CASE CONFERENCES AND CARE PLANS: COLLABORATION BETWEEN COMMUNITY PHARMACISTS AND GPs

EXECUTIVE SUMMARY AND RECOMMENDATIONS

Introduction
Care plans and case conferences are relatively new primary health care services designed to improve health outcomes for patients with complex chronic care needs. Under the Commonwealth Government's Enhanced Primary Care (EPC) programme General Practitioners (GPs) are remunerated for their involvement in these important services. The EPC programme stipulates that these services must involve at least two other health care professionals, only one of whom may be another medical doctor. It seems logical, therfore, that pharmacists could be ideal primary health care participants in case conferences and care plans, because of their expertise in medication management.

Interestingly, whilst the uptake of care plans has increased rapidly (with 155,486 claimed in 2001) the uptake of case conferences has been slow (11,095 claimed for the same period) (Mitchell et al, 2002). The idea for this project was to evaluate the contribution pharmacists can make through participation in post-HMR case conferences.

This report contains an analysis of case conference meetings and HMRs undertaken by community pharmacists and GPs in Sydney. This analysis is contextualised through a discussion of interprofessional communication (Chapter One); a narrative literature review of adult mental disorder in primary care (Chapter Two); a discussion on community pharmacists as contributors to primary mental health care (Chapter Three); a quantitative analysis comparing case conferencing post-Home Medicines Review (HMR) with standard (fax-back/written report) HMR (Chapter Five); and a qualitative analysis of actual case conference meetings between community pharmacists and GPs (Chapter Six).

Since the introduction of HMRs in Australia in 2001, little research has been undertaken on their benefits for specialised patient groups, such as mental health patients. There is a lack of research on how to best deliver HMR services for specialised, specific patient groups. Furthermore, a detailed understanding of the necessary strategies and incentives for the uptake of HMR referrals by GPs for specialised patient groups, participant outcomes for specialised groups, including satisfaction of patients and practitioners is not known. This study is the first study in Australia to focus specifically upon case conferencing in relation to HMRs and the first to attempt to apply HMRs to mental health care. The overall research question for this study was to determine if case conferencing between GPs and Community Pharmacists about a Home Medicines Review enhance outcomes for patients and the participating health practitioners when compared to a standard (eg fax-back or written) Home Medicines Review?

Few or no data are available in Australia on what collaborative activities pharmacists undertake with other health care practitioners (public and private psychiatrists, GPs, nurses, case managers) for patients with mental disorders. That is, the extent of sharing of complex information regarding the multi-modal management of consumers with mental disorders is not known. Therefore a secondary aim of this study was to explore and provide a basis for the increased role of community pharmacists in the management of consumers with mental disorders.

This report is intended to be read by pharmacy, general practice and mental health policy, clinical, research and consumer stakeholders.

Methods

A prospective cluster randomised comparative two group intervention study was utilised. This design was used so that key project question could be tested, that is whether face-to-face case conferencing between GPs and Community Pharmacists about a Home Medicines Review enhance outcomes for patients and the participating health practitioners when compared to a standard (eg fax-back or written) Home Medicines Review. The original study design was a prospective cluster randomised comparative three group intervention study, where group three was a prospective control. Due to data capture difficulties associated with the control group (arm three), it was not possible to collect any (meaningful) control data and so the focus of data collection was for the two comparative arms of the trial (Arms 1 and 2).

The intervention in Arm 1 comprised HMR followed by a face-to-face case conference meeting between the pharmacist and GP. The intervention in Arm 2 involved HMR followed by "usual" means of communication about the HMR report (eg written or fax-back) beween the pharmacist and GP. Pharmacists and GPs from four metropolitan Divisions of General Practice in Sydney were recruited to this study.

Originally, the intervention involved pairs of GPs and Pharmacists delivering Home Medicines Reviews (HMRs) to 5 patients with an ICD10-defined mental disorders. However due to the considerable delays in the recruitment of patients with an ICD10-defined mental disorder, and in order to answer the principal research question concerning case conferencing benefits post-HMR, relaxation of the entry criteria to include patients with any illness was sought from and approved by the Funding Body (Interim Report September 2003).

