| SUPPLEMENTARY MATERIAL: TREATMENT |  |  |  |  |  |  |  |  |  | SOFT TISSUE ( $\mathrm{n}=418$ ) |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  | BONE ( $\mathrm{n}=140$ ) |  |  |  |  |  |  |
|  | TOTAL (n=558) | BONE ( $\mathrm{n}=140$ ) | SOFT TISSUE ( $\mathrm{n}=418$ ) | p -value | AYA ( $\mathrm{n}=23$ ) | Middle-age ( $\mathrm{n}=78$ ) | Elderly ( $\mathrm{n}=39$ ) | p -value | AYA ( $\mathrm{n}=23$ ) | Middle-age ( $\mathrm{n}=207$ ) | Elderly ( $\mathrm{n}=188$ ) | p -value |
| Treated by a specialist sarcoma team |  |  |  |  |  |  |  |  |  |  |  |  |
| Yes | 475 (87.2\%) | 122 (87.8\%) | 353 (86.9\%) |  | 19 (82.6\%) | 67 (87.0\%) | 36 (92.3\%) |  | 19 (82.6\%) | 167 (83.1\%) | 167 (91.8\%) |  |
| Not sure | 55 (10.1\%) | 12 (8.6\%) | 43 (10.6\%) |  | 2 (8.7\%) | 8 (10.4\%) | 2 (5.1\%) |  | 3 (13.0\%) | 30 (14.9\%) | 10 (5.5\%) |  |
| No | 15 (2.8\%) | 5 (3.6\%) | 10 (2.5\%) |  | 2 (8.7\%) | 2 (2.6\%) | 1 (2.6\%) |  | 1 (4.3\%) | 4 (2.0\%) | 5 (2.7\%) |  |
|  |  |  |  | 0.642 |  |  |  | 0.560 |  |  |  | 0.047 |
| No Hospitals attended for treatment |  |  |  |  |  |  |  |  |  |  |  |  |
| 1 | 185 (33.6\%) | 53 (38.4\%) | 132 (32.0\%) |  | 4 (17.4\%) | 28 (36.8\%) | 21 (53.8\%) |  | 10 (43.5\%) | 56 (27.6\%) | 66 (35.5\%) |  |
| 2 | 249 (45.3\%) | 56 (40.6\%) | 193 (46.8\%) |  | 9 (39.1\%) | 35 (46.1\%) | 12 (30.8\%) |  | 9 (39.1\%) | 100 (49.3\%) | 84 (45.2\%) |  |
| 3 | 84 (15.3\%) | 16 (11.6\%) | 68 (16.5\%) |  | 5 (21.7\%) | 7 (9.2\%) | 4 (10.3\%) |  | 4 (17.4\%) | 32 (15.4\%) | 32 (17.2\%) |  |
| >3 | 32 (5.8\%) | 13 (9.4\%) | 19 (4.6\%) |  | 5 (21.7\%) | 6 (7.9\%) | 2 (5.1\%) |  | 0 (0.0\%) | 15 (7.4\%) | 4 (2.2\%) |  |
|  |  |  |  | 0.048 |  |  |  | 0.033 |  |  |  | 0.102 |
| Distance travelled for surgery |  |  |  |  |  |  |  |  |  |  |  |  |
| $<5$ miles | 58 (11.7\%) | 9 (7.0\%) | 49 (13.4\%) |  | 1 (5.0\%) | 5 (6.8\%) | 3 (8.6\%) |  | 4 (21.1\%) | 23 (12.6\%) | 22 (13.3\%) |  |
| 5-10 miles | 66 (13.4\%) | 15 (11.7\%) | 51 (13.9\%) |  | 1 (5.0\%) | 8 (11.0\%) | 6 (17.1\%) |  | 1 (5.3\%) | 32 (17.6\%) | 18 (10.9\%) |  |
| 10-20 miles | 110 (22.3\%) | 22 (17.2\%) | 88 (24.0\%) |  | 2 (10.0\%) | 12 (16.4\%) | 8 (22.9\%) |  | 6 (31.6\%) | 42 (23.1\%) | 40 (24.2\%) |  |
| 20-50 miles | 142 (28.7\%) | 36 (28.1\%) | 106 (29.0\%) |  | 7 (35.0\%) | 22 (30.1\%) | 7 (20.0\%) |  | 4 (21.1\%) | 50 (27.3\%) | 52 (31.5\%) |  |
| >50 miles | 118 (23.9\%) | 46 (35.9\%) | 72 (19.7\%) |  | 9 (45.0\%) | 26 (35.6\%) | 11 (31.4\%) |  | 4 (21.1\%) | 35 (19.2\%) | 33 (20.0\%) |  |
