5] | 0.0 [0.0, 2.0] | 0.61 |

ESAS, Edmonton Symptom Assessment Scale;ECOG, Eastern Cooperative Oncology Group.

Except for age (mean ± standard deviation) and gender n (%), values are presented as median [interquatile range].

Analyses performed through Kruskal-Wallis calculations.

**Table S5**. Univariate analyses for ESAS depression score

|  |  |  |
| --- | --- | --- |
| Variable | Effect (chi) | *p* value |
| Age | 22.5 | 0.83 |
| Gender | 0.03 | 0.86 |
| Race | 2.20 | 0.13 |
| Caretaker (spouse, siblings) | 1.94 | 0.85 |
| Education level | 0.93 | 0.33 |
| Tumor stage | 3.12 | 0.37 |
| Late relapse | 0.30 | 0.57 |
| Palliative chemotherapy | 0.86 | 0.35 |
| Time of data collection | 0.06 | 0.28 |
| Current target therapy/chemotherapy | **3.47** | **0.06** |
| Knowledge of palliative aims | **5.12** | **0.02** |
| Reason for hospitalization | 4.14 | 0.12 |
| ECOG performance status | 7.00 | 0.13 |

ESAS, Edmonton Symptom Assessment Scale; ECOG, Eastern Cooperative Oncology Group.

Analyses performed with Kruskal-Wallis.

**Table S6.** Multivariate analysis for ESAS depression score

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
| Variable | Coefficient | t | *p* value | [95% conf. | interval] |
| Age | .0746543 | 1.26 | 0.218 | -.0461909 | .1954996 |
| Race | 1.176395 | 0.85 | 0.402 | -1.643661 | 3.996451 |
| Gender | -2.972775 | -2.09 | 0.044 | -5.864913 | -.0806379 |
| Caretaker | -.9562247 | -1.32 | 0.196 | -2.42979 | .5173401 |
| Education level | -.8793516 | -0.61 | 0.543 | -3.789712 | 2.031008 |
| Tumor stage | .2859054 | 0.39 | 0.701 | -1.218466 | 1.790277 |
| Relapse | -1.152928 | -0.82 | 0.417 | -4.004886 | 1.699031 |
| Palliative chemotherapy | 1.550097 | 0.95 | 0.351 | -1.781999 | 4.882193 |
| Current chemotherapy | -.9392266 | -0.57 | 0.574 | -4.308043 | 2.42959 |
| Knowledge of palliative aim | **3.73498** | **2.38** | **0.023** | **.5387744** | **6.931186** |
| Reason for hospitalization | -1.283583 | -1.55 | 0.130 | -2.964965 | .3977991 |
| ECOG performance status | -.3813675 | -0.71 | 0.481 | -1.46987 | .7071345 |
| Consolidated | .5024841 | 0.09 | 0.925 | -10.30613 | 11.3111 |

ESAS, Edmonton Symptom Assessment Scale; Conf, confidence; ECOG, Eastern Cooperative Oncology Group.

Analyses performed with multiple regression.

**POS questionnaire**

**Table S7**. Univariate analysis for overall POS score

|  |  |  |
| --- | --- | --- |
| Variable | Effect (chi-squared) | *p* value |
| Age | 28.47 | 0.54 |
| Gender | 0.03 | 0.84 |
| Ethnicity | 0.72 | 0.39 |
| Education level | 0.36 | 0.54 |
| Caretaker | 7.04 | 0.21 |
| Tumor stage | 1.29 | 0.72 |
| Late relapse | 0.68 | 0.44 |
| Palliative chemotherapy | 0.51 | 0.47 |
| Time of data collection | -0.08 | 0.48 |
| Current chemotherapy | 0.17 | 0.67 |
| Knowledge of palliative aims | 1.17 | 0.27 |
| Reason for hospitalization | 4.48 | 0.10 |
| ECOG performance status | 5.45 | 0.24 |

POS, Palliative Care Outcome Scale; ECOG, Eastern Cooperative Oncology Group.

Analyses performed through Kruskal-Wallis calculations.

**Table S8**. POS overall and individual scores according to knowledge of palliative aims

|  |  |  |  |
| --- | --- | --- | --- |
| Variable | No knowledge of palliative aims | Knowledge of palliative aims | *p* value |
|  | n=16 | n= 41  |  |
| Age | 60.44 ± 10.84 | 56.98 ± 12.34 | 0.33 |
| Gender | 5 (31.2%) | 23 (56.1%) | 0.09 |
| Tumor stage | 4.0 [3.0, 4.0] | 3.0 [2.0, 4.0] | 0.05 |
| Current chemotherapy | 12 (75.0%) | 20 (48.8%) | 0.07 |
| ECOG performance status | 1.0 [1.0, 2.0] | 2.0 [1.5, 3.0] | 0.023 |
| POS overall | 12.5 [9.5, 17.0] | 14.0 [9.0, 20.0] | 0.28 |
| Pain | 0.0 [0.0, 2.0] | 1.0 [0.0, 3.0] | 0.3 |
| Practical matters | 0.0 [0.0, 1.0] | 0.0 [0.0, 0.0] | 0.91 |
| Wasted time | 2.0 [0.0, 4.0] | 0.0 [0.0, 4.0] | 0.28 |
| Depression | 1.0 [0.0, 2.5] | 1.0 [0.0, 3.0] | 0.84 |
| Sharing information with family | 0.0 [0.0, 1.0] | 0.0 [0.0, 2.0] | 0.41 |
| Information given | 0.0 [0.0, 1.5] | 0.0 [0.0, 1.0] | 0.87 |
| Anxiety/worry in family | 3.5 [1.5, 4.0] | 4.0 [3.0, 4.0] | 0.3 |
| Worry/anxiety | 1.0 [0.0, 2.0] | 2.0 [0.0, 3.0] | 0.07 |
| Wellbeing | 0.0 [0.0, 1.0] | 1.0 [0.0, 2.0] | 0.08 |
| Other symptoms | 1.0 [0.0, 3.0] | 1.0 [0.0, 3.0] | 0.96 |

POS, Palliative Care Outcome Scale; ECOG, Eastern Cooperative Oncology Group.

Except for age (mean ± standard deviation) and gender n (%), values are presented as median [p25, p75].

Analyses performed through Kruskal-Wallis calculations.