THE UNIVERSITY OF MELBOURNE

Medication risks at the transition of care: Hospital to the Community

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Medication errors at hospital to community transition

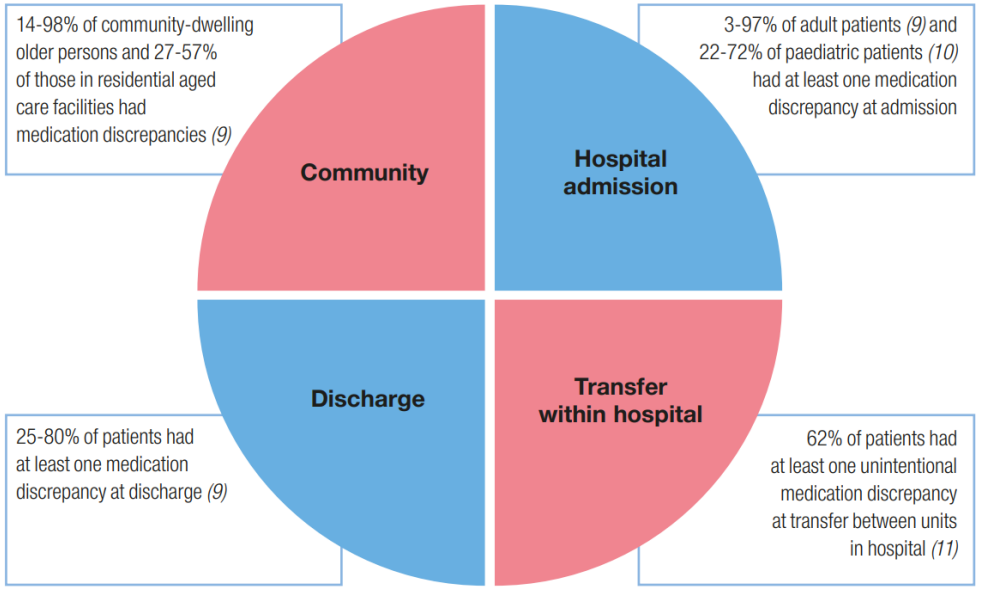


Fig 1. Medication errors at different points in the transition of care[1]

Ref: Medication Safety in Transitions of Care. Geneva: WHO 2019.

A systematic review of 54 quantitative studies across 26 countries that reported medication errors, unintentional medication discrepancies, and/or adverse drug events following discharge from hospital to the community found:

- 53% [IQR 33–60.5] of adult/elderly patients were affected by ≥1 medication errors (data derived from 5 studies).
- 50% [IQR 39–76] were affected by ≥1 unintentional medication discrepancies (data derived from 11 studies).
- 19% [IQR 16–24] were affected by ≥1 adverse drug event (data derived from 7 studies).
- Medication classes most implicated in post-discharge harm were cardiovascular, analgesic, antibiotic, and antidiabetic medications.

Ref: Alqenae, Steinke & Keers. Drug Safety 2020; 43:517–537

Errors & Omissions in Discharge Summaries

An evaluation of medication-related information on summaries of 1,454 patients discharged from hospital to primary care across four National Health Service regions in England found:

- New medicines: Only 49% (1550/3164) had a reason documented on the discharge summary for why the medicine was being commenced.
- Dose changes: Only 39% (186/477) had reason documented on the discharge summary for the change.
- Stopped medicines: Only 57% (420/738) had a reason documented on the discharge summary for why the medicine was being stopped.
- 89% of the discharge summaries were electronic and reached the GP on the same day
- Changes were not acted on within 7 days of the GP receiving the discharge information for 12.5% of patients.

Ref: Shah C, Hough J, Jani Y. Eur J Hosp Pharm 2020;27:129–134.

