The AROC Annual Report:

The state of rehabilitation in Australia in 2016
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Introduction

This is the 12th comprehensive annual report describing discharge episodes from subacute inpatient rehabilitation programs provided by Australian facilities that are members of the Australasian Rehabilitation Outcomes Centre (AROC).

The inaugural report was published in April 2007 and described the 2005 data; this 12th instalment describes the 2016 data.

This report is the second to use the version 4 AN-SNAP classification (implemented in Australia in July 2016). For more information about AN-SNAP classification please refer to the AROC website: [http://ahsri.uow.edu.au/aroc](http://ahsri.uow.edu.au/aroc)

This report also includes an extended times series analysis, looking at change in various rehabilitation measures over the most recent five years.

The provision of rehabilitation in Australia continues to grow in volume, with 2016 seeing a 2.8% real increase in inpatient episodes of rehabilitation provided. The impairment groups with the greatest relative growth in 2016 were pain and spinal cord injury.
Number of episodes by impairment group, 2016

AROC State of Nations | 2016 report | Australia
Proportion of episodes by impairment and sector, 2016
Funding source for rehabilitation in Australia, 2016
Changes in rehabilitation – compared to last year

The following figures look at changes in rehabilitation between last year and this year:

• The first figure considers the number of episodes within each impairment group and documents real changes in episode volume since last year.

• The second figure presents the key changes in rehabilitation outcome measures between last year and this year. The horizontal axis describes the difference between last year and this year averages, while last years actual values are presented on the left side of the graph.
Change in number of episodes by impairment group, 2015 to 2016
Change in outcome measures, 2015 to 2016

- Age (years) 74.4
- Length of stay (days) 17.8
- FIM admission score 89.5
- FIM discharge score 107.2
- FIM change (adm to disch) 17.7
- FIM efficiency (per week) 7.0
- Disch to community (%) 89.8

2015 (n = 116,310) 2016 (n = 119,583)
Changes in rehabilitation – compared to five years ago

The following figures look at changes in rehabilitation over the last 5 years:

• The first figure outlines the changing proportion of episodes within each impairment group over the past five years as a proportion of all episodes each year.

• The second figure presents the key changes in rehabilitation outcome measures between five years ago and this year. The horizontal axis describes the difference between five years ago and this year averages, while the actual values from five years ago are presented on the left side of the graph.

• The remaining figures provide a graphical representation of the change in various rehabilitation measures over the most recent five years. Each bar (one per year) represents the difference, positive or negative, of that year’s value to the value from five years ago. The value for the bar from five years ago will always be zero.
  – Age at admission
  – Admission to rehabilitation within a week of injury or onset of symptoms
  – Length of stay
  – Proportion of FIM assessments within three days of rehabilitation commencing
  – Admission FIM scores as a proportion of the total score possible
  – FIM change as a proportion of the total change possible
  – FIM efficiency
Proportion of episodes by impairment group, 2012 to 2016

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Change in outcome measures, 2012 to 2016

2012 (n = 90,035)
2016 (n = 119,583)

Positive change:
- Age (years) 73.9
- Length of stay (days) 18.3
- FIM admission score 90.6
- FIM discharge score 108.4
- FIM change (adm to disch) 17.8
- FIM efficiency (per week) 6.8
- Disch to community (%) 90.6

Negative change:
- Change in outcome measures, 2012 to 2016
Over the last five years patient age has fluctuated very little, with patients in 2016 about $\frac{1}{3}$ of a year older than they were in 2012.
Admission to rehabilitation within a week of injury or onset of symptoms compared to five years ago

Over the last five years patients have been commencing rehabilitation sooner after their injury/onset of symptoms; in 2016 6% more patients were admitted to rehabilitation within a week of onset compared to in 2012.
Length of stay compared to five years ago

Over the last five years rehabilitation length of stay (LOS) has been declining slowly; in 2016 patients stayed nearly 1 day less than they did in 2012.
Timeliness of FIM assessment within 72 hours compared to five years ago

Over the last five years more patients have been assessed for their functional ability within three days of rehabilitation commencing; in 2016 2% more patients were assessed within three days compared to in 2012.
FIM scores at admission as a proportion of total possible compared to five years ago

Over the last five years the FIM admission score has declined slightly, just over 1% lower in 2016 compared to in 2012.
FIM Relative Functional Gain (RFG), or change in FIM score possible from admission to discharge, over the last few years has been about 1½-2% lower than it was in 2012. In 2016 49.5% of FIM relative functional gain was achieved.
FIM efficiency per week compared to five years ago

Over the last four years weekly FIM efficiency (change in FIM score possible from admission to discharge divided by length of stay x7) has not changed significantly although the trend has been for it to increase; in 2016 it was marginally higher than it was in 2012. The 1.3% increase from 2013 to 2016 is in keeping with the observed decline in LOS and static FIM change over this period.
Outcomes by impairment

A series of figures and tables are provided for each impairment group; these outline the key descriptive data for this year, changes in episode volumes over the last 5 years, and changes in rehabilitation outcome measures between last year and this year:

- The first figure in each group outlines the number of episodes for each quarter over the past five years, and documents any changes in episode volume over time and/or seasonal trends.
- The second figure displays the proportion of episodes in each AN-SNAP class over the last 5 years.
- The third is a table outlining key data for the respective impairment group by AN-SNAP class.
- The fourth figure provides a summary of the discharge destination of all episodes by AN-SNAP class.
- The fifth figure provides a graphical representation of length of stay (LOS) and improvement in the FIM (Functional Independence Measure) by AN-SNAP class.
- Finally, the sixth figure presents the key changes in rehabilitation outcome measures between last year and this year. The horizontal axis describes the difference between last year and this year averages, while last year's actual values are presented on the left side of the graph.
Stroke casemix over time
Stroke episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AA1</th>
<th>4AA2</th>
<th>4AA3</th>
<th>4AA4</th>
<th>4AA5</th>
<th>4AA6</th>
<th>4AA7</th>
<th>4Z3</th>
<th>4Z4</th>
<th>All Stroke</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>2,342</td>
<td>1,818</td>
<td>538</td>
<td>1,113</td>
<td>330</td>
<td>1,300</td>
<td>482</td>
<td>862</td>
<td>243</td>
<td>9,046</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>25.9%</td>
<td>20.1%</td>
<td>5.9%</td>
<td>12.3%</td>
<td>3.6%</td>
<td>14.4%</td>
<td>5.3%</td>
<td>9.5%</td>
<td>2.7%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
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<td></td>
<td></td>
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</tr>
<tr>
<td>Private</td>
<td>31.5%</td>
<td>23.8%</td>
<td>18.8%</td>
<td>23.6%</td>
<td>10.3%</td>
<td>16.7%</td>
<td>9.5%</td>
<td>12.4%</td>
<td>2.1%</td>
<td>21.5%</td>
</tr>
<tr>
<td>Public</td>
<td>68.5%</td>
<td>76.2%</td>
<td>81.2%</td>
<td>76.4%</td>
<td>89.7%</td>
<td>83.3%</td>
<td>90.5%</td>
<td>87.6%</td>
<td>97.9%</td>
<td>78.5%</td>
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<tr>
<td>Gender (%)</td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>44.7%</td>
<td>42.8%</td>
<td>41.8%</td>
<td>49.0%</td>
<td>42.1%</td>
<td>48.1%</td>
<td>36.1%</td>
<td>51.4%</td>
<td>33.7%</td>
<td>45.0%</td>
</tr>
<tr>
<td>Male</td>
<td>55.3%</td>
<td>57.2%</td>
<td>58.2%</td>
<td>50.9%</td>
<td>57.9%</td>
<td>51.8%</td>
<td>63.9%</td>
<td>48.6%</td>
<td>65.4%</td>
<td>54.9%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>70.9 (70.3-71.4)</td>
<td>73.5 (72.9-74.1)</td>
<td>72.2 (71.0-73.4)</td>
<td>81.2 (80.8-81.6)</td>
<td>56.1 (55.0-57.2)</td>
<td>80.6 (80.2-81.0)</td>
<td>55.9 (54.9-56.8)</td>
<td>79.2 (78.6-79.7)</td>
<td>53.5 (52.3-54.8)</td>
<td>73.1 (72.8-73.4)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>101.3 (100.9-101.8)</td>
<td>90.5 (89.9-91.0)</td>
<td>78.3 (77.3-79.4)</td>
<td>67.0 (66.5-67.6)</td>
<td>68.6 (67.7-69.6)</td>
<td>48.9 (48.3-49.6)</td>
<td>50.0 (49.0-51.0)</td>
<td>29.5 (28.8-30.3)</td>
<td>28.0 (26.6-29.4)</td>
<td>76.0 (75.4-76.5)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>15.2 (14.7-15.8)</td>
<td>18.7 (18.1-19.3)</td>
<td>25.3 (23.9-26.6)</td>
<td>27.9 (27.0-28.9)</td>
<td>34.1 (31.3-37.0)</td>
<td>40.5 (39.1-41.9)</td>
<td>54.0 (50.6-57.3)</td>
<td>46.4 (44.0-48.8)</td>
<td>81.0 (73.2-88.8)</td>
<td>27.7 (27.1-28.2)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>93.7%</td>
<td>89.8%</td>
<td>85.1%</td>
<td>83.2%</td>
<td>88.8%</td>
<td>74.9%</td>
<td>77.3%</td>
<td>60.4%</td>
<td>52.7%</td>
<td>83.0%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>6.3%</td>
<td>10.2%</td>
<td>14.9%</td>
<td>16.8%</td>
<td>11.2%</td>
<td>25.1%</td>
<td>22.7%</td>
<td>39.6%</td>
<td>47.3%</td>
<td>17.0%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>15.1 (14.7-15.5)</td>
<td>18.5 (18.0-19.0)</td>
<td>21.4 (20.1-22.6)</td>
<td>27.0 (26.0-28.0)</td>
<td>36.5 (34.9-38.2)</td>
<td>30.0 (28.7-31.2)</td>
<td>40.5 (38.4-42.6)</td>
<td>23.1 (21.1-25.1)</td>
<td>42.2 (37.8-46.5)</td>
<td>22.9 (22.5-23.3)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.0</td>
<td>1.0</td>
<td>0.8</td>
<td>1.0</td>
<td>1.1</td>
<td>0.7</td>
<td>0.7</td>
<td>0.5</td>
<td>0.5</td>
<td>0.8</td>
</tr>
</tbody>
</table>
Stroke discharge destination by AN-SNAP class

