

'Evaluation of the Nurse Practitioner Diabetes Fast Track Clinic at Dandenong Hospital; a Quantitative Retrospective Audit'

L. Marom¹, J. Wong^{1,2}

¹ Department of Diabetes and Vascular Medicine, Dandenong Hospital, Monash Health, Melbourne, VIC, Australia
² Monash Centre for Health Research and Implementation, Monash University, Melbourne, VIC, Australia



Introduction

At Monash Health the role of the Nurse Practitioner (NP) was introduced in 2004 as an innovative dimension to health care. Currently there are eleven NPs and two NP Candidates working in seven different specialty areas of emergency, nephrology, mental health, adult oncology, paediatric oncology, neonatal and chronic diseases including diabetes [1].

A Governance framework for NPs and Candidates within Monash Health acute setting is structured so that Professional accountability is to the Nursing and Midwifery Executive Leadership Team (NMELT) and Clinical accountability is to the Medical lead of the specialty area. The NP works in alignment with both organisational and unit goals and priorities.

Organisational goals and priorities are:

1. We put patients first
2. We drive innovation
3. We partner strategically for outstanding outcomes
4. We lead sustainable healthcare [1]

The first NP led Diabetes Fast Track Clinic was established during the candidature of the NP Diabetes in response to increasing numbers of patients with diabetes attending Dandenong Hospital and specifically the Emergency Department, many requiring a hospital admission. Following endorsement in 2011, the NP Diabetes has continued to provide this service for at risk adult patients with Type 1 or Type 2 diabetes.



Aims

The aim of the service is to ensure prompt follow-up post discharge from hospital by providing timely management, advanced care planning and transition into appropriate community services for ongoing care [2].

Clinical impact of the FTC was assessed by focusing on:

- Improvements in glycaemic control
- Effectiveness in reaching target clientele in a timely manner
- Ensuring alignment of the NP role with key unit and organisational goals and priorities

Methods

A retrospective audit of medical records was conducted for all patients scheduled to attend the Diabetes Fast Track Clinic from 1 November 2013 to 31 May 2014.

An audit tool was designed and patient clinical and descriptive information from case notes was collated into an excel spreadsheet for analysis.

All patient information was then de-identified.

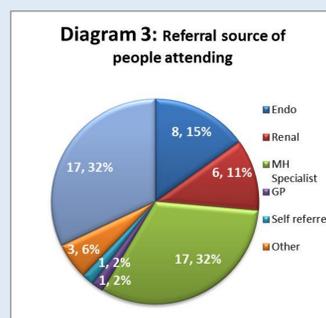
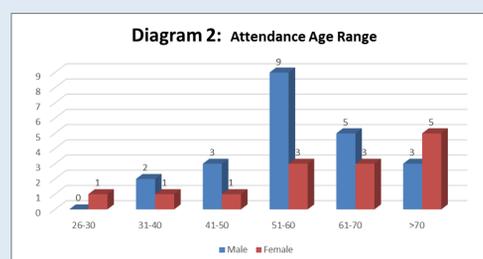
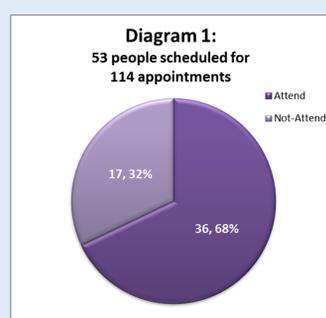
Data collection included:

- Patient ID, age and gender
- Date of referral
- Source of referral
- Date of FTC appointment
- Reason for referral
- Attendance or non-attendance to clinic appointment
- Reason for non-attendance if available
- Number of visits to FTC prior to discharge
- Discharge back to General Practitioner (GP), another clinic or Specialist service
- HbA1c at time of first attendance
- HbA1c upon discharge

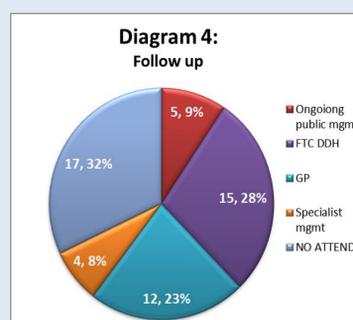
Quantitative statistics were generated from the number of patients seen and clinical and descriptive characteristics analysed.