The accuracy, completeness and timeliness of discharge medication information and implementing medication reconciliation A cross-sectional survey of general practitioners

Table 2. General practitioners' perceptions: Categories and subcategories

Category	Subcategory
Completeness and accuracy of hospital discharge medication information	Delays in receiving discharge summary Accurate medication information Lacking details about medication changes
Implementing medication reconciliation	Relying on the discharge summary Performing medication reconciliation with the patient present

Latimer S., et al AJGP pp854-8 VOL. 49, NO. 12, DECEMBER 2020

Drivers of poor communication at the interface

"Discharge summaries, frequently the sole source of handover between hospital and primary care teams, are usually written by doctors qualified <2years and moving between teams and even hospitals as frequently as every 4 months, perpetuating unfamiliarity with systems and processes, and increasing risk of miscommunication, errors, and compromises in patient safety".

"Fragmentation of care perpetuated by the number of services available to patients today in community settings…makes it difficult for GPs to follow developments in their patients' clinical histories, limiting their ability to anticipate and mitigate any adverse events or changes in their clinical conditions while in the community".

"Such challenges in hospital and community settings make patients today even more vulnerable to harm during the critical transition between hospital and primary care".

Ref: Markiewicz et al., Br J Gen Pract 2019; e9-e19

Primary Care Reform: Opportunity and Risks

The government's move toward multidisciplinary models of primary care with everyone working to the top of their scope of practice is necessary for a sustainable primary healthcare system in Australia.

However, how multidisciplinary models of primary care work in practice needs to be considered carefully so they don't inadvertently increase medication errors at the transition of care.

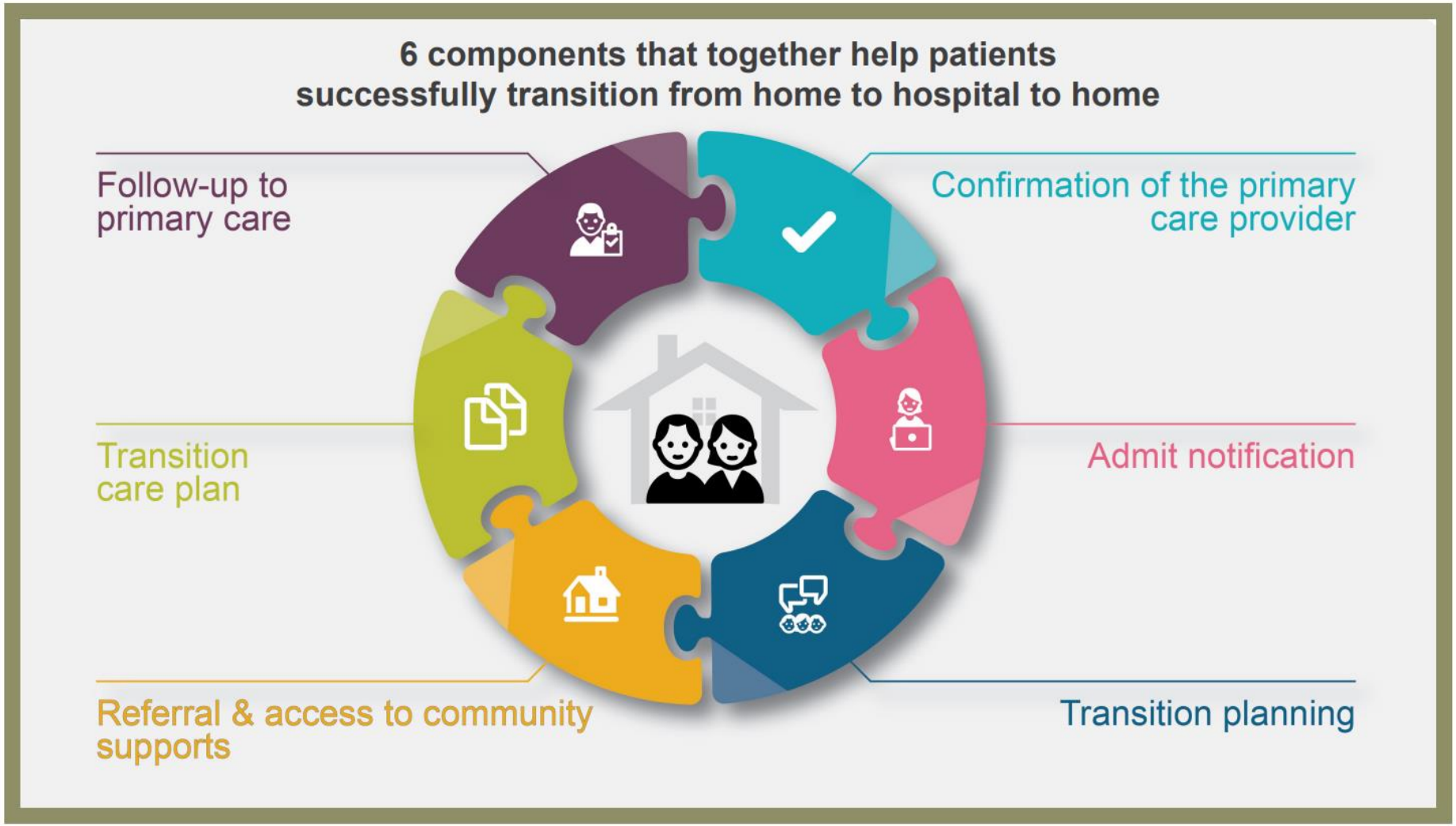
"*The general practitioner, because of their clinical expertise, holistic relationship with a person and broad remit, can be a central custodian of, and conduit for, key patient clinical information. They are also in a good position to guide and monitor the safety and quality of a person's care. For some people this role may be supported by other types of clinicians that they have a strong relationship and regular interaction with, such as a nurse practitioner, an Aboriginal Health Worker or a midwife*". (Australian Commission on Safety and Quality in Healthcare)