The key data collected and presented in this report are:

1. HMR data for Arms 1 and 2 – quantitative analysis
    a. Number of participants (GPs, pharmacists, patients)
    b. Number of findings and recommendations per HMR
    c. Acceptance rate of HMR recommendations
    d. Action rate of HMR recommendations
2. Case conference data for Arm 1
    a. Number of case conferences
    b. Duration of case conferences
    c. Thematic analyses of case conferences
3. Mental health literacy data for pharmacists

Results and Discussion

A total of 89 HMRs were conducted for 89 consumers (n=44 consumers in Arm 1 and n=45 in Arm 2). The mean age for participants in each of the groups was 66 years and 74 years respectively. A total of 866 medications were being taken by these consumers (mean=9.7 per patient). In addition to psychotropic medications which accounted for 15.1% of all medications (131/866), other commonly used medications were for cardiovascular conditions (24.3%), gastrointestinal (9.4%) and analgesic medications (8.9%).

A mean of 1.73 mental health diagnoses were made for each patient recruited to Arm 1 and 1.47 for Arm 2. The most frequent mental illnesses in both groups were depression, sleep disorder and anxiety. Other diagnoses included manic depression/bipolar disorder, post-traumatic stress disorder and schizophrenia.
The most frequent physical comorbidities were hypertension, hypercholesterolaemia and hyperlipidaemia, osteoarthritis, osteoporosis, ischaemic heart disease, type two diabetes and asthma/chronic airways limitation. The pattern of physical comorbidities was strikingly similar in both groups.

A total of 601 HMR findings (potential problems) were documented by pharmacists in the 89 HMR reports. The overall mean number of findings (identification of potential problem) documented per HMR was 6.8. The mean number of findings per HMR in Group Arm 1 was 7.7. This compares to a mean of 5.8 in Arm 2.

A total of 521 HMR recommendations (potential solutions) were documented by pharmacists in the 89 HMRs. The overall mean number of recommendations documented per HMR was 5.9. The mean number of recommendations per HMR in Arm 1 was 7.0. This compares to a mean of 4.7 in Arm 2.

In Arm 1, there was a high rate (92%; 252 of 274 recommendations) of GP acceptance of pharmacists HMR recommendations following the face-to-face case conferences meetings. Few recommendations were rejected by GPs. It was hypothesized that this was due to the opportunity for face-to-face interprofessional discussion between the GP and pharmacist. This discussion allowed for dialogue about a broad range of clinical issues documented in the HMR report. Specifically there was dialogue about the rationale and evidence behind specific findings and recommendations. In interpreting this data it is important to recognise that the high acceptance rate does not necessarily reflect a high action rate by GPs. It is likely, however that a high action rate would follow a high rate of acceptance of HMR recommendations. The rates of acceptance are comparable with acceptance rates reported in other mental health medication review projects involving case conferences. For example, in a study of pharmacist recommendations made in case conferences in a community mental health team in the United Kingdom, 91% of recommendations were accepted and actioned, and just 3.5% rejected (Kettle et al, 1996). Based on other Australian data, where the action rate of pharmacist recommendations was 42% (Gilbert et al., 2002), the action rate for group one was estimated to be 106 of 274 recommendations (38%).

In Arm 2, a Medication Management Plan (MMP) was returned to the community pharmacy in only 11 of the 45 HMR cases (24%), although this is required by the HIC. A total of 60 recommendations were documented in these HMRs. The documented action rate (per MMP) was a little less than one in five recommendations (18%; 11 of 60 recommendations). This is lower than the rate of action for group one, estimated to be 38% (109 of 274 of recommendations).

It is noteworthy that the estimated action rate for Arm 1(where a case conference meeting was conducted in all cases post-HMR) was approximately double the action rate for Arm 2 (18%). This suggests that the impact of the pharmacist on HMR, as measured by uptake and implementaion of HMR recommendations is greater if a case conference meeting occurred post-HMR. Overall, this means that the overall estimated implementation rate for pharmacist HMR recommendations was 35.9% (120 of 334).

Analysis of case conference meetings demonstrated a number of important findings such as the notion of joint decision making, discussion about general therapeutic areas not directly related to the HMR report, and discussion about specific medication issues not included in the HMR report.

Post-HMR case conference enable pharmacists to “add value” to the HMR report through explaining “the thinking” behind their recommendations and also provides an opportunity for pharmacists to receive direct feedback on their HMRs. Similarly GPs have the opportunity to explain to pharmacists the rationale for their prescribing and provide further relevant clinical information about the patient. Case conference meetings therefore provide an opportunity for dialogue between pharmacists and GPs about complex therapeutic issues, potentially resulting in a true inter-disciplinary approach to medication management. The rapport building from case conferencing is central to the sustainability of the HMR programme, as it allows both health professionals to learn more from each other and about each other.

Conclusion and Recommendations

1. A successful Home Medicines Review (HMR) programme requires excellent inter-disciplinary rapport between pharmacists and GPs. A case conference meeting post-HMR provides an ideal opportunity for pharmacists and GPs, who ordinarily work with each other, to identify and discuss “complex” care needs for patients with chronic diseases. It is recommended that post-HMR case conference meetings be given a higher priority by both pharmacists and GPs when conducting HMRs, especially in the initial stages of interprofessional rapport building.