Discharge destination - Stroke

<table>
<thead>
<tr>
<th>AN-SNAP class</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>4AA1 (n=2,342)</td>
<td>Remaining in hospital system</td>
</tr>
<tr>
<td>4AA2 (n=1,818)</td>
<td>Unknown residence</td>
</tr>
<tr>
<td>4AA3 (n=538)</td>
<td>Other supported residence</td>
</tr>
<tr>
<td>4AA4 (n=1,113)</td>
<td>Private residence - ?? Support</td>
</tr>
<tr>
<td>4AA5 (n=1,300)</td>
<td>Private residence - with support</td>
</tr>
<tr>
<td>4AA6 (n=482)</td>
<td>Private residence - no support</td>
</tr>
<tr>
<td>4AA7 (n=862)</td>
<td>All Stroke (n=9,046)</td>
</tr>
<tr>
<td>4AZ3 (n=243)</td>
<td>Remaining in hospital system</td>
</tr>
<tr>
<td>4AZ4 (n=243)</td>
<td>Unknown residence</td>
</tr>
<tr>
<td></td>
<td>Other supported residence</td>
</tr>
<tr>
<td></td>
<td>Private residence - ?? Support</td>
</tr>
<tr>
<td></td>
<td>Private residence - with support</td>
</tr>
<tr>
<td></td>
<td>Private residence - no support</td>
</tr>
</tbody>
</table>
Stroke LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean LOS
Mean FIM improvement

AN-SNAP class

4AA1 (n=2,342)
4AA2 (n=1,818)
4AA3 (n=538)
4AA4 (n=1,113)
4AA5 (n=330)
4AA6 (n=1,300)
4AA7 (n=482)
4AZ3 (n=662)
4AZ4 (n=243)
Change in outcome measures in stroke, 2015 to 2016

Difference from 2015 data - All Stroke

2015

<table>
<thead>
<tr>
<th>Measure</th>
<th>2015 (%)</th>
<th>Difference from 2015 data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>73.2</td>
<td></td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>28.3</td>
<td></td>
</tr>
<tr>
<td>FIM admission score</td>
<td>75.2</td>
<td></td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>97.9</td>
<td></td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>22.7</td>
<td></td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>5.6</td>
<td></td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>83.0</td>
<td></td>
</tr>
</tbody>
</table>

2015 (n = 9,013)
2016 (n = 9,046)

Lower than 2015 data
Higher than 2015 data
Brain dysfunction episodes over time

Number of episodes by quarter - Brain dysfunction

- Specialist
- Non Specialist
- Total

Year - Quarter

Number of episodes
Brain dysfunction casemix over time – Specialist facilities

Proportion of episodes within year

Year

Specialist Facilities

Proportions for each year are shown, with different facilities represented by different colors.

- 2012
- 2013
- 2014
- 2015
- 2016

Facilities:
- 4AZ2
- 4AZ1
- 4AB7
- 4AB6
- 4AB5
- 4AB4
- 4AB3
- 4AB2
- 4AB1
Brain dysfunction casemix over time – Non specialist facilities

Non Specialist Facilities

<table>
<thead>
<tr>
<th>Year</th>
<th>2012</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
<th>2016</th>
</tr>
</thead>
<tbody>
<tr>
<td>4AZ2</td>
<td></td>
<td></td>
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<td></td>
</tr>
<tr>
<td>4AZ1</td>
<td></td>
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<td></td>
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<tr>
<td>4AB7</td>
<td></td>
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<td>4AB6</td>
<td></td>
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<tr>
<td>4AB5</td>
<td></td>
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<td>4AB4</td>
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<td>4AB3</td>
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<td>4AB2</td>
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<tr>
<td>4AB1</td>
<td></td>
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</tbody>
</table>
## Brain dysfunction episodes in 2016 - Specialist facilities

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AB1</th>
<th>4AB2</th>
<th>4AB3</th>
<th>4AB4</th>
<th>4AB5</th>
<th>4AB6</th>
<th>4AB7</th>
<th>4AZ1</th>
<th>4AZ2</th>
<th>All Brain dysfunction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>135</td>
<td>174</td>
<td>84</td>
<td>102</td>
<td>76</td>
<td>57</td>
<td>58</td>
<td>55</td>
<td>67</td>
<td>832</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>16.2%</td>
<td>20.9%</td>
<td>10.1%</td>
<td>12.3%</td>
<td>9.1%</td>
<td>6.9%</td>
<td>7.0%</td>
<td>6.6%</td>
<td>8.1%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>33.3%</td>
<td>10.9%</td>
<td>70.2%</td>
<td>28.4%</td>
<td>10.5%</td>
<td>12.3%</td>
<td>1.7%</td>
<td>9.1%</td>
<td>3.0%</td>
<td>21.0%</td>
</tr>
<tr>
<td>Public</td>
<td>66.7%</td>
<td>89.1%</td>
<td>29.8%</td>
<td>71.6%</td>
<td>89.5%</td>
<td>87.7%</td>
<td>98.3%</td>
<td>90.9%</td>
<td>97.0%</td>
<td>79.0%</td>
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<tr>
<td>Gender (%)</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>30.4%</td>
<td>30.5%</td>
<td>33.3%</td>
<td>34.3%</td>
<td>19.7%</td>
<td>33.3%</td>
<td>36.2%</td>
<td>49.1%</td>
<td>26.9%</td>
<td>31.5%</td>
</tr>
<tr>
<td>Male</td>
<td>69.6%</td>
<td>69.5%</td>
<td>66.7%</td>
<td>65.7%</td>
<td>80.3%</td>
<td>66.7%</td>
<td>63.8%</td>
<td>50.9%</td>
<td>73.1%</td>
<td>68.5%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>48.9 (45.9-51.9)</td>
<td>45.1 (42.7-47.6)</td>
<td>65.9 (62.1-69.7)</td>
<td>51.6 (47.6-55.6)</td>
<td>49.2 (45.2-53.1)</td>
<td>46.2 (40.8-51.6)</td>
<td>46.2 (41.6-50.9)</td>
<td>60.2 (57.9-62.5)</td>
<td>34.1 (32.0-36.2)</td>
<td>49.3 (48.0-50.6)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>111.3 (110.0-112.7)</td>
<td>01.0 (99.5-102.5)</td>
<td>87.0 (84.9-89.2)</td>
<td>76.6 (74.7-78.6)</td>
<td>63.7 (61.2-66.1)</td>
<td>48.4 (45.7-51.0)</td>
<td>37.3 (34.5-40.0)</td>
<td>21.9 (19.0-24.8)</td>
<td>20.1 (19.0-21.2)</td>
<td>81.0 (78.7-83.3)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>14.3 (12.6-16.0)</td>
<td>24.8 (21.2-28.5)</td>
<td>19.9 (17.2-22.7)</td>
<td>31.1 (27.2-34.9)</td>
<td>44.2 (37.7-50.7)</td>
<td>57.4 (46.6-68.2)</td>
<td>88.0 (55.3-120.7)</td>
<td>06.6 (77.6-135.5)</td>
<td>5.1 (101.0-229.2)</td>
<td>39.2 (34.8-43.7)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
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<tr>
<td>Discharged to community</td>
<td>86.2%</td>
<td>79.6%</td>
<td>53.7%</td>
<td>57.5%</td>
<td>55.6%</td>
<td>33.6%</td>
<td>32.4%</td>
<td>20.2%</td>
<td>34.1%</td>
<td>54.9%</td>
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<tr>
<td>Remaining in hospital system</td>
<td>13.8%</td>
<td>20.4%</td>
<td>46.3%</td>
<td>42.5%</td>
<td>44.4%</td>
<td>66.4%</td>
<td>67.6%</td>
<td>79.8%</td>
<td>65.9%</td>
<td>45.1%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>10.3 (9.0-11.6)</td>
<td>14.2 (12.7-15.7)</td>
<td>24.1 (21.3-26.8)</td>
<td>32.4 (29.4-35.3)</td>
<td>42.0 (37.4-46.6)</td>
<td>45.7 (38.6-52.8)</td>
<td>53.7 (45.1-62.3)</td>
<td>56.4 (44.1-68.7)</td>
<td>59.2 (45.2-73.1)</td>
<td>27.5 (25.7-29.3)</td>
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<td>FIM efficiency (FIM change/LOS)</td>
<td>0.7</td>
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<td>1.0</td>
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## Brain dysfunction episodes in 2016 - Non specialist facilities

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<th>AN-SNAP class:</th>
<th>4AB1</th>
<th>4AB2</th>
<th>4AB3</th>
<th>4AB4</th>
<th>4AB5</th>
<th>4AB6</th>
<th>4AB7</th>
<th>4AZ1</th>
<th>4AZ2</th>
<th>All Brain dysfunction</th>
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<tr>
<td>Number of episodes</td>
<td>383</td>
<td>197</td>
<td>423</td>
<td>376</td>
<td>129</td>
<td>177</td>
<td>158</td>
<td>103</td>
<td>36</td>
<td>1,987</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>19.3%</td>
<td>9.9%</td>
<td>21.3%</td>
<td>18.9%</td>
<td>6.5%</td>
<td>8.9%</td>
<td>8.0%</td>
<td>5.2%</td>
<td>1.8%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>38.6%</td>
<td>18.8%</td>
<td>40.7%</td>
<td>31.4%</td>
<td>21.7%</td>
<td>24.3%</td>
<td>15.8%</td>
<td>19.4%</td>
<td>22.2%</td>
<td>30.1%</td>
</tr>
<tr>
<td>Public</td>
<td>61.4%</td>
<td>81.2%</td>
<td>59.3%</td>
<td>68.6%</td>
<td>78.3%</td>
<td>75.7%</td>
<td>84.2%</td>
<td>80.6%</td>
<td>77.8%</td>
<td>69.9%</td>
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<td>Gender (%)</td>
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<tr>
<td>Female</td>
<td>43.1%</td>
<td>35.0%</td>
<td>52.7%</td>
<td>43.1%</td>
<td>40.3%</td>
<td>44.6%</td>
<td>43.7%</td>
<td>48.5%</td>
<td>8.3%</td>
<td>43.9%</td>
</tr>
<tr>
<td>Male</td>
<td>56.9%</td>
<td>65.0%</td>
<td>47.3%</td>
<td>56.9%</td>
<td>59.7%</td>
<td>55.4%</td>
<td>56.3%</td>
<td>51.5%</td>
<td>91.7%</td>
<td>56.1%</td>
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<tr>
<td>Age (Mean+95%CI)</td>
<td>62.1 (60.3-63.9)</td>
<td>58.9 (56.3-61.4)</td>
<td>71.1 (69.5-72.7)</td>
<td>70.4 (68.7-72.1)</td>
<td>65.9 (63.0-68.8)</td>
<td>68.6 (65.9-71.2)</td>
<td>64.3 (61.6-67.0)</td>
<td>70.3 (68.4-72.2)</td>
<td>34.8 (31.6-37.9)</td>
<td>66.2 (65.4-67.0)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>108.0 (107.2-108.7)</td>
<td>99.8 (98.6-100.9)</td>
<td>87.2 (86.3-88.1)</td>
<td>76.0 (75.0-77.1)</td>
<td>66.1 (64.3-68.0)</td>
<td>52.0 (50.6-53.5)</td>
<td>38.3 (36.6-39.9)</td>
<td>26.4 (24.7-28.1)</td>
<td>24.5 (21.3-27.6)</td>
<td>81.0 (79.8-82.2)</td>
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<tr>
<td>LOS (Mean+95%CI)</td>
<td>12.4 (11.5-13.2)</td>
<td>19.5 (16.6-22.5)</td>
<td>17.5 (16.4-18.6)</td>
<td>21.6 (20.0-23.1)</td>
<td>28.3 (24.4-32.2)</td>
<td>34.1 (30.4-37.8)</td>
<td>39.6 (35.0-44.1)</td>
<td>48.6 (39.2-58.0)</td>
<td>80.9 (58.4-103.3)</td>
<td>22.4 (21.5-23.4)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>94.6%</td>
<td>82.2%</td>
<td>85.5%</td>
<td>84.2%</td>
<td>70.5%</td>
<td>64.1%</td>
<td>59.7%</td>
<td>38.5%</td>
<td>24.3%</td>
<td>76.2%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>5.4%</td>
<td>17.8%</td>
<td>14.5%</td>
<td>15.8%</td>
<td>29.5%</td>
<td>35.9%</td>
<td>40.3%</td>
<td>61.5%</td>
<td>75.7%</td>
<td>23.8%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>11.0 (10.2-11.7)</td>
<td>13.7 (12.4-15.1)</td>
<td>22.1 (21.0-23.1)</td>
<td>25.7 (24.3-27.1)</td>
<td>32.9 (29.7-36.0)</td>
<td>33.0 (29.2-36.8)</td>
<td>36.2 (31.3-41.1)</td>
<td>33.4 (25.7-41.1)</td>
<td>35.1 (18.1-52.2)</td>
<td>22.4 (21.6-23.2)</td>
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<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.9</td>
<td>0.7</td>
<td>1.3</td>
<td>1.2</td>
<td>1.2</td>
<td>1.0</td>
<td>0.9</td>
<td>0.7</td>
<td>0.4</td>
<td>1.0</td>
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</tbody>
</table>
Brain dysfunction discharge destination by AN-SNAP Class – Specialist facilities