The GP experience

'I recently saw a patient post TAVI (Transcatheter Aortic Valve Implantation), I did receive a discharge summary, and I recalled her to see me for review. Reception had to be persistent, she was not in a hurry to come in and see me. When I did see her one-month post discharge, she had stopped her long-standing thyroid hormone replacement because she thought her new medications replaced her levothyroxine. She had also stopped her new medications because she thought they were only for one-week post-discharge. She was hypothyroid and hypertensive. Fortunately, I had received a discharge summary, and I recalled her, and my reception staff were persistent in their efforts to get her to come and see me. It is such a good reminder that some of our patients are very vulnerable to making their own medication errors, particularly at times of ill health and change, many patients need support, guidance and oversight. It is our job in primary care to 'catch them' and make sure everything is correct'.

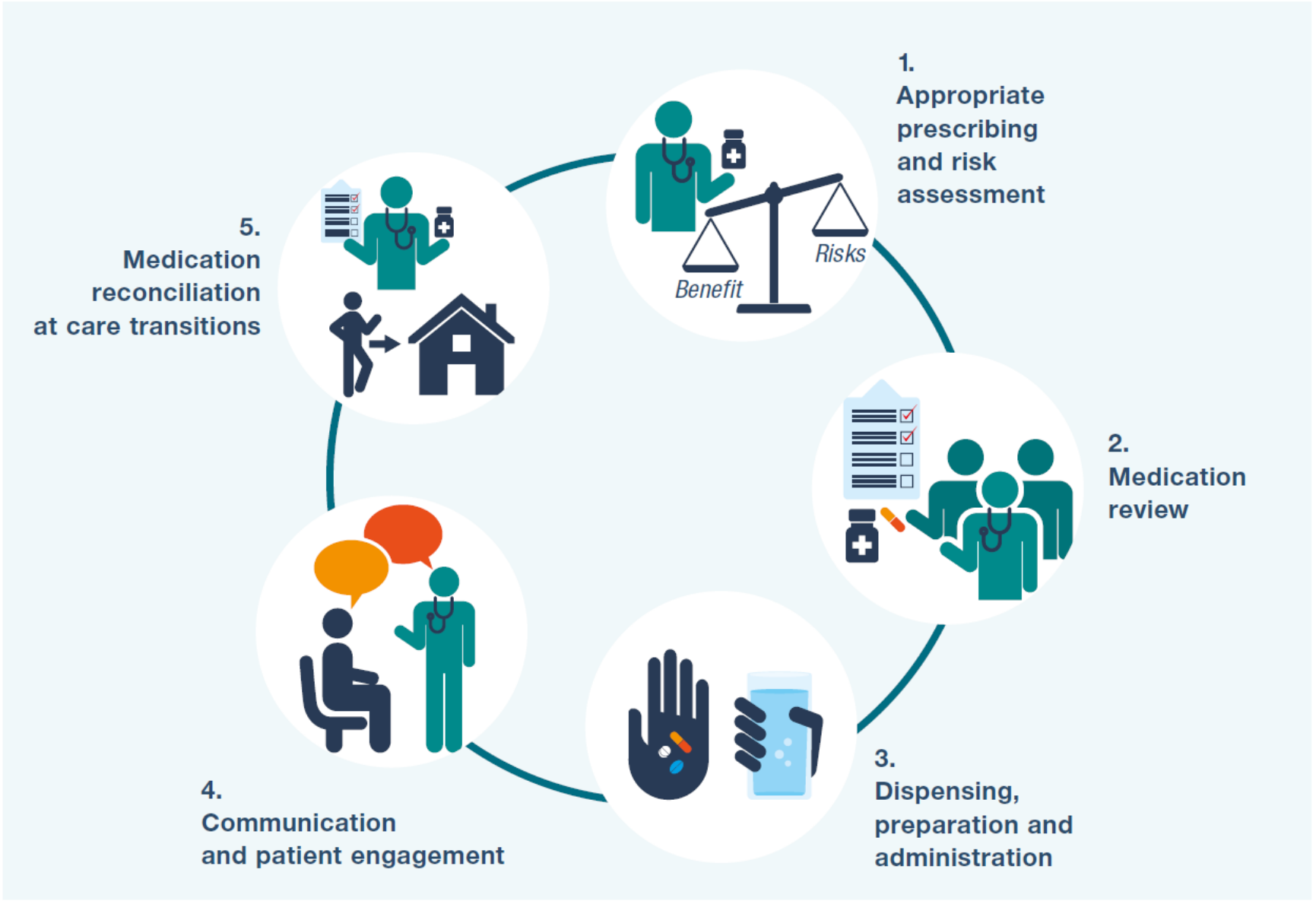
'It is the patients who do not have a GP and who do not make the appointment with their GP who are most at risk of medication errors at transition of care'.

Home to Hospital to Home Transitions Guideline



https://www.albertahealthservices.ca/assets/info/hp/phc/if-hp-phc-phcin-hthth-guideline.pdf

Figure 1. Key steps for ensuring medication safety



Ref: Medication Safety in Transitions of Care. Geneva: WHO 2019.

- Cross-sectional survey of 7,183 GPs across 34 countries.
- Higher rates of communication between GPs and specialists in countries where GPs play a gatekeeper role.
- More informal interactions between GPs and specialists (e.g., telephone calls to ask for advice) was associated with higher frequencies of both referral letters and feedback communications.
- Just over 60% of Australian respondents reported ‘Almost Always’ receiving feedback communication from specialists.