|  |  |  |  | 0.003 |  |  |  | 0.744 |  |  |  | 0.620 |
| Did not mind travelling for surgery |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 451 (88.8\%) | 118 (88.7\%) | 333 (88.8\%) | 0.980 | 17 (89.5\%) | 66 (86.8\%) | 35 (92.1\%) | 0.700 | 19 (95\%) | 165 (88.2\%) | 149 (88.7\%) | 0.659 |
| Chemo/radiotherapy given in different hospital to surgery. |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 209 (61.8\%) | 53 (65.4\%) | 156 (60.7\%) | 0.445 | 17 (89.5\%) | 30 (65.2\%) | 6 (37.5\%) | <0.001 | 11 (64.7\%) | 85 (62.5\%) | 60 (57.7\%) | 0.707 |
| Offered clinical trial |  |  |  |  |  |  |  |  |  |  |  |  |
| Yes | 158 (29.9\%) | 39 (29.3\%) | 119 (30.1\%) |  | 14 (60.9\%) | 17 (23.0\%) | 8 (22.2\%) |  | 6 (27.3\%) | 66 (33.2\%) | 47 (26.9\%) |  |
| No | 324 (61.2\%) | 86 (64.7\%) | 238 (60.1\%) |  | 9 (39.1\%) | 51 (68.9\%) | 26 (72.2\%) |  | 13 (59.1\%) | 112 (56.3\%) | 113 (64.6\%) |  |
| Can't remember | 47 (8.9\%) | 8 (6.0\%) | 39 (9.8\%) |  | 0 (0\%) | 6 (8.1\%) | 2 (5.6\%) |  | 3 (13.6\%) | 21 (10.6\%) | 15 (8.6\%) |  |
|  |  |  |  | 0.367 |  |  |  | 0.007 |  |  |  | 0.546 |
| Took part in clinical trial |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 116 (22.2\%) | 33 (25.0\%) | 83 (21.3\%) | 0.374 | 12 (52.2\%) | 13 (18.3\%) | 8 (21.1\%) | 0.004 | 4 (19.0\%) | 46 (24\%) | 33 (18.6\%) | 0.445 |
|  |  |  |  |  |  |  |  |  |  |  |  |  |
| Yes, same | 338 (63.4\%) | 83 (62.9\%) | 255 (63.6\%) |  | 17 (77.3\%) | 40 (54.1\%) | 26 (72.2\%) |  | 14 (63.6\%) | 116 (58.3\%) | 125 (69.4\%) |  |
| Sometimes | 68 (12.8\%) | 21 (15.9\%) | 47 (11.7\%) |  | 1 (4.5\%) | 15 (20.3\%) | 5 (13.9\%) |  | 3 (13.6\%) | 28 (14.1\%) | 16 (8.9\%) |  |
| No | 79 (14.8\%) | 18 (13.6\%) | 61 (15.2\%) |  | 3 (13.6\%) | 10 (13.5\%) | 5 (13.9\%) |  | 2 (9.1\%) | 36 (18.1\%) | 23 (12.8\%) |  |
| Don't know | 48 (9.0\%) | 10 (7.6\%) | 38 (9.5\%) |  | 1 (4.5\%) | 9 (12.2\%) | 0 (0.0\%) |  | 3 (13.6\%) | 19 (9.5\%) | 16 (8.9\%) |  |
|  |  |  |  | 0.585 |  |  |  | 0.127 |  |  |  | 0.344 |
| Sufficient information to make decisions on care |  |  |  |  |  |  |  |  |  |  |  |  |
| Yes, all | 472 (86.6\%) | 116 (84.1\%) | 356 (87.5\%) |  | 19 (82.6\%) | 60 (77.9\%) | 37 (97.4\%) |  | 19 (86.4\%) | 166 (82.6\%) | 171 (92.9\%) |  |
| Only some | 63 (11.6\%) | 19 (13.8\%) | 44 (10.8\%) |  | 1 (4.3\%) | 17 (22.1\%) | 1 (2.6\%) |  | 3 (13.6\%) | 30 (14.9\%) | 11 (6.0\%) |  |