Results

- Of the 53 people and 114 patient appointments scheduled for FTC, 36 people (68%) attended and 17 people (32%) did not attend. Most people attending were aged ≥ 51years (Diagrams 1 and 2)
- Glycaemic control, as determined by HbA1c showed improvement in most cases. For people where both pre and post FTC HbA1c were available, 17 people showed improvement by an average reduction in their HbA1c of 1.9% while 5 people deteriorated by an average increase in their HbA1c of 1.4%
- There was considerable lag time between discharge from hospital and first FTC appointment. The average time to first clinic attendance was 61 days. Only 6 patients attended their first clinic within 21 days of referral
- Referrals were mostly from Monash Health specialists and patients were seen on an average of three visits (Diagram 3)



- For patients who did not attend any clinic appointment (32%), a letter was sent to their GP to advise them of this. The GP was also made aware that patients may be referred again in the future if they have a clinical need and agree to attend
- The majority (23%) of patients attending FTC were discharged back to their GP for ongoing community management
- A small proportion (17%) of more complex patients were referred to specialist care that could be private or public and 9% were referred for ongoing public management
- At the time of the audit 28% of patients remained in the FTC service (Diagram 4)



Discussion

It is essential for all NPs to evaluate, improve and promote their own practice through research and audit of their work. This provides an avenue to improve the patient experience, to assess clinical outcomes and to make changes to processes within the public health system that will benefit the patient and the organisation.

There were a large number of non-attendances and delays to FTC and reasons for this may have been due to:

- Delay in being seen from time of referral being received. Some clinic appointments were booked prior to NP annual leave resulting in an extra 4 weeks delay
- Inability to attend appointment due to another hospital admission, illness or conflicting appointments
- Inability of family member to bring patient to appointment
- Distance to travel to clinic
- Some patients prefer GP follow up

The FTC audit was conducted at a time of considerable change and growth within the Diabetes Unit, with changes to reception staff that may have had a further impact on patient time to clinic.

FTC provided care for the patient population which it was targeted at, those who had recently been discharged from the hospital and the majority of patients were discharged back to their GPs for ongoing management.

Recommendations

Strategies that could improve FTC attendance include ensuring:

- Patients are scheduled for FTC appointments in a more timely manner
- Documented patient agreement for follow up is noted prior to clinicians referring patients to clinic
- For those who do not attend a scheduled clinic appointment, a reason for non-attendance must be documented
- Improved communication with patients and carers regarding appointments with access issues such as transport addressed
- Referral pathway kept up-to-date and promoted more effectively
- Patient satisfaction survey in future audits

Conclusion

- The audit has shown a benefit to this patient population and has highlighted areas that can be improved to ensure an effective and efficient service model
- Closing the gap to timely follow-up remains a priority consideration
- The NP Diabetes works in alignment with both unit and organisational goals by delivering a sustainable, patient centred service that is continuing to improve over time

References

- Monash Health internet
1. Nurse Practitioner – Monash Health retrieved August 2, 2015 from www.monashhealth.org/page/Nurse_Practitioner
 2. Diabetes – Monash Health retrieved August 2, 2015 from www.monashhealth.org/page/Diabetes
 3. Strategic Plan – Monash Health 2013-18 retrieved August 8, 2015 from www.monashhealth.org/page/Strategic_Plan

Acknowledgements

- Dr. Jennifer Wong for her ongoing mentorship and guidance
- The multi-disciplinary team members with whom I work
- The patients for whom we care