

HITH in Residential Care

A research study

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Systematic reviews

Role of HITH

MJA 2012; 197: 512-9.

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A meta-analysis of “hospital in the home”

“H”ospital in the home” (HITH) provides acute or subacute treatment in a patient’s residence for a condition that would normally require admission to hospital.¹ It is also known as “hospital at home”, “home hospitalisation” and “early supported discharge”,²⁻⁶ and it has been speculated that HITH improves outcomes. The key is substituting for in-hospital care. HITH includes admission avoidance (ie, full substitution for hospitalisation) and early discharge followed by care at home (ie, shortened hospitalisation).^{7,8}

Most HITH services are nurse based, but they may include

Abstract

Objective: To assess the effect of “hospital in the home” (HITH) services that significantly substitute for in-hospital time on mortality, readmission rates, patient and carer satisfaction, and costs.

Data sources: MEDLINE, Embase, Social Sciences Citation Index, CINAHL, EconLit, PsycINFO and the Cochrane Database of Systematic Reviews, from the earliest date in each database to 1 February 2012.

Study selection: Randomised controlled trials (RCTs) comparing HITH care with in-hospital treatment for patients aged > 16 years.

- Hospital in the Home provides care that is
 - Safer: decreased mortality by 19%
 - Safer: readmissions decreased by 25%
 - Preferred by patients in 21/22 studies
 - Preferred by carers in 6/8 studies
 - More cost effective: on average 26.5% better
 - Able to treat a wide range of patients

Are there any particular groups especially suited to HITH?

- People who don't like hospital?
- People who want to keep working while they are treated?
- People that are more susceptible to hospital-related adverse events
 - Immunocompromised
 - Older patients
 - Nursing Home residents

Nursing Home residents



- 283,000 subsidised residential aged care beds in Australia
- The Conversation: 20 Dec 2017: **“Australia’s aged care residents are very sick, yet the government doesn’t prioritise medical care”**
- High rates of admission to hospital
- High rates of adverse events in hospital: falls; pressure sores; secondary infections; death

The New York Times
July 19, 2003. p.B1

**Hospital is a place where NH residents
receive futile, but gruelling procedures**

the effects of brutal hospitalization on NH residents

Hastings Center Report
2002; 32: 46-48

But does HITH actually work for NH residents?

- None of the RCTs in meta-analysis were specifically for NH residents
- Difficulty accessing complex investigations in NH
- Impossible to get consults
- What if need for surgery?
- Can they get blood transfusions?
- Lack of RNs in NH
- Families demanding hospitalisation
- GP wants patient hospitalised

So...

- Study commenced to find out how HITH treatment works for NH residents in real life
- Does it work?
- Does it cure the problem?
- Are families/NH staff/GPs satisfied?
- Is it better for patients?
- Multi-centre observational study: POWH, APAC, Port Mac, MACS,
- Authorised by MOH

Baseline

| Characteristics | |
|--------------------------------|------------|
| Age | 86.0 years |
| Sex (% Female:Male) | 59:41 |
| Hospital admissions last 12/12 | 1.9 |
| Dementia | 48% |
| MMSE | 16.8/30 |
| Charlson Comorbidity Index | 7.2 |
| Independent mobility (no aids) | 7.5% |
| Continent | 42% |
| Physical restraints | 0% |
| Fallen in last 12/12 | 29% |

Baseline 2

| Characteristic | |
|-----------------------|--|
| Advance Care Plan | 42% |
| On Psychotropics | 20% |
| Number of medications | 11.6 |
| Mobility | Independent 8% With frame/stick 62% Immobile 27% Other 3% |

HITH Treatment

| | |
|--|--|
| Site of initial HITH team assessment | 33% in RACF 41% in ED 22% on hospital ward |
| Average Length of Stay | 6.6 days |
| Primary diagnosis (Reason for admission): | |
| Infection | 96% |
| Cellulitis | 37% |
| Outcome: Cured | 79% |
| Admitted to hospital | 8% |
| Switched to palliative | 4% |
| Died | 4% |
| Other | 4% |

Carer Survey

Likert Scale: 1. V dissatisfied to 5. V satisfied

| | |
|---|-----|
| Thinking about the treatment your relative /friend received in HITH, overall were you | 4.5 |
| Comparing the treatment in HITH with their most recent hospitalisation, were you | 4.4 |
| Thinking about the level of communication with HITH staff, were you | 4.2 |
| On a scale of 1-10 how satisfied were you | 8.9 |
| Prefer treatment in hospital > HITH | 10% |

Residential Aged Care Facility Staff

| Likert Scale: 1. V dissatisfied to 5. V satisfied | |
|--|-----|
| Thinking about the treatment your resident received from the HITH team, overall were you | 4.5 |
| Comparing the treatment in HITH with the treatment this or other residents received during recent hospitalisations, were you | 4.4 |
| Thinking about the level of communication with HITH staff, were you | 4.3 |
| On a scale of 1-10 how likely are you to refer other residents to HITH? | 8.3 |
| Prefer treatment in hospital > HITH | 20% |

GP Survey

Likert Scale: 1. V dissatisfied to 5. V satisfied

| | |
|--|-----|
| Thinking about the treatment your patient received in HITH, overall were you | 4.4 |
| Comparing the treatment in HITH with their most recent hospitalisation, were you | 4.2 |
| Thinking about the level of communication with HITH staff, were you | 4.1 |
| On a scale of 1-10 how likely are you to refer other residents to HITH? | 8.3 |
| Prefer treatment in hospital > HITH | 6% |

Net Promoter Score

- "How likely is it that you would recommend us to a friend or colleague?" and then provide a rating from 0 ("Not at all likely") to 10 ("Extremely likely").
- The Net Promoter Score is calculated by subtracting the percentage of customers who are Detractors (0-6) from the percentage of customers who are Promoters (9-10).
- Apple is said to have the highest Net Promoter Score in the world of 76
- HITH Net Promoter Score with
- carers = 64%; RACF staff 38%; GPs 29%

So, what can you do?

- We are looking for more HITH services to join in this study to give us a broader, more representative sample, and to do subgroup analyses
- Requirements: Treat any patients in NHs
- Minimal data collection
- Wonderful training and support
- Please contact:

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