Specialist - Discharge destination - Brain dysfunction

Percentage

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

AN-SNAP class

- 4AB1 (n=135)
- 4AB2 (n=174)
- 4AB3 (n=84)
- 4AB4 (n=102)
- 4AB5 (n=76)
- 4AB6 (n=57)
- 4AB7 (n=58)
- 4AZ1 (n=55)
- 4AZ2 (n=67)
- All Brain dysfunction (n=832)
Brain dysfunction discharge destination by
AN-SNAP Class – Non specialist facilities

Non specialist - Discharge destination - Brain dysfunction

Percentage

Remaining in hospital system
Unknown residence
Other supported residence
Private residence - ?? Support
Private residence - with support
Private residence - no support

AN-SNAP class

4AB1 (n=383)
4AB2 (n=197)
4AB3 (n=423)
4AB4 (n=376)
4AB5 (n=129)
4AB6 (n=177)
4AB7 (n=158)
4AZ1 (n=103)
4AZ2 (n=36)
All Brain dysfunction (n=1,987)
Brain dysfunction LOS and FIM change by AN-SNAP Class – Specialist facilities

Specialist - LOS and FIM change by AN-SNAP class

Mean days/score

AN-SNAP class

4AB1 (n=135)
4AB2 (n=174)
4AB3 (n=84)
4AB4 (n=102)
4AB5 (n=76)
4AB6 (n=57)
4AB7 (n=58)
4AZ1 (n=55)
4AZ2 (n=67)

Mean LOS
Mean FIM improvement
Brain dysfunction LOS and FIM change by AN-SNAP Class – Non specialist facilities

Non specialist - LOS and FIM change by AN-SNAP class

Mean LOS  Mean FIM improvement

AN-SNAP class

4AB1 (n=383)  4AB2 (n=197)  4AB3 (n=423)  4AB4 (n=376)  4AB5 (n=129)  4AB6 (n=177)  4AB7 (n=158)  4AZ1 (n=103)  4AZ2 (n=36)
Change in outcome measures in brain dysfunction, 2015 to 2016 - Specialist facilities

2015 - Specialist - Difference from 2015 data - All Brain dysfunction

Lower than 2015 data

Higher than 2015 data

- Age (years) 47.2
- Length of stay (days) 40.1
- FIM admission score 83.8
- FIM discharge score 109.3
- FIM change (adm to disch) 25.4
- FIM efficiency (per week) 4.4
- Disch to community (%) 84.3

2015 (n = 826)
2016 (n = 832)

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Change in outcome measures in brain dysfunction, 2015 to 2016 - Non specialist facilities

Non specialist - Difference from 2015 data - All Brain dysfunction

- Age (years): 66.2
- Length of stay (days): 23.9
- FIM admission score: 81.3
- FIM discharge score: 103.0
- FIM change (adm to disch): 21.7
- FIM efficiency (per week): 6.4
- Disch to community (%): 83.0

2015 (n = 1,868)
2016 (n = 1,987)

Lower than 2015 data
Higher than 2015 data
Neurological conditions episodes over time

Number of episodes by quarter - Neurological conditions

Year - Quarter

Number of episodes

AROC State of Nations | 2016 report | Australia
Neurological conditions casemix over time
## Neurological conditions episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AC1</th>
<th>4AC2</th>
<th>4AC3</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Neurological conditions</th>
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<tbody>
<tr>
<td>Number of episodes</td>
<td>1,703</td>
<td>1,241</td>
<td>874</td>
<td>112</td>
<td>105</td>
<td>4,042</td>
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<tr>
<td>Proportion of episodes</td>
<td>42.1%</td>
<td>30.7%</td>
<td>21.6%</td>
<td>2.8%</td>
<td>2.6%</td>
<td>100.0%</td>
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<tr>
<td>Sector (%)</td>
<td></td>
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</tr>
<tr>
<td>Private</td>
<td>57.7%</td>
<td>49.4%</td>
<td>33.6%</td>
<td>28.6%</td>
<td>18.1%</td>
<td>48.0%</td>
</tr>
<tr>
<td>Public</td>
<td>42.3%</td>
<td>50.6%</td>
<td>66.4%</td>
<td>71.4%</td>
<td>81.9%</td>
<td>52.0%</td>
</tr>
<tr>
<td>Gender (%)</td>
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<td></td>
</tr>
<tr>
<td>Female</td>
<td>51.1%</td>
<td>47.7%</td>
<td>49.2%</td>
<td>33.0%</td>
<td>54.3%</td>
<td>49.3%</td>
</tr>
<tr>
<td>Male</td>
<td>48.8%</td>
<td>52.3%</td>
<td>50.8%</td>
<td>67.0%</td>
<td>45.7%</td>
<td>50.7%</td>
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<tr>
<td>Age (Mean+95%CI)</td>
<td>65.5 (64.7-66.3)</td>
<td>70.8 (69.9-71.7)</td>
<td>66.3 (65.3-67.4)</td>
<td>77.2 (75.8-78.6)</td>
<td>44.1 (41.5-46.7)</td>
<td>67.1 (66.6-67.6)</td>
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<td>Admission FIM (Mean+95%CI)</td>
<td>102.1 (101.6-102.5)</td>
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<td>56.9 (56.1-57.7)</td>
<td>32.8 (30.3-35.2)</td>
<td>35.5 (33.1-37.8)</td>
<td>83.2 (82.4-83.9)</td>
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<td>LOS (Mean+95%CI)</td>
<td>14.0 (13.6-14.4)</td>
<td>20.2 (19.1-21.2)</td>
<td>29.5 (27.9-31.2)</td>
<td>37.1 (29.5-44.6)</td>
<td>45.5 (35.0-56.0)</td>
<td>20.2 (19.6-20.8)</td>
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<td>Discharge destination (%)</td>
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<tr>
<td>Discharged to community</td>
<td>93.0%</td>
<td>89.1%</td>
<td>83.1%</td>
<td>62.0%</td>
<td>76.2%</td>
<td>88.4%</td>
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<tr>
<td>Remaining in hospital system</td>
<td>7.0%</td>
<td>10.9%</td>
<td>16.9%</td>
<td>38.0%</td>
<td>23.8%</td>
<td>11.6%</td>
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<tr>
<td>FIM change (Mean+95%CI)</td>
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<td>19.2 (18.5-19.9)</td>
<td>22.5 (21.1-23.9)</td>
<td>22.5 (16.8-28.2)</td>
<td>18.2 (12.9-23.4)</td>
<td>16.8 (16.4-17.3)</td>
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<td>FIM efficiency (FIM change/LOS)</td>
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<td>1.0</td>
<td>0.8</td>
<td>0.6</td>
<td>0.4</td>
<td>0.8</td>
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</table>
Neurological conditions discharge destination by AN-SNAP class

Discharge destination - Neurological conditions

AN-SNAP class

Percentage

Remaining in hospital system
Unknown residence
Other supported residence
Private residence - ?? Support
Private residence - with support
Private residence - no support

0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100%

4AC1 (n=1,703)
4AC2 (n=1,241)
4AC3 (n=874)
4AZ3 (n=112)
4AZ4 (n=105)
All Neurological conditions (n=4,042)
Neurological conditions LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score

AN-SNAP class

Mean LOS
Mean FIM improvement

4AC1 (n=1,703)
4AC2 (n=1,241)
4AC3 (n=874)
4AZ3 (n=112)
4AZ4 (n=105)
Change in outcome measures in neurological conditions, 2015 to 2016

Difference from 2015 data - All Neurological conditions

Lower than 2015 data

- Age (years) 66.4
- Length of stay (days) 21.0
- FIM admission score 84.4
- FIM discharge score 101.3
- FIM change (adm to disch) 16.9
- FIM efficiency (per week) 5.6
- Disch to community (%) 88.6

Higher than 2015 data

2015 (n = 3,797)
2016 (n = 4,042)

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Spinal cord dysfunction episodes over time