Ref: Scaioli et al. BMC Family Practice (2020) 21:54

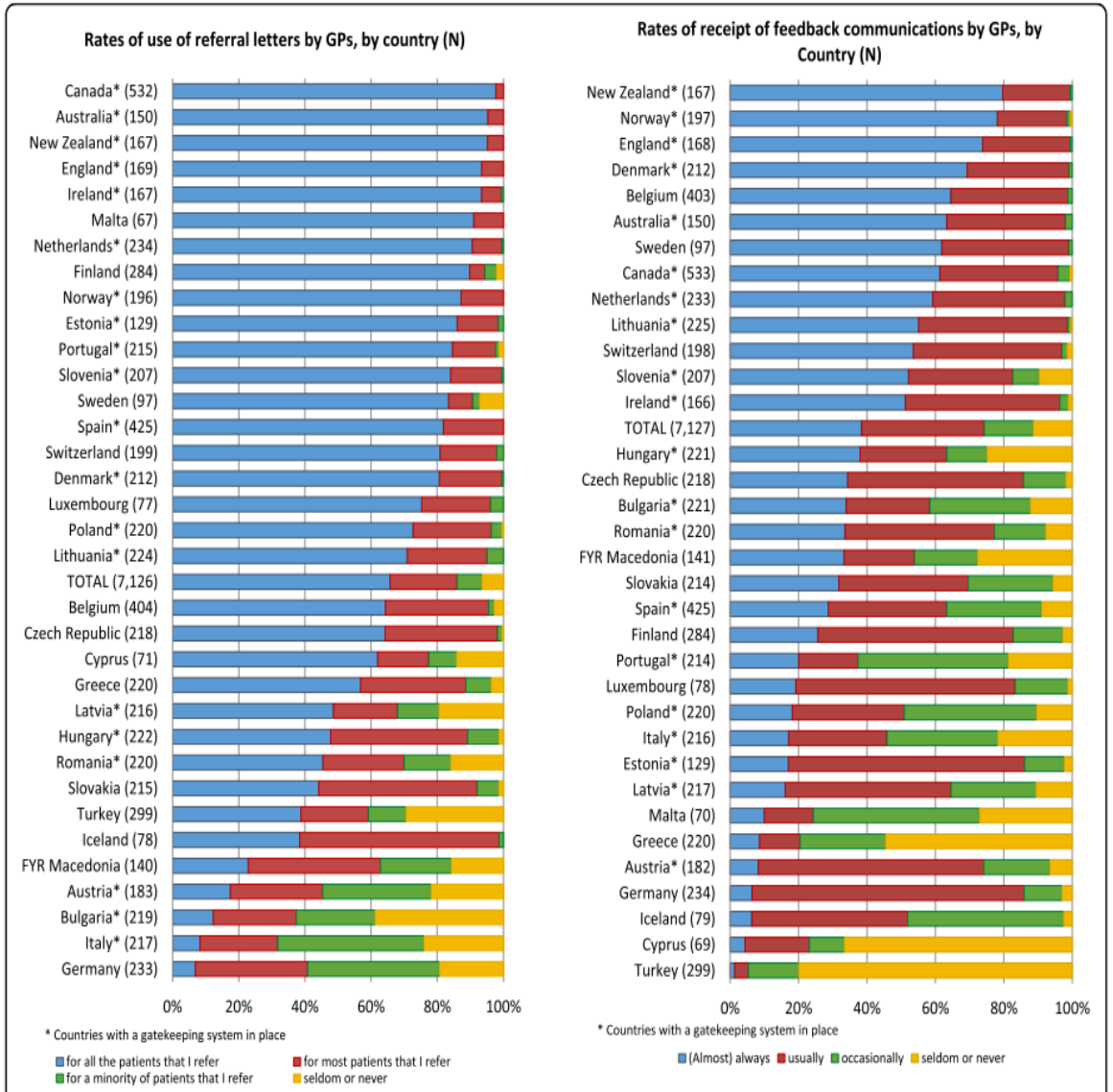


Fig. 2 Rates of use of referral letters by GPs when referring a patient to a medical specialist, and of receipt of feedback communication by GPs after the referral, by country