Long-term advantages of **person-centred and integrated elderly care**

Results of a longitudinal study on Embrace

K Wynia, SLW Spoorenberg, RJ Uittenbroek, M Jager, HPH Kremer, SA Reijneveld
Background

Embrace is a population-based, person-centred, and integrated care service for community-living older adults that combines the Chronic Care Model with risk profiles based on a population health management model.

A multidisciplinary Elderly Care Team organizes and evaluates care and support. The intensity depends on the older adult’s risk profile, with frail older adults and those with complex care needs receiving individual support.

Objective

- Long-term outcomes
- Overall and per risk profile

Methods

Study design & participants

- Longitudinal study
- n=1308
- Mean age 80.7 years (SD 4.6)
- Older adults (75+) receiving Embrace care
- Evaluation of change after 12, 24, 36 months compared to baseline

Outcomes

- Patient outcomes
- Quality of care
- Costs

Participants

- Subgroups: 212 complex care needs, 312 frail, 782 robust
- Gender: Male: 589, Female: 719
- Educational level: Higher: 542, Lower: 746
### Results

#### Changes compared to baseline

<table>
<thead>
<tr>
<th></th>
<th>Total group</th>
<th>Complex care needs</th>
<th>Frail *</th>
<th>Robust</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>12</td>
<td>24</td>
<td>36</td>
<td></td>
</tr>
<tr>
<td></td>
<td>12</td>
<td>24</td>
<td>36</td>
<td></td>
</tr>
<tr>
<td></td>
<td>12</td>
<td>24</td>
<td>36</td>
<td></td>
</tr>
<tr>
<td></td>
<td>12</td>
<td>24</td>
<td>36</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Category</th>
<th>Score 1</th>
<th>Score 2</th>
<th>Score 3</th>
<th>Score 4</th>
</tr>
</thead>
<tbody>
<tr>
<td>General health</td>
<td>EQ-5D-3L</td>
<td>EQ-VAS</td>
<td>INTERMED-E-SA</td>
<td></td>
</tr>
<tr>
<td>Fraility</td>
<td>GFI</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ADL / IADL</td>
<td>Katz-15</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Wellbeing</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Quality of life</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Self-management</td>
<td>PIH-OA</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Quality of care</td>
<td>PAIQC</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Costs</td>
<td>Total</td>
<td>Zvw</td>
<td>AWBZ</td>
<td>Wmo</td>
</tr>
</tbody>
</table>

- No change
- Statistically significant, but not clinically relevant deterioration
- Clinically relevant (and statistically significant) deterioration
- Statistically significant, but not clinically relevant improvement
- Clinically relevant (and statistically significant) improvement

* Only part of the frail older adults received individual support as intended in Embrace
Prevalence of those with a problem at baseline (n)

Severity (0-10) of those with a problem at baseline

Sample: older adults who received 24 months of individual support and completed three assessments with the GeriatricC5 (n=51)
Conclusion

- Long-term outcomes of Embrace are beneficial, particularly for older adults with complex care needs.
- It seems that Embrace has halted the declining trends in general health and well-being associated with ageing, as well as the related costs increase.
- Implementation of Embrace among frail older adults needs attention and can be improved.
Look back Embrace-related presentations

264 Goal planning person-centred care supports older adults to attain their health-related goals

405 Improving self-management of health through an eHealth application: an action-based study among older adults living in the community

457 Development of the GeriatrICS, an ICF-based and person-centred assessment tool for the evaluation of health related problems in community living older adults

458 Results of a cross sectional study on health-related problems of community-living older adults using the GeriatrICS, an ICF-based assessment tool