Number of episodes by quarter - Spinal cord dysfunction

- Specialist
- Non Specialist
- Total

Year - Quarter

Number of episodes
Spinal cord dysfunction casemix over time – Specialist facilities
Spinal cord dysfunction casemix over time – Non specialist facilities
<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AD1</th>
<th>4AD2</th>
<th>4AD3</th>
<th>4AD4</th>
<th>4AZ1</th>
<th>4AZ2</th>
<th>All Spinal cord dysfunction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>79</td>
<td>128</td>
<td>88</td>
<td>48</td>
<td>72</td>
<td>51</td>
<td>467</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>16.9%</td>
<td>27.4%</td>
<td>18.8%</td>
<td>10.3%</td>
<td>15.4%</td>
<td>10.9%</td>
<td>100.0%</td>
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<tr>
<td>Sector (%)</td>
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<td></td>
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<td></td>
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</tr>
<tr>
<td>Private</td>
<td>0.0%</td>
<td>0.0%</td>
<td>0.0%</td>
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<td>0.0%</td>
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<td>100.0%</td>
<td>100.0%</td>
<td>100.0%</td>
<td>100.0%</td>
<td>100.0%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>50.6%</td>
<td>32.8%</td>
<td>44.3%</td>
<td>29.2%</td>
<td>26.4%</td>
<td>25.5%</td>
<td>35.8%</td>
</tr>
<tr>
<td>Male</td>
<td>49.4%</td>
<td>67.2%</td>
<td>55.7%</td>
<td>70.8%</td>
<td>73.6%</td>
<td>74.5%</td>
<td>64.2%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>63.9 (61.7-66.2)</td>
<td>67.8 (66.0-69.6)</td>
<td>36.5 (34.8-38.3)</td>
<td>36.5 (34.2-38.9)</td>
<td>65.9 (63.4-68.4)</td>
<td>33.2 (30.6-35.8)</td>
<td>53.9 (52.2-55.5)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>95.5 (92.8-98.3)</td>
<td>60.8 (58.7-62.9)</td>
<td>95.6 (92.2-99.0)</td>
<td>62.2 (60.1-64.4)</td>
<td>42.9 (40.2-45.5)</td>
<td>46.6 (44.4-48.7)</td>
<td>71.1 (68.7-73.5)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>31.1 (25.2-37.0)</td>
<td>101.9 (88.8-114.9)</td>
<td>38.0 (31.2-44.8)</td>
<td>85.5 (65.6-105.4)</td>
<td>26.9 (105.1-148.8)</td>
<td>41.2 (106.4-176.0)</td>
<td>80.4 (73.0-87.8)</td>
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<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>75.3%</td>
<td>47.6%</td>
<td>82.3%</td>
<td>60.3%</td>
<td>49.5%</td>
<td>58.6%</td>
<td>60.5%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>24.7%</td>
<td>52.4%</td>
<td>17.7%</td>
<td>39.7%</td>
<td>50.5%</td>
<td>41.4%</td>
<td>39.5%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>19.8 (17.1-22.6)</td>
<td>32.3 (28.1-36.5)</td>
<td>19.2 (16.0-22.5)</td>
<td>40.8 (35.1-46.4)</td>
<td>34.9 (27.4-42.3)</td>
<td>19.8 (12.0-27.7)</td>
<td>27.3 (25.2-29.4)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.6</td>
<td>0.3</td>
<td>0.5</td>
<td>0.5</td>
<td>0.3</td>
<td>0.1</td>
<td>0.3</td>
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</table>
## Spinal cord dysfunction episodes in 2016 - Non specialist facilities

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AD1</th>
<th>4AD2</th>
<th>4AD3</th>
<th>4AD4</th>
<th>4AZ1</th>
<th>4AZ2</th>
<th>All Spinal cord dysfunction</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>164</td>
<td>173</td>
<td>80</td>
<td>30</td>
<td>43</td>
<td>12</td>
<td>505</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>32.5%</td>
<td>34.3%</td>
<td>15.8%</td>
<td>5.9%</td>
<td>8.5%</td>
<td>2.4%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>25.6%</td>
<td>14.5%</td>
<td>30.0%</td>
<td>6.7%</td>
<td>0.0%</td>
<td>16.7%</td>
<td>18.8%</td>
</tr>
<tr>
<td>Public</td>
<td>74.4%</td>
<td>85.5%</td>
<td>70.0%</td>
<td>93.3%</td>
<td>100.0%</td>
<td>83.3%</td>
<td>81.2%</td>
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<tr>
<td>Gender (%)</td>
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<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>40.9%</td>
<td>36.4%</td>
<td>38.8%</td>
<td>20.0%</td>
<td>25.6%</td>
<td>33.3%</td>
<td>36.4%</td>
</tr>
<tr>
<td>Male</td>
<td>59.1%</td>
<td>63.0%</td>
<td>61.3%</td>
<td>80.0%</td>
<td>74.4%</td>
<td>66.7%</td>
<td>63.4%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>69.8 (68.2-71.4)</td>
<td>68.3 (66.7-69.9)</td>
<td>37.9 (36.1-39.8)</td>
<td>36.5 (33.0-40.0)</td>
<td>71.6 (68.5-74.8)</td>
<td>35.2 (30.3-40.0)</td>
<td>61.5 (60.0-63.0)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>92.5 (90.4-94.7)</td>
<td>61.3 (59.6-62.9)</td>
<td>91.7 (88.6-94.8)</td>
<td>62.4 (59.4-65.4)</td>
<td>40.2 (36.8-43.6)</td>
<td>52.8 (49.4-56.1)</td>
<td>77.3 (75.2-79.4)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>19.8 (17.4-22.2)</td>
<td>50.0 (44.3-55.7)</td>
<td>26.8 (21.6-32.0)</td>
<td>48.1 (29.6-66.5)</td>
<td>62.1 (40.8-83.4)</td>
<td>17.0 (-0.2-34.2)</td>
<td>34.6 (31.5-37.7)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>85.8%</td>
<td>53.6%</td>
<td>80.9%</td>
<td>37.5%</td>
<td>29.9%</td>
<td>14.3%</td>
<td>61.3%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>14.2%</td>
<td>46.4%</td>
<td>19.1%</td>
<td>62.5%</td>
<td>70.1%</td>
<td>85.7%</td>
<td>38.7%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>18.0 (16.3-19.8)</td>
<td>26.7 (23.3-30.1)</td>
<td>18.3 (15.4-21.2)</td>
<td>27.8 (15.9-39.7)</td>
<td>26.2 (15.6-36.9)</td>
<td>16.5 (-12.7-45.7)</td>
<td>21.8 (20.1-23.5)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.9</td>
<td>0.5</td>
<td>0.7</td>
<td>0.6</td>
<td>0.4</td>
<td>1.0</td>
<td>0.6</td>
</tr>
</tbody>
</table>
Spinal cord dysfunction discharge destination by AN-SNAP class – Specialist facilities

Specialist - Discharge destination - Spinal cord dysfunction

Percentage

AN-SNAP class

Remaining in hospital system
Unknown residence
Other supported residence
Private residence - ?? Support
Private residence - with support
Private residence - no support

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Spinal cord dysfunction discharge destination by AN-SNAP class – Non specialist facilities

Non specialist - Discharge destination - Spinal cord dysfunction

Percentage

AN-SNAP class

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

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Spinal cord dysfunction LOS and FIM change by AN-SNAP class – Specialist facilities

Specialist - LOS and FIM change by AN-SNAP class

Mean LOS
Mean FIM improvement

AN-SNAP class

4AD1 (n=79)
4AD2 (n=128)
4AD3 (n=88)
4AD4 (n=48)
4AZ1 (n=72)
4AZ2 (n=51)
Spinal cord dysfunction LOS and FIM change by AN-SNAP class – Non specialist facilities

Non specialist - LOS and FIM change by AN-SNAP class

Mean days/score
AN-SNAP class
Non specialist - LOS and FIM change by AN-SNAP class
Mean LOS
Mean FIM improvement

AN-SNAP class
4AD1 (n=164)
4AD2 (n=173)
4AD3 (n=80)
4AD4 (n=30)
4AZ1 (n=43)
4AZ2 (n=12)
Change in outcome measures in spinal cord dysfunction, 2015 to 2016 - Specialist facilities

2015

-5 -4 -3 -2 -1 0 1 2 3 4

Lower than 2015 data

Higher than 2015 data

Age (years) 53.9
Length of stay (days) 84.9
FIM admission score 68.0
FIM discharge score 96.1
FIM change (adm to disch) 28.1
FIM efficiency (per week) 2.3
Disch to community (%) 80.8

2015 (n = 450)
2016 (n = 467)
Change in outcome measures in spinal cord dysfunction, 2015 to 2016 - Non specialist facilities

Non specialist - Difference from 2015 data - All Spinal cord dysfunction

<table>
<thead>
<tr>
<th>Outcome Measure</th>
<th>2015</th>
<th>2016</th>
<th>Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>62.8</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>33.1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM admission score</td>
<td>80.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>99.4</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>18.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>3.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>74.2</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Lower than 2015 data

Higher than 2015 data

2015 (n = 423)
2016 (n = 505)
Amputation episodes over time

Number of episodes by quarter - Amputation of limb

Year - Quarter

Number of episodes
Amputation casemix over time

Proportion of episodes within year

Year

2012
2013
2014
2015
2016

4AZ4
4AZ3
4AE4
4AE3
4AE2
4AE1
# Amputation episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AE1</th>
<th>4AE2</th>
<th>4AE3</th>
<th>4AE4</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Amputation of limb</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>64</td>
<td>853</td>
<td>167</td>
<td>239</td>
<td>19</td>
<td>9</td>
<td>1,354</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>4.7%</td>
<td>63.0%</td>
<td>12.3%</td>
<td>17.7%</td>
<td>1.4%</td>
<td>0.7%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>12.5%</td>
<td>19.7%</td>
<td>13.2%</td>
<td>7.9%</td>
<td>5.3%</td>
<td>0.0%</td>
<td>16.1%</td>
</tr>
<tr>
<td>Public</td>
<td>87.5%</td>
<td>80.3%</td>
<td>86.8%</td>
<td>92.1%</td>
<td>94.7%</td>
<td>100.0%</td>
<td>83.9%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>25.0%</td>
<td>24.4%</td>
<td>35.3%</td>
<td>33.1%</td>
<td>36.8%</td>
<td>55.6%</td>
<td>27.7%</td>
</tr>
<tr>
<td>Male</td>
<td>75.0%</td>
<td>75.6%</td>
<td>64.7%</td>
<td>66.9%</td>
<td>63.2%</td>
<td>44.4%</td>
<td>72.3%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>66.3 (64.0-68.6)</td>
<td>71.0 (70.3-71.6)</td>
<td>73.3 (71.9-74.8)</td>
<td>44.4 (43.3-45.4)</td>
<td>77.4 (73.9-80.9)</td>
<td>47.0 (39.2-54.8)</td>
<td>66.2 (65.5-67.0)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>113.5 (112.3-114.7)</td>
<td>89.3 (88.2-90.4)</td>
<td>54.5 (52.8-56.3)</td>
<td>98.4 (96.3-100.5)</td>
<td>36.8 (30.7-42.8)</td>
<td>41.3 (35.7-46.9)</td>
<td>87.7 (86.5-88.9)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>20.4 (17.0-23.9)</td>
<td>30.9 (29.1-32.7)</td>
<td>42.8 (36.9-48.6)</td>
<td>28.6 (25.8-31.5)</td>
<td>40.3 (27.8-52.7)</td>
<td>57.6 (38.5-76.6)</td>
<td>31.4 (30.0-32.9)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>87.5%</td>
<td>75.4%</td>
<td>65.7%</td>
<td>85.7%</td>
<td>52.6%</td>
<td>77.8%</td>
<td>76.2%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>12.5%</td>
<td>24.6%</td>
<td>34.3%</td>
<td>14.3%</td>
<td>47.4%</td>
<td>22.2%</td>
<td>23.8%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>4.4 (3.4-5.5)</td>
<td>16.7 (15.9-17.5)</td>
<td>26.9 (23.8-30.1)</td>
<td>14.2 (12.6-15.9)</td>
<td>23.1 (7.6-38.6)</td>
<td>29.3 (14.4-44.2)</td>
<td>16.8 (16.0-17.6)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.2</td>
<td>0.5</td>
<td>0.6</td>
<td>0.5</td>
<td>0.6</td>
<td>0.5</td>
<td>0.5</td>
</tr>
</tbody>
</table>
Amputation discharge destination by AN-SNAP class