2. Although case conference meetings have been described as a part of the “normal”HMR process, they are not mandatory and in practice they are generally not undertaken. This is evidenced through the HMRs conducted in the Arm 2 of this trial, in which no HMRs involved a case conference. It is recommended that direct effort in establishing case conference meetings as a standard part of HMR practice should be undertaken from both the medical and pharmacy perspectives.

3. This research has focussed on an evaluation of the value of conducting case conferences post-HMR. It is recommended that pharmacists be adequately remunerated for participation in case conference meetings under EPC. This will enhance a multi-disciplinary approach to primary health care.

4. This research has demonstrated that the HMR programme remains a relatively new and relatively poorly understood intervention for general practice and for patients, and mental health services in the study locations. It is strongly recommended that public health campaigns designed to raise the awarness of and the value of HMRs be undertaken.

5. One challenge in undertaking practice-based research involving pharmacists and GPs is the time required to deliver health interventions and complete paper work associated with data collection. It is recommended that GPs and pharmacists be paid for practice-level data collection for (mental health) research that requires extensive data collection by health practitioners. This may help facilitate timely data collection and may be a more cost effective method compared to data collection directly by researchers.

6. It is recommended that future HMR studies investigate both the documented action rate (per MMP) as well as the acceptance rate of accredited pharmacist recommendations. These data complement each other and aid in the interpretation of the impact of pharmacist-conducted HMR.

7. It was our intention in this study to recruit pharmacists and GPs who ordinarily have a professional working relationship in the delivery of HMR services. We identified that a majority of cases (not all cases) that professional working relationships between many of the pharmacists and GPs were superficial. In some cases pharmacists were proactive in their development of professional relationships with their GPs, however, in general, pharmacist 'collaboration' with GPs was tentative and reserved. Accordingly, pharmacists were less able than expected to facilitate GP recruitment and subsequent HMR referrals. It is therefore highly recommended that significant effort be placed on the development of better professional working relationships between pharmacists and GPs, by all key stakeholder groups, including but not limited to professional organisations, government, universities and professional colleges. It is envisaged that at a local level, Divisions of General Practice (eg HMR facilitator) will continue to play a major role in fostering interprofessional collaborative working relationships.

8. Continuity of care and feedback after the HMR process is important to ensure positive outcomes for consumers. After GPs have received the HMR report from pharmacists, they are required to consult with the patient and draw up an HMR Medication Management Plan (MMP), including specific actions. This MMP should be signed by the patient, indicating their agreement with actions. The MMP should also be forwarded to the pharmacy/pharmacist. This trial demonstrated that pharmacists rarely receive feedback on their HMR reports via the structured HMR Medication Management Plan (eg 11 of 45 cases in Arm 2). In the view of the authors, this feedback is essential if pharmacists are to improve their skills and rapport with GPs. It is strongly recommended that Medication Management Plans be automatically forwarded by GPs to pharmacies and that pharmacists should actively request the MMPs from GPs if they do not receive them. Pharmacies should also develop record keeping systems for storage and retrieval of MMPs, as well as all other documentation associated with the HMR process. This is very important because MMPs form an imporant data source for evaluating the impact of HMRs.

9. In this study there appeared to be a wide variability in standard of HMR reports generated by pharmacists. It is therefore recommended that on-going training programmes and continuing education be made available for all pharmacists undertaking HMRs.

10. It is likely that the impact and overall quality of HMRs could be improved through better transfer of relevant clinical information between pharmacists and GPs. Prescription writing software (eg Medical Director) allows GPs to generate a template for a HMR referral or MMP. These templates may be tailored by the GP. For example the section on the indications for the HMR (or the reasons for the HMR) should be completed. In many cases this information was lacking. It is therefore recommended that GPs include all relevant information on HMR referrals and that pharmacists contact GPs prior to conducting HMRs if relevant information is not provided.

11. A relative strength of pharmacist conducted HMRs is the important role (of the pharmacist) in ascertaining a comprehensive list of medications consumed by patients. Pharmacist play a significant role in identifying medcations (prescribed, non

prescription and complementary and alternative medicines) taken by consumers through the conduct of home interviews. In this study, pharmacists in Group One identified a statistically significantly ($p=0.002$) higher number of medications per patient than GP records. On averge, an extra 1.4 medications per regimen was identified by pharmacists. This highlights the important role pharmacists play in conducting comprehensive HMRs.