| No | 6 (1.1\%) | 1 (0.7\%) | 5 (1.2\%) |  | 1 (4.3\%) | 0 (0\%) | 0 (0\%) |  | 0 (0\%) | 4 (2.0\%) | 1 (0.5\%) |  |
| Did not want to be involved | 4 (0.7\%) | 2 (1.4\%) | 2 (0.5\%) |  | 2 (8.7\%) | 0 (0\%) | 0 (0\%) |  | 0 (0\%) | 1 (0.5\%) | 1 (0.5\%) |  |
|  |  |  |  | 0.485 |  |  |  | <0.001 |  |  |  | 0.105 |
| Given a written treatment plan |  |  |  |  |  |  |  |  |  |  |  |  |
|  | 300 (61.3\%) | 81 (64.3\%) | 219 (60.3\%) | 0.432 | 16 (69.6\%) | 40 (58.8\%) | 25 (71.4\%) | 0.379 | 12 (54.5\%) | 101 (57.7\%) | 106 (63.9\%) | 0.434 |
| Given enough emotional support |  |  |  |  |  |  |  |  |  |  |  |  |
| Yes, definitely | 308 (56.5\%) | 84 (60.9\%) | 224 (55.0\%) |  | 12 (52.2\%) | 39 (51.3\%) | 33 (84.6\%) |  | 9 (40.9\%) | 100 (48.8\%) | 115 (63.9\%) |  |
| Yes, to some extent | 133 (24.4\%) | 32 (23.2\%) | 101 (24.8\%) |  | 8 (34.8\%) | 21 (27.6\%) | 3 (7.7\%) |  | 10 (45.5\%) | 55 (26.8\%) | 36 (20.0\%) |  |
| No, would have liked more | 40 (7.3\%) | 11 (8.0\%) | 29 (7.1\%) |  | 3 (13.0\%) | 8 (10.5\%) | 0 (0\%) |  | 3 (13.6\%) | 19 (9.3\%) | 7 (3.9\%) |  |
| Did not need | 64 (11.7\%) | 11 (8.0\%) | 53 (13.0\%) |  | 0 (0\%) | 8 (10.5\%) | 3 (7.7\%) |  | 0 (0\%) | 31 (15.1\%) | 22 (12.2\%) |  |
|  |  |  |  | 0.381 |  |  |  | 0.006 |  |  |  | 0.003 |


| Supplementary Material: TREATMENT |  |  |  |  |  |  |  |  |  | SOFT TISSUE ( $\mathrm{n}=418$ ) |  | p-value |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  |  |  | BONE ( $\mathrm{n}=140$ ) |  |  |  |  |  |  |
|  | TOTAL ( $\mathrm{n}=558$ ) | BONE ( $\mathrm{n}=140$ ) | SOFT TISSUE ( $\mathrm{n}=418$ ) | p -value | AYA (n=23) | Middle-age ( $\mathrm{n}=78$ ) | Elderly ( $\mathrm{n}=39$ ) | $p$-value | AYA (n=23) | Middle-age ( $\mathrm{n}=207$ ) | Elderly ( $\mathrm{n}=188$ ) |  |
| Symptoms/side-effects of treatment |  |  |  |  |  |  |  |  |  |  |  |  |
| Pain | 248 (44.4\%) | 77 (55.0\%) | 171 (40.9\%) | 0.004 | 16 (69.6\%) | 49 (62.8\%) | 12 (30.8\%) | 0.001 | 16 (69.6\%) | 107 (51.7\%) | 48 (25.5\%) | <0.001 |
| Nausea/vomiting | 154 (27.6\%) | 49 (35.0\%) | 105 (25.1\%) | 0.024 | 17 (73.9\%) | 30 (38.5\%) | 2 (5.1\%) | $<0.001$ | 14 (60.9\%) | 64 (30.9\%) | 27 (14.4\%) | $<0.001$ |
| Diarrhoea | 109 (19.5\%) | 34 (24.3\%) | 75 (17.9\%) | 0.101 | 12 (52.2\%) | 19 (24.4\%) | 3 (7.7\%) | $<0.001$ | 4 (17.4\%) | 49 (23.7\%) | 22 (11.7\%) | 0.008 |
| Constipation | 171 (30.6\%) | 55 (39.3\%) | 116 (27.8\%) | 0.01 | 17 (73.9\%) | 32 (41.0\%) | 6 (15.4\%) | <0.001 | 12 (52.2\%) | 63 (30.4\%) | 41 (21.8\%) | 0.004 |