Discharge destination - Amputation of limb

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

AN-SNAP class

- 4AE1 (n=64)
- 4AE2 (n=853)
- 4AE3 (n=167)
- 4AE4 (n=239)
- 4AZ3 (n=19)
- 4AZ4 (n=9)
- All Amputation of limb (n=1,354)
Amputation LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

![Graph showing mean LOS and FIM improvement for different AN-SNAP classes.](image)

**AN-SNAP class**

- 4AE1 (n=64)
- 4AE2 (n=853)
- 4AE3 (n=167)
- 4AE4 (n=239)
- 4AZ3 (n=19)
- 4AZ4 (n=9)

**Mean days/score**

- Mean LOS
- Mean FIM improvement
Change in outcome measures in amputation, 2015 to 2016

Difference from 2015 data - All Amputation of limb

<table>
<thead>
<tr>
<th>Outcome Measure</th>
<th>2015</th>
<th>2016</th>
<th>Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>65.9</td>
<td>65.8</td>
<td>0.1</td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>32.6</td>
<td>36.9</td>
<td>4.3</td>
</tr>
<tr>
<td>FIM admission score</td>
<td>88.6</td>
<td>92.1</td>
<td>3.5</td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>104.7</td>
<td>108.2</td>
<td>3.5</td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>16.1</td>
<td>15.6</td>
<td>-0.5</td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>3.5</td>
<td>3.7</td>
<td>0.2</td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>79.0</td>
<td>82.7</td>
<td>3.7</td>
</tr>
</tbody>
</table>

2015 (n = 1,369)  
2016 (n = 1,354)

Lower than 2015 data  
Higher than 2015 data
Arthritis episodes over time
Arthritis casemix over time
### Arthritis episodes in 2016

#### AN-SNAP class:

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4A91</th>
<th>4A92</th>
<th>4A93</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Arthritis</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>388</td>
<td>138</td>
<td>37</td>
<td>8</td>
<td>3</td>
<td>575</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>67.5%</td>
<td>24.0%</td>
<td>6.4%</td>
<td>1.4%</td>
<td>n &lt; 5</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>76.5%</td>
<td>36.2%</td>
<td>27.0%</td>
<td>37.5%</td>
<td>n &lt; 5</td>
<td>62.6%</td>
</tr>
<tr>
<td>Public</td>
<td>23.5%</td>
<td>63.8%</td>
<td>73.0%</td>
<td>62.5%</td>
<td>n &lt; 5</td>
<td>37.4%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>67.8%</td>
<td>61.6%</td>
<td>64.9%</td>
<td>62.5%</td>
<td>n &lt; 5</td>
<td>65.7%</td>
</tr>
<tr>
<td>Male</td>
<td>32.2%</td>
<td>38.4%</td>
<td>35.1%</td>
<td>37.5%</td>
<td>n &lt; 5</td>
<td>34.3%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>74.2 (72.9-75.4)</td>
<td>77.9 (75.6-80.1)</td>
<td>74.2 (69.8-78.6)</td>
<td>89.3 (86.7-91.8)</td>
<td>n &lt; 5</td>
<td>75.2 (74.2-76.3)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>101.8 (100.8-102.9)</td>
<td>74.2 (72.5-76.0)</td>
<td>54.7 (51.0-58.4)</td>
<td>31.8 (21.1-42.5)</td>
<td>n &lt; 5</td>
<td>92.3 (90.6-93.9)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>12.3 (11.7-13.0)</td>
<td>19.9 (17.9-21.8)</td>
<td>30.3 (23.8-36.8)</td>
<td>27.2 (20.7-33.7)</td>
<td>n &lt; 5</td>
<td>15.2 (14.3-16.0)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>95.6%</td>
<td>84.8%</td>
<td>83.8%</td>
<td>75.0%</td>
<td>n &lt; 5</td>
<td>91.7%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>4.4%</td>
<td>15.2%</td>
<td>16.2%</td>
<td>25.0%</td>
<td>n &lt; 5</td>
<td>8.3%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>12.3 (11.5-13.1)</td>
<td>22.5 (20.4-24.6)</td>
<td>27.6 (21.0-34.1)</td>
<td>24.8 (-1.0-50.6)</td>
<td>n &lt; 5</td>
<td>15.5 (14.5-16.5)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.0</td>
<td>1.1</td>
<td>0.9</td>
<td>0.9</td>
<td>n &lt; 5</td>
<td>1.0</td>
</tr>
</tbody>
</table>
Arthritis discharge destination by AN-SNAP class

Discharge destination - Arthritis

Percentage

AN-SNAP class

Remaining in hospital system
Unknown residence
Other supported residence
Private residence - ?? Support
Private residence - with support
Private residence - no support

4A91 (n=388)
4A92 (n=138)
4A93 (n=37)
4AZ3 (n=8)
4AZ4 (n<5)
All Arthritis (n=575)
Arthritis LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean LOS
Mean FIM improvement

Mean days/score
AN-SNAP class

4A91 (n=388)
4A92 (n=138)
4A93 (n=37)
4AZ3 (n=8)
4AZ4 (n<5)
Change in outcome measures in arthritis, 2015 to 2016

Difference from 2015 data - All Arthritis

- Age (years) 75.2
- Length of stay (days) 15.4
- FIM admission score 91.6
- FIM discharge score 107.5
- FIM change (adm to disch) 15.9
- FIM efficiency (per week) 7.2
- Disch to community (%) 91.7

2015 (n = 565)
2016 (n = 575)

Lower than 2015 data
Higher than 2015 data

AROC State of Nations | 2016 report | Australia
Orthopaedic fracture episodes over time

Number of episodes by quarter - Orthopaedic fractures

Year - Quarter

AROC State of Nations | 2016 report | Australia
Orthopaedic fracture casemix over time

Year

Proportion of episodes within year


4AZ4
4AZ3
4AH4
4AH3
4AH2
4AH1
## Orthopaedic fracture episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AH1</th>
<th>4AH2</th>
<th>4AH3</th>
<th>4AH4</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Orthopaedic fractures</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>6,246</td>
<td>5,717</td>
<td>3,438</td>
<td>3,345</td>
<td>449</td>
<td>22</td>
<td>19,232</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>32.5%</td>
<td>29.7%</td>
<td>17.9%</td>
<td>17.4%</td>
<td>2.3%</td>
<td>0.1%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>60.6%</td>
<td>53.2%</td>
<td>40.2%</td>
<td>33.5%</td>
<td>24.5%</td>
<td>18.2%</td>
<td>49.1%</td>
</tr>
<tr>
<td>Public</td>
<td>39.4%</td>
<td>46.8%</td>
<td>59.8%</td>
<td>66.5%</td>
<td>75.5%</td>
<td>81.8%</td>
<td>50.9%</td>
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<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>71.1%</td>
<td>71.3%</td>
<td>71.0%</td>
<td>69.7%</td>
<td>65.5%</td>
<td>54.5%</td>
<td>70.8%</td>
</tr>
<tr>
<td>Male</td>
<td>28.9%</td>
<td>28.7%</td>
<td>29.0%</td>
<td>30.3%</td>
<td>34.5%</td>
<td>45.5%</td>
<td>29.2%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>74.2 (73.9-74.6)</td>
<td>80.1 (79.8-80.4)</td>
<td>79.9 (79.5-80.3)</td>
<td>80.6 (80.2-81.0)</td>
<td>85.7 (85.0-86.4)</td>
<td>47.9 (41.6-54.1)</td>
<td>78.3 (78.2-78.5)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>96.9 (96.7-97.2)</td>
<td>85.4 (85.2-85.7)</td>
<td>70.7 (70.5-71.0)</td>
<td>54.8 (54.4-55.1)</td>
<td>31.8 (30.7-32.9)</td>
<td>39.8 (32.5-47.0)</td>
<td>81.0 (80.7-81.3)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>16.7 (16.4-16.9)</td>
<td>19.2 (18.8-19.5)</td>
<td>24.9 (24.4-25.4)</td>
<td>30.1 (29.4-30.7)</td>
<td>29.4 (27.2-31.5)</td>
<td>52.8 (26.9-78.7)</td>
<td>21.2 (21.0-21.4)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>93.4%</td>
<td>90.0%</td>
<td>86.2%</td>
<td>78.9%</td>
<td>65.3%</td>
<td>71.4%</td>
<td>87.9%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>6.6%</td>
<td>10.0%</td>
<td>13.8%</td>
<td>21.1%</td>
<td>34.7%</td>
<td>28.6%</td>
<td>12.1%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>16.8 (16.6-17.0)</td>
<td>19.1 (18.8-19.3)</td>
<td>26.8 (26.4-27.2)</td>
<td>30.0 (29.4-30.6)</td>
<td>24.1 (21.4-26.7)</td>
<td>41.3 (25.6-56.9)</td>
<td>21.5 (21.3-21.7)</td>
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<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.0</td>
<td>1.0</td>
<td>1.1</td>
<td>1.0</td>
<td>0.8</td>
<td>0.8</td>
<td>1.0</td>
</tr>
</tbody>
</table>
Orthopaedic fracture discharge destination by AN-SNAP class

Discharge destination - Orthopaedic fractures

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

<table>
<thead>
<tr>
<th>AN-SNAP class</th>
<th>Discharge destination</th>
</tr>
</thead>
<tbody>
<tr>
<td>4AH1 (n=6,246)</td>
<td>Remaining in hospital system: 30%</td>
</tr>
<tr>
<td>4AH2 (n=5,717)</td>
<td>Remaining in hospital system: 35%</td>
</tr>
<tr>
<td>4AH3 (n=3,438)</td>
<td>Remaining in hospital system: 25%</td>
</tr>
<tr>
<td>4AH4 (n=3,345)</td>
<td>Remaining in hospital system: 30%</td>
</tr>
<tr>
<td>4AZ3 (n=449)</td>
<td>Remaining in hospital system: 20%</td>
</tr>
<tr>
<td>4AZ4 (n=22)</td>
<td>Remaining in hospital system: 10%</td>
</tr>
<tr>
<td>All Orthopaedic fractures (n=19,232)</td>
<td>Remaining in hospital system: 25%</td>
</tr>
</tbody>
</table>
Orthopaedic fracture LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score

