S1 Table: Further results from trajectory models: criteria used to determine appropriate number of trajectories for each outcome

| Outcome and number of groups | Bayesian Information Criterion (BIC) | Null model for comparison (simpler model with 1 less group) | Change in BIC | Estimated % in smallest group |
|-----------------------------|--------------------------------------|------------------------------------------------------------|---------------|-------------------------------|
| QLACS-GSS                   |                                      |                                                            |               |                               |
| 1                           | -13230.49                            | 0                                                         |               |                               |
| 2                           | -12660.31                            | 1                                                         | 570.18        | 35.8%                         |
| 3                           | -12459.04                            | 2                                                         | 201.27        | 13.1%                         |
| 4                           | **-12346.46**                        | **3**                                                     | **112.58**    | **5.3%**                      |
| 5                           | -12326.90                            | 4                                                         | 19.56         | 2.4%                          |
| 6                           | -12323.12                            | 5                                                         | 3.78          | 2.1%                          |
| EQ-5D utility index         |                                      |                                                            |               |                               |
| 1                           | -1108.27                             | 0                                                         |               |                               |
| 2                           | -887.93                              | 1                                                         | 220.34        | 40.1%                         |
| 3                           | -813.95                              | 2                                                         | 73.98         | 8.5%                          |
| 4                           | **-788.31**                          | **3**                                                     | **25.64**     | **7.4%**                      |
| 5                           | -781.13                              | 4                                                         | 7.18          | 3.9%                          |
| 6                           | -784.70                              | 5                                                         | -3.57         | 3.2%                          |
| Personal Wellbeing Index    |                                      |                                                            |               |                               |
| 1                           | -12661.28                            | 0                                                         |               |                               |
| 2                           | -12143.80                            | 1                                                         | 517.48        | 29.3%                         |
| 3                           | -11982.36                            | 2                                                         | 161.44        | 9.0%                          |
| 4                           | **-11928.78**                        | **3**                                                     | **53.58**     | **4.2%**                      |
| 5                           | -11917.15                            | 4                                                         | 11.63         | 3.4%                          |
| 6                           | -11940.61                            | 5                                                         | -23.46        | 2.9%                          |

Final selected models are highlighted in bold