| Skin/nail/hair changes | 238 (42.7\%) | 64 (45.7\%) | 174 (41.6\%) | 0.397 | 19 (82.6\%) | 36 (46.2\%) | 9 (23.1\%) | $<0.001$ | 16 (69.6\%) | 96 (46.4\%) | 62 (33.0\%) | 0.001 |
| Sore/dry mouth | 182 (32.6\%) | 69 (49.3\%) | 113 (27.0\%) | $<0.001$ | 16 (69.6\%) | 38 (48.7\%) | 15 (38.5\%) | 0.06 | 12 (52.2\%) | 61 (29.5\%) | 40 (21.3\%) | 0.004 |
| Tingling in fingers | 133 (23.8\%) | 33 (23.6\%) | 100 (23.9\%) | 0.933 | 9 (39.1\%) | 19 (24.4\%) | 5 (12.8\%) | 0.06 | 7 (30.4\%) | 55 (26.6\%) | 38 (20.2\%) | 0.252 |
| Loss of nerve sensations/feeling | 217 (38.9\%) | 63 (45.0\%) | 154 (36.8\%) | 0.087 | 8 (34.8\%) | 43 (55.1\%) | 12 (30.8\%) | 0.025 | 10 (43.5\%) | 94 (45.4\%) | 50 (26.6\%) | <0.001 |
| Loss of appetite | 149 (26.7\%) | 49 (35.0\%) | 100 (23.9\%) | 0.01 | 16 (69.6\%) | 29 (37.2\%) | 4 (10.3\%) | $<0.001$ | 13 (56.5\%) | 52 (25.1\%) | 35 (18.6\%) | $<0.001$ |
| Changes to sense of smell/taste | 124 (22.2\%) | 43 (30.7\%) | 81 (19.4\%) | 0.005 | 13 (56.5\%) | 25 (32.1\%) | 5 (12.8\%) | 0.001 | 11 (47.8\%) | 49 (23.7\%) | 21 (11.2\%) | <0.001 |
| Difficulty concentrating | 116 (20.8\%) | 38 (27.1\%) | 78 (18.7\%) | 0.032 | 12 (52.2\%) | 19 (24.4\%) | 7 (17.9\%) | 0.01 | 12 (52.2\%) | 42 (20.3\%) | 24 (12.8\%) | <0.001 |
| Difficulty getting to sleep | 162 (29.0\%) | 50 (35.7\%) | 112 (26.8\%) | 0.044 | 15 (65.2\%) | 27 (34.6\%) | 8 (20.5\%) | 0.002 | 13 (56.5\%) | 60 (29.0\%) | 39 (20.7\%) | 0.001 |
| Swelling of limbs (lymphoedema) | 109 (19.5\%) | 20 (14.3\%) | 89 (21.3\%) | 0.07 | 6 (26.1\%) | 12 (15.4\%) | 2 (5.1\%) | 0.068 | 5 (21.7\%) | 41 (19.8\%) | 43 (22.9\%) | 0.758 |
| Sweats | 115 (20.6\%) | 31 (22.1\%) | 84 (20.1\%) | 0.604 | $11(47.8 \%)$ | 15 (19.2\%) | 5 (12.8\%) | 0.004 | 7 (30.4\%) | 51 (24.6\%) | 26 (13.8\%) | 0.012 |
| Drowsiness | 102 (18.3\%) | 32 (22.9\%) | 70 (16.7\%) | 0.105 | 13 (56.5\%) | 14 (17.9\%) | 5 (12.8\%) | $<0.001$ | 6 (26.1\%) | 42 (20.3\%) | 22 (11.7\%) | 0.034 |
| Daytime fatigue | 266 (47.7\%) | 67 (47.9\%) | 199 (47.6\%) | 0.959 | 16 (69.6\%) | 42 (53.8\%) | 9 (23.1\%) | 0.001 | 18 (78.3\%) | 104 (50.2\%) | 77 (41.0\%) | 0.002 |
| Something else | 49 (8.8\%) | 14 (10.0\%) | 35 (8.4\%) | 0.556 | 2 (8.7\%) | 9 (11.5\%) | 3 (7.7\%) | 0.787 | 5 (21.7\%) | 16 (7.7\%) | 14 (7.4\%) | 0.058 |
| Don't know | 19 (3.4\%) | 2 (1.4\%) | 17 (4.1\%) | 0.136 | 0 (0\%) | 1(1.3\%) | 1 (2.6\%) | 0.704 | 1 (4.3\%) | 6 (2.9\%) | 10 (5.3\%) | 0.476 |