AN-SNAP class

4AH1 (n=6,246)
4AH2 (n=5,717)
4AH3 (n=3,438)
4AH4 (n=3,345)
4AZ3 (n=449)
4AZ4 (n=22)
Change in outcome measures in orthopaedic fracture, 2015 to 2016

Difference from 2015 data - All Orthopaedic fractures

<table>
<thead>
<tr>
<th></th>
<th>2015</th>
<th>2016</th>
<th>Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>78.3</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>21.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM admission score</td>
<td>80.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>101.9</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>21.0</td>
<td></td>
<td></td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>6.7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>88.2</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

2015 (n = 19,233) 2016 (n = 19,232)

Lower than 2015 data
Higher than 2015 data
Orthopaedic replacement episodes over time

Number of episodes by quarter - Orthopaedic replacements

Year - Quarter

Number of episodes

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Orthopaedic replacement casemix over time
## Orthopaedic replacement episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4A21</th>
<th>4A22</th>
<th>4A23</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Orthopaedic replacements</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>16,673</td>
<td>11,330</td>
<td>1,807</td>
<td>43</td>
<td>6</td>
<td>29,885</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>55.8%</td>
<td>37.9%</td>
<td>6.0%</td>
<td>0.1%</td>
<td>0.0%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>92.6%</td>
<td>81.2%</td>
<td>51.7%</td>
<td>62.8%</td>
<td>50.0%</td>
<td>85.7%</td>
</tr>
<tr>
<td>Public</td>
<td>7.4%</td>
<td>18.8%</td>
<td>48.3%</td>
<td>37.2%</td>
<td>50.0%</td>
<td>14.3%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>60.2%</td>
<td>68.1%</td>
<td>66.1%</td>
<td>69.8%</td>
<td>66.7%</td>
<td>63.6%</td>
</tr>
<tr>
<td>Male</td>
<td>39.8%</td>
<td>31.9%</td>
<td>33.9%</td>
<td>30.2%</td>
<td>33.3%</td>
<td>36.4%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>69.0 (68.9-69.1)</td>
<td>73.7 (73.5-73.9)</td>
<td>77.5 (77.0-77.9)</td>
<td>80.0 (77.9-82.1)</td>
<td>60.3 (57.9-62.7)</td>
<td>71.3 (71.2-71.4)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>106.9 (106.8-106.9)</td>
<td>91.7 (91.6-91.9)</td>
<td>68.1 (67.5-68.6)</td>
<td>28.9 (25.1-32.7)</td>
<td>35.5 (24.7-46.3)</td>
<td>98.9 (98.8-99.1)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>9.9 (9.8-10.0)</td>
<td>12.6 (12.5-12.8)</td>
<td>21.0 (20.4-21.6)</td>
<td>27.8 (21.2-34.3)</td>
<td>34.0 (18.3-49.7)</td>
<td>11.6 (11.5-11.7)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>98.6%</td>
<td>96.8%</td>
<td>87.4%</td>
<td>69.8%</td>
<td>66.7%</td>
<td>97.2%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>1.4%</td>
<td>3.2%</td>
<td>12.6%</td>
<td>30.2%</td>
<td>33.3%</td>
<td>2.8%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>11.4 (11.4-11.5)</td>
<td>21.6 (21.5-21.7)</td>
<td>32.4 (31.8-33.1)</td>
<td>44.3 (33.0-55.7)</td>
<td>44.0 (34.2-53.8)</td>
<td>16.5 (16.4-16.6)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.2</td>
<td>1.7</td>
<td>1.5</td>
<td>1.6</td>
<td>1.3</td>
<td>1.4</td>
</tr>
</tbody>
</table>
Orthopaedic replacement discharge destination by AN-SNAP class

Discharge destination - Orthopaedic replacements

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

<table>
<thead>
<tr>
<th>AN-SNAP class</th>
<th>Percentages</th>
</tr>
</thead>
<tbody>
<tr>
<td>4A21 (n=16,673)</td>
<td>90%</td>
</tr>
<tr>
<td>4A22 (n=11,330)</td>
<td>80%</td>
</tr>
<tr>
<td>4A23 (n=1,807)</td>
<td>70%</td>
</tr>
<tr>
<td>4AZ3 (n=43)</td>
<td>60%</td>
</tr>
<tr>
<td>4AZ4 (n=6)</td>
<td>50%</td>
</tr>
<tr>
<td>All Orthopaedic replacements (n=29,885)</td>
<td>40%</td>
</tr>
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</table>
Orthopaedic replacement LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score AN-SNAP class

Mean LOS Mean FIM improvement

AN-SNAP class

4A21 (n=16,673) 4A22 (n=11,330) 4A23 (n=1,807) 4AZ3 (n=43) 4AZ4 (n=6)
Change in outcome measures in orthopaedic replacement, 2015 to 2016

![Graph showing changes in various outcome measures between 2015 and 2016.](image)

- **Disch to community (%)** 97.1 (Higher than 2015 data)
- **FIM efficiency (per week)** 9.6 (Higher than 2015 data)
- **FIM change (adm to disch)** 15.8 (Higher than 2015 data)
- **FIM discharge score** 115.2 (Higher than 2015 data)
- **FIM admission score** 99.4 (Lower than 2015 data)
- **Length of stay (days)** 11.6 (Lower than 2015 data)
- **Age (years)** 71.3 (Lower than 2015 data)
All orthopaedic episodes over time

Number of episodes by quarter - All orthopaedic conditions

- Ortho fracture
- Ortho replacement
- Soft tissue injury
- Other ortho
- All orthopaedic

Number of episodes by quarter - All orthopaedic conditions

Year - Quarter

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## All orthopaedic episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>Ortho fracture</th>
<th>Ortho replacement</th>
<th>Soft tissue injury</th>
<th>Other ortho</th>
<th>All orthopaedic conditions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>19,232</td>
<td>29,885</td>
<td>1,323</td>
<td>7,915</td>
<td>58,355</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>33.0%</td>
<td>51.2%</td>
<td>2.3%</td>
<td>13.6%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>49.1%</td>
<td>85.7%</td>
<td>61.5%</td>
<td>84.8%</td>
<td>73.0%</td>
</tr>
<tr>
<td>Public</td>
<td>50.9%</td>
<td>14.3%</td>
<td>38.5%</td>
<td>15.2%</td>
<td>27.0%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>70.8%</td>
<td>63.6%</td>
<td>65.7%</td>
<td>63.0%</td>
<td>65.9%</td>
</tr>
<tr>
<td>Male</td>
<td>29.2%</td>
<td>36.4%</td>
<td>34.3%</td>
<td>37.0%</td>
<td>34.1%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>78.3 (78.2-78.5)</td>
<td>71.3 (71.2-71.4)</td>
<td>80.4 (79.8-81.1)</td>
<td>69.1 (68.8-69.4)</td>
<td>73.5 (73.4-73.6)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>81.0 (80.7-81.3)</td>
<td>98.9 (98.8-99.1)</td>
<td>86.1 (85.2-87.1)</td>
<td>96.6 (96.3-97.0)</td>
<td>92.7 (92.6-92.9)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>21.2 (21.0-21.4)</td>
<td>11.6 (11.5-11.7)</td>
<td>14.8 (14.3-15.3)</td>
<td>14.9 (14.6-15.2)</td>
<td>15.1 (15.0-15.2)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>87.9%</td>
<td>97.2%</td>
<td>88.7%</td>
<td>93.6%</td>
<td>93.5%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>12.1%</td>
<td>2.8%</td>
<td>11.3%</td>
<td>6.4%</td>
<td>6.5%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>21.5 (21.3-21.7)</td>
<td>16.5 (16.4-16.6)</td>
<td>17.5 (16.9-18.1)</td>
<td>17.5 (17.2-17.7)</td>
<td>18.2 (18.1-18.3)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.0</td>
<td>1.4</td>
<td>1.2</td>
<td>1.2</td>
<td>1.2</td>
</tr>
</tbody>
</table>
All Orthopaedic episodes discharge destination by orthopaedic group

Discharge destination - All orthopaedic conditions

- Ortho fracture (n=19,232)
- Ortho replacement (n=29,885)
- Soft tissue injury (n=1,323)
- Other ortho (n=7,915)
- All orthopaedic conditions (n=58,355)
All orthopaedic conditions LOS and FIM change by orthopaedic group

LOS and FIM change by AN-SNAP class

<table>
<thead>
<tr>
<th>Orthopaedic group</th>
<th>Mean LOS</th>
<th>Mean FIM improvement</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ortho fracture (n=19,232)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Ortho replacement (n=29,885)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Soft tissue injury (n=1,323)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Other ortho (n=7,915)</td>
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<td></td>
</tr>
</tbody>
</table>

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Change in outcome measures in orthopaedic conditions, 2015 to 2016

<table>
<thead>
<tr>
<th>Outcome Measure</th>
<th>2015</th>
<th>Difference from 2015 data</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>73.6</td>
<td>Lower than 2015 data</td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>15.3</td>
<td>Lower than 2015 data</td>
</tr>
<tr>
<td>FIM admission score</td>
<td>92.9</td>
<td>Lower than 2015 data</td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>110.5</td>
<td>Higher than 2015 data</td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>17.6</td>
<td>Higher than 2015 data</td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>8.1</td>
<td>Lower than 2015 data</td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>93.5</td>
<td>Lower than 2015 data</td>
</tr>
</tbody>
</table>

2015 (n = 56,931)
2016 (n = 58,355)
Pulmonary episodes over time

Number of episodes by quarter - Pulmonary

Year - Quarter

Number of episodes

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Pulmonary casemix over time
## Pulmonary episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4A31</th>
<th>4A32</th>
<th>4A33</th>
<th>4A34</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Pulmonary</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>520</td>
<td>924</td>
<td>435</td>
<td>113</td>
<td>41</td>
<td>6</td>
<td>2,042</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>25.5%</td>
<td>45.2%</td>
<td>21.3%</td>
<td>5.5%</td>
<td>2.0%</td>
<td>0.3%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>65.2%</td>
<td>61.8%</td>
<td>38.9%</td>
<td>32.7%</td>
<td>29.3%</td>
<td>16.7%</td>
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</tr>
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<td>34.8%</td>
<td>38.2%</td>
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<td>67.3%</td>
<td>70.7%</td>
<td>83.3%</td>
<td>44.7%</td>
</tr>
<tr>
<td>Gender (%)</td>
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<td></td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>52.1%</td>
<td>57.6%</td>
<td>50.6%</td>
<td>43.4%</td>
<td>46.3%</td>
<td>0.0%</td>
<td>53.5%</td>
</tr>
<tr>
<td>Male</td>
<td>47.9%</td>
<td>42.4%</td>
<td>49.4%</td>
<td>56.6%</td>
<td>53.7%</td>
<td>100.0%</td>
<td>46.5%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>76.5 (75.5-77.4)</td>
<td>80.4 (79.8-81.1)</td>
<td>81.6 (80.7-82.6)</td>
<td>79.5 (77.4-81.6)</td>
<td>82.8 (80.1-85.6)</td>
<td>51.2 (38.6-63.8)</td>
<td>79.6 (79.1-80.0)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>108.1 (107.6-108.7)</td>
<td>91.5 (91.0-92.0)</td>
<td>71.6 (70.7-72.6)</td>
<td>50.2 (48.2-52.2)</td>
<td>30.3 (27.1-33.6)</td>
<td>33.3 (19.2-47.3)</td>
<td>89.5 (88.6-90.3)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>11.7 (11.1-12.3)</td>
<td>14.8 (13.8-15.8)</td>
<td>18.5 (17.4-19.6)</td>
<td>22.9 (20.0-25.8)</td>
<td>27.7 (19.6-35.7)</td>
<td>21.8 (10.6-32.9)</td>
<td>15.2 (14.6-15.8)</td>
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<tr>
<td>Discharge destination (%)</td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>93.7%</td>
<td>90.0%</td>
<td>81.0%</td>
<td>70.9%</td>
<td>61.1%</td>
<td>66.7%</td>
<td>87.4%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>6.3%</td>
<td>10.0%</td>
<td>19.0%</td>
<td>29.1%</td>
<td>38.9%</td>
<td>33.3%</td>
<td>12.6%</td>
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<tr>
<td>FIM change (Mean+95%CI)</td>
<td>9.8 (9.3-10.3)</td>
<td>17.6 (17.0-18.2)</td>
<td>22.7 (21.4-24.0)</td>
<td>29.0 (24.9-33.1)</td>
<td>21.3 (11.8-30.8)</td>
<td>14.0 (4.8-23.2)</td>
<td>17.0 (16.5-17.5)</td>
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<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.8</td>
<td>1.2</td>
<td>1.2</td>
<td>1.3</td>
<td>0.8</td>
<td>0.6</td>
<td>1.1</td>
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</tbody>
</table>
Pulmonary discharge destination by AN-SNAP class

Discharge destination - Pulmonary

AN-SNAP class

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

Percentage

0% 10% 20% 30% 40% 50% 60% 70% 80% 90% 100%

4A31 (n=520) 4A32 (n=924) 4A33 (n=435) 4A34 (n=113) 4AZ3 (n=41) 4AZ4 (n=6) All Pulmonary (n=2,042)
Pulmonary LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score

AN-SNAP class

Mean LOS

Mean FIM improvement

4A31 (n=520)

4A32 (n=924)

4A33 (n=435)

4A34 (n=113)

4AZ3 (n=41)

4AZ4 (n=6)

AROC State of Nations | 2016 report | Australia
Change in outcome measures in pulmonary, 2015 to 2016

<table>
<thead>
<tr>
<th>Outcome Measure</th>
<th>2015</th>
<th>Difference from 2015 data</th>
<th>2016</th>
<th>Difference from 2015 data</th>
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<tr>
<td>Age (years)</td>
<td>79.5</td>
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<tr>
<td>Length of stay (days)</td>
<td>14.6</td>
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<td></td>
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<tr>
<td>FIM admission score</td>
<td>90.5</td>
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</tr>
<tr>
<td>FIM discharge score</td>
<td>107.0</td>
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<tr>
<td>FIM change (adm to disch)</td>
<td>16.5</td>
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<td></td>
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<tr>
<td>FIM efficiency (per week)</td>
<td>7.9</td>
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</tr>
<tr>
<td>Disch to community (%)</td>
<td>88.4</td>
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</table>

2015 (n = 2,239) 2016 (n = 2,042)
Reconditioning episodes over time
Reconditioning casemix over time
## Reconditioning episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4AR1</th>
<th>4AR2</th>
<th>4AR3</th>
<th>4AR4</th>
<th>4AR5</th>
<th>4AR6</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>9,422</td>
<td>9,617</td>
<td>3,160</td>
<td>1,283</td>
<td>3,823</td>
<td>2,385</td>
<td>553</td>
<td>90</td>
<td>30,368</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>31.0%</td>
<td>31.7%</td>
<td>10.4%</td>
<td>4.2%</td>
<td>12.6%</td>
<td>7.9%</td>
<td>1.8%</td>
<td>0.3%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
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<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>71.9%</td>
<td>66.1%</td>
<td>51.9%</td>
<td>48.2%</td>
<td>40.7%</td>
<td>32.4%</td>
<td>32.4%</td>
<td>15.6%</td>
<td>59.0%</td>
</tr>
<tr>
<td>Public</td>
<td>28.1%</td>
<td>33.9%</td>
<td>48.1%</td>
<td>51.8%</td>
<td>59.3%</td>
<td>67.6%</td>
<td>67.6%</td>
<td>84.4%</td>
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<td>Gender (%)</td>
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<td></td>
</tr>
<tr>
<td>Female</td>
<td>57.3%</td>
<td>60.1%</td>
<td>53.8%</td>
<td>56.4%</td>
<td>52.1%</td>
<td>50.0%</td>
<td>50.8%</td>
<td>53.3%</td>
<td>56.4%</td>
</tr>
<tr>
<td>Male</td>
<td>42.7%</td>
<td>39.9%</td>
<td>46.2%</td>
<td>43.6%</td>
<td>47.9%</td>
<td>49.9%</td>
<td>49.2%</td>
<td>46.7%</td>
<td>43.6%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>76.8 (76.6-77.1)</td>
<td>80.7 (80.5-80.9)</td>
<td>82.2 (81.8-82.5)</td>
<td>77.1 (76.4-77.8)</td>
<td>82.2 (81.9-82.5)</td>
<td>78.2 (77.7-78.7)</td>
<td>83.1 (82.4-83.7)</td>
<td>53.7 (51.7-55.6)</td>
<td>79.4 (79.3-79.6)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>104.5 (104.3-104.6)</td>
<td>89.3 (89.2-89.4)</td>
<td>77.0 (76.8-77.3)</td>
<td>75.9 (75.6-76.2)</td>
<td>64.2 (63.9-64.5)</td>
<td>49.8 (49.4-50.3)</td>
<td>32.4 (31.4-33.3)</td>
<td>35.4 (32.4-38.4)</td>
<td>86.2 (85.9-86.4)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>12.7 (12.5-12.9)</td>
<td>15.9 (15.7-16.2)</td>
<td>18.1 (17.6-18.7)</td>
<td>22.7 (21.8-23.6)</td>
<td>21.2 (20.8-21.6)</td>
<td>27.1 (26.2-28.0)</td>
<td>27.3 (25.6-29.1)</td>
<td>33.0 (25.6-40.4)</td>
<td>16.9 (16.7-17.0)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>92.5%</td>
<td>88.2%</td>
<td>86.1%</td>
<td>79.4%</td>
<td>80.0%</td>
<td>71.6%</td>
<td>62.0%</td>
<td>50.6%</td>
<td>86.0%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>7.5%</td>
<td>11.8%</td>
<td>13.9%</td>
<td>20.6%</td>
<td>20.0%</td>
<td>28.4%</td>
<td>38.0%</td>
<td>49.4%</td>
<td>14.0%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>11.0 (10.8-11.1)</td>
<td>18.3 (18.2-18.5)</td>
<td>18.1 (17.7-18.5)</td>
<td>23.6 (22.8-24.4)</td>
<td>22.6 (22.1-23.1)</td>
<td>24.9 (24.0-25.8)</td>
<td>21.3 (18.9-23.7)</td>
<td>25.3 (18.2-32.5)</td>
<td>17.0 (16.9-17.2)</td>
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<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.9</td>
<td>1.1</td>
<td>1.0</td>
<td>1.0</td>
<td>1.1</td>
<td>0.9</td>
<td>0.8</td>
<td>0.8</td>
<td>1.0</td>
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</tbody>
</table>
Reconditioning discharge destination by AN-SNAP class

Discharge destination - Reconditioning

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

AN-SNAP class

<table>
<thead>
<tr>
<th>AN-SNAP class</th>
<th>(n)</th>
</tr>
</thead>
<tbody>
<tr>
<td>4AR1</td>
<td>9,422</td>
</tr>
<tr>
<td>4AR2</td>
<td>9,617</td>
</tr>
<tr>
<td>4AR3</td>
<td>3,160</td>
</tr>
<tr>
<td>4AR4</td>
<td>1,283</td>
</tr>
<tr>
<td>4AR5</td>
<td>3,823</td>
</tr>
<tr>
<td>4AR6</td>
<td>2,385</td>
</tr>
<tr>
<td>4AZ3</td>
<td>553</td>
</tr>
<tr>
<td>4AZ4</td>
<td>90</td>
</tr>
<tr>
<td>All Reconditioning</td>
<td>30,368</td>
</tr>
</tbody>
</table>
Reconditioning LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score

AN-SNAP class

4AR1 (n=9,422)
4AR2 (n=9,617)
4AR3 (n=3,160)
4AR4 (n=1,283)
4AR5 (n=3,823)
4AR6 (n=2,385)
4AZ3 (n=553)
4AZ4 (n=90)

Mean LOS Mean FIM improvement
Change in outcome measures in reconditioning, 2015 to 2016

Difference from 2015 data - All Reconditioning

2015

-0.8 -0.6 -0.4 -0.2 0 0.2 0.4 0.6 0.8

Age (years) 79.6
Length of stay (days) 17.1
FIM admission score 86.8
FIM discharge score 103.1
FIM change (adm to disch) 16.3
FIM efficiency (per week) 6.7
Disch to community (%) 86.1

Lower than 2015 data

Higher than 2015 data

2015 (n = 29,352)
2016 (n = 30,368)
Other impairment episodes over time

Number of episodes by quarter - Other impairments

- Pain
- Cardiac
- Major Multiple trauma

Year - Quarter
Number of episodes
Other impairments casemix over time
## Other impairment episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>Pain</th>
<th>Cardiac</th>
<th>MMT</th>
<th>Burns</th>
<th>Congenital deformity</th>
<th>Developmental disability</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>4,702</td>
<td>3,519</td>
<td>957</td>
<td>54</td>
<td>18</td>
<td>10</td>
</tr>
<tr>
<td>Proportion of total episodes in 2016</td>
<td>3.9%</td>
<td>2.9%</td>
<td>0.8%</td>
<td>0.0%</td>
<td>0.0%</td>
<td>0.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>72.0%</td>
<td>71.0%</td>
<td>50.9%</td>
<td>14.8%</td>
<td>22.2%</td>
<td>30.0%</td>
</tr>
<tr>
<td>Public</td>
<td>28.0%</td>
<td>29.0%</td>
<td>49.1%</td>
<td>85.2%</td>
<td>77.8%</td>
<td>70.0%</td>
</tr>
<tr>
<td>Gender (%)</td>
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<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>67.8%</td>
<td>48.8%</td>
<td>31.6%</td>
<td>40.7%</td>
<td>55.6%</td>
<td>40.0%</td>
</tr>
<tr>
<td>Male</td>
<td>32.2%</td>
<td>51.2%</td>
<td>68.4%</td>
<td>59.3%</td>
<td>44.4%</td>
<td>60.0%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>71.2 (70.7-71.7)</td>
<td>79.1 (78.7-79.4)</td>
<td>50.2 (48.9-51.6)</td>
<td>54.5 (48.2-60.8)</td>
<td>62.1 (53.6-70.5)</td>
<td>66.3 (53.4-79.2)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>97.1 (96.5-97.6)</td>
<td>93.6 (93.0-94.2)</td>
<td>76.3 (74.7-77.9)</td>
<td>91.1 (85.9-96.3)</td>
<td>80.1 (66.6-93.5)</td>
<td>56.1 (37.4-74.9)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>14.4 (14.1-14.8)</td>
<td>14.0 (13.6-14.4)</td>
<td>39.3 (36.3-42.3)</td>
<td>26.3 (20.3-32.3)</td>
<td>25.8 (16.1-35.6)</td>
<td>15.0 (10.7-19.3)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td>Discharged to community</td>
<td>91.5%</td>
<td>87.5%</td>
<td>85.0%</td>
<td>87.0%</td>
<td>77.8%</td>
<td>70.0%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>8.5%</td>
<td>12.5%</td>
<td>15.0%</td>
<td>13.0%</td>
<td>22.2%</td>
<td>30.0%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>14.2 (13.8-14.5)</td>
<td>17.3 (16.9-17.7)</td>
<td>33.5 (32.0-34.9)</td>
<td>20.0 (15.6-24.5)</td>
<td>16.2 (6.1-26.3)</td>
<td>18.0 (9.7-26.3)</td>
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<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>1.0</td>
<td>1.2</td>
<td>0.9</td>
<td>0.8</td>
<td>0.6</td>
<td>1.2</td>
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</table>
Other impairment discharge destination by impairment group

Discharge destination - Other impairments

<table>
<thead>
<tr>
<th>Impairment</th>
<th>Remaining in hospital system</th>
<th>Unknown residence</th>
<th>Other supported residence</th>
<th>Private residence - ?? Support</th>
<th>Private residence - with support</th>
<th>Private residence - no support</th>
</tr>
</thead>
<tbody>
<tr>
<td>Pain (n=4,702)</td>
<td></td>
<td></td>
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<td></td>
<td></td>
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<tr>
<td>Cardiac (n=3,519)</td>
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</tr>
<tr>
<td>MMT (n=957)</td>
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<td></td>
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<tr>
<td>Burns (n=54)</td>
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<tr>
<td>Congenital deformity (n=18)</td>
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<td></td>
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<tr>
<td>Developmental disability (n=10)</td>
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</tbody>
</table>
Other impairment LOS and FIM change by impairment group

LOS and FIM change by AN-SNAP class

- Pain (n=4,702)
- Cardiac (n=3,519)
- MMT (n=957)
- Burns (n=54)
- Congenital deformity (n=18)
- Developmental disability (n=10)

Mean days/score

Other impairment

Mean LOS

Mean FIM improvement
Change in outcome measures in pain, 2015 to 2016

Difference from 2015 data - Pain

2015

-0.8 -0.6 -0.4 -0.2 0 0.2 0.4 0.6

Age (years) 71.6
Length of stay (days) 14.7
FIM admission score 97.4
FIM discharge score 111.1
FIM change (adm to disch) 13.7
FIM efficiency (per week) 6.5
Disch to community (%) 92.2

Lower than 2015 data
Higher than 2015 data

2015 (n = 4,214)
2016 (n = 4,702)
Change in outcome measures in cardiac, 2015 to 2016

<table>
<thead>
<tr>
<th>Outcome Measure</th>
<th>Difference from 2015 data - Cardiac</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>79.2</td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>13.7</td>
</tr>
<tr>
<td>FIM admission score</td>
<td>-0.8</td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>0.2</td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>-0.4</td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>0.0</td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>0.4</td>
</tr>
</tbody>
</table>

2015 (n = 3,605)
2016 (n = 3,519)

2015 (n = 3,605)
2016 (n = 3,519)
Change in outcome measures in MMT, 2015 to 2016

<table>
<thead>
<tr>
<th>Measure</th>
<th>2015</th>
<th>2016</th>
<th>Difference</th>
</tr>
</thead>
<tbody>
<tr>
<td>Age (years)</td>
<td>50.3</td>
<td></td>
<td>0.3</td>
</tr>
<tr>
<td>Length of stay (days)</td>
<td>41.4</td>
<td></td>
<td>-0.1</td>
</tr>
<tr>
<td>FIM admission score</td>
<td>78.7</td>
<td>78.5</td>
<td>-0.2</td>
</tr>
<tr>
<td>FIM discharge score</td>
<td>110.1</td>
<td>109.8</td>
<td>-0.3</td>
</tr>
<tr>
<td>FIM change (adm to disch)</td>
<td>31.4</td>
<td></td>
<td>0.4</td>
</tr>
<tr>
<td>FIM efficiency (per week)</td>
<td>5.3</td>
<td></td>
<td>0.1</td>
</tr>
<tr>
<td>Disch to community (%)</td>
<td>86.9</td>
<td></td>
<td>0.1</td>
</tr>
</tbody>
</table>

2015 (n = 873)  2016 (n = 957)

Lower than 2015 data

Higher than 2015 data
Other disabling impairment episodes over time
Other disabling impairments casemix over time

Proportion of episodes within year

Year


Proportions:
- 4AZ4
- 4AZ3
- 4A93
- 4A92
- 4A91

Proportion of episodes within year
### Other disabling impairment episodes in 2016

<table>
<thead>
<tr>
<th>AN-SNAP class:</th>
<th>4A91</th>
<th>4A92</th>
<th>4A93</th>
<th>4AZ3</th>
<th>4AZ4</th>
<th>All Other disabling impairments</th>
</tr>
</thead>
<tbody>
<tr>
<td>Number of episodes</td>
<td>428</td>
<td>206</td>
<td>62</td>
<td>23</td>
<td>9</td>
<td>730</td>
</tr>
<tr>
<td>Proportion of episodes</td>
<td>58.6%</td>
<td>28.2%</td>
<td>8.5%</td>
<td>3.2%</td>
<td>1.2%</td>
<td>100.0%</td>
</tr>
<tr>
<td>Sector (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Private</td>
<td>52.6%</td>
<td>28.6%</td>
<td>24.2%</td>
<td>4.3%</td>
<td>11.1%</td>
<td>41.4%</td>
</tr>
<tr>
<td>Public</td>
<td>47.4%</td>
<td>71.4%</td>
<td>75.8%</td>
<td>95.7%</td>
<td>88.9%</td>
<td>58.6%</td>
</tr>
<tr>
<td>Gender (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Female</td>
<td>66.8%</td>
<td>55.3%</td>
<td>51.6%</td>
<td>47.8%</td>
<td>66.7%</td>
<td>61.6%</td>
</tr>
<tr>
<td>Male</td>
<td>33.2%</td>
<td>44.7%</td>
<td>48.4%</td>
<td>52.2%</td>
<td>33.3%</td>
<td>38.4%</td>
</tr>
<tr>
<td>Age (Mean+95%CI)</td>
<td>70.7 (69.0-72.4)</td>
<td>74.2 (72.0-76.5)</td>
<td>70.1 (65.8-74.3)</td>
<td>82.0 (78.1-85.9)</td>
<td>46.7 (35.7-57.7)</td>
<td>71.7 (70.4-72.9)</td>
</tr>
<tr>
<td>Admission FIM (Mean+95%CI)</td>
<td>98.1 (96.9-99.3)</td>
<td>70.9 (69.3-72.4)</td>
<td>51.2 (48.0-54.4)</td>
<td>30.3 (26.6-34.0)</td>
<td>26.2 (19.9-36.5)</td>
<td>85.3 (83.6-87.0)</td>
</tr>
<tr>
<td>LOS (Mean+95%CI)</td>
<td>17.5 (16.3-18.7)</td>
<td>21.1 (19.0-23.2)</td>
<td>35.5 (21.4-49.6)</td>
<td>25.8 (17.0-34.6)</td>
<td>30.8 (17.8-43.8)</td>
<td>20.1 (18.6-21.5)</td>
</tr>
<tr>
<td>Discharge destination (%)</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Discharged to community</td>
<td>92.3%</td>
<td>79.4%</td>
<td>67.2%</td>
<td>59.1%</td>
<td>44.4%</td>
<td>85.0%</td>
</tr>
<tr>
<td>Remaining in hospital system</td>
<td>7.7%</td>
<td>20.6%</td>
<td>32.8%</td>
<td>40.9%</td>
<td>55.6%</td>
<td>15.0%</td>
</tr>
<tr>
<td>FIM change (Mean+95%CI)</td>
<td>13.2 (12.4-14.0)</td>
<td>23.5 (21.6-25.3)</td>
<td>23.7 (18.7-28.7)</td>
<td>11.6 (4.4-18.8)</td>
<td>15.0 (-8.6-38.6)</td>
<td>16.6 (15.7-17.6)</td>
</tr>
<tr>
<td>FIM efficiency (FIM change/LOS)</td>
<td>0.8</td>
<td>1.1</td>
<td>0.7</td>
<td>0.4</td>
<td>0.5</td>
<td>0.8</td>
</tr>
</tbody>
</table>
Other disabling impairment discharge destination by AN-SNAP class

Discharge destination - Other disabling impairments

- Remaining in hospital system
- Unknown residence
- Other supported residence
- Private residence - ?? Support
- Private residence - with support
- Private residence - no support

Percentage

AN-SNAP class

4A91 (n=428)
4A92 (n=206)
4A93 (n=62)
4AZ3 (n=23)
4AZ4 (n=9)
All Other disabling impairments (n=730)
Other disabling impairment LOS and FIM change by AN-SNAP class

LOS and FIM change by AN-SNAP class

Mean days/score

Mean LOS

Mean FIM improvement

AN-SNAP class

4A91 (n=428)

4A92 (n=206)

4A93 (n=62)

4AZ3 (n=23)

4AZ4 (n=9)
Change in outcome measures in other disabling impairments, 2015 to 2016

- Age (years): 73.3
- Length of stay (days): 18.6
- FIM admission score: 86.9
- FIM discharge score: 101.7
- FIM change (adm to disch): 14.8
- FIM efficiency (per week): 5.6
- Disch to community (%): 87.1

Comparison between 2015 (n = 655) and 2016 (n = 730)

Lower than 2015 data

Higher than 2015 data
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