PHARMACY STAFF MANAGEMENT OF PEOPLE PRESENTING WITH UNDIAGNOSED SKIN PROBLEMS: A QUALITATIVE STUDY OF PERCEIVED FACTORS INFLUENCING PRODUCT SELECTION

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ABSTRACT

BACKGROUND: Studies suggest that nearly a quarter of all requests for symptomatic advice in pharmacies are for skin problems. With a wide range of over the counter (OTC) skincare products, community pharmacists and medicine counter assistants (MCAs) have a potentially important role in facilitating self-care in these patients. However, little is known about the factors influencing staff in their choice of skincare products or if they perceive themselves to have sufficient knowledge of dermatology to undertake this role.

OBJECTIVES: The aims of the present study were to: understand the factors that influence pharmacists and MCAs in their choice of OTC skincare products; to explore any dermatology training needs.

METHODS: Semi-structured telephone interviews were conducted with a sample of ten pharmacists and 15 MCAs from a range of community pharmacy settings in the north of England. Interviews were transcribed verbatim and analysed for recurring themes using the Framework Approach.

RESULTS: Key themes related to choice of skincare products among pharmacists were: positive client feedback, clinical guidelines, treatment costs and patient specific factors. While MCAs also based treatment choices on client feedback, they raised the issue of their own personal experience of using particular products. Pharmacists and MCAs highlighted a need for further dermatology related training, particularly in differential diagnosis.

CONCLUSION: Both pharmacists and MCAs base treatment decisions on positive feedback from patients. There is a recognised need among staff for further training to enable them to distinguish between skin problems. Future studies need to explore the outcomes associated with treatments for patients with undiagnosed skin problems.

Key words: pharmacy, skincare products, factors influencing selection, educational needs, qualitative.

INTRODUCTION

Community pharmacies are highly accessible sources of professionally trained healthcare advice without the need for formal appointments. Pharmacists and their staff are ideally placed to offer assistance and treatment to patients seeking professional input in order to facilitate self-care. The
notion that community pharmacists in the United Kingdom (UK) have a potentially valuable role in supporting self-care has been mooted since the 1980s with the publication of the Nuffield inquiry and has subsequently become enshrined in Government’s policy. More recently, for example, the white paper, Pharmacy in England strengthened the governments’ aspirations for pharmacists providing support, assisting patients to self-care through the increased availability of medicines over-the-counter (OTC), and more extensive minor ailment schemes, a view also promoted several years earlier in the National Health Service (NHS) Improvement Plan. Minor ailment schemes have been developed in some areas of the UK to encourage patients to visit community pharmacies, rather than their general practitioner (GP), to access treatment for a limited range of common conditions. Patients exempted from the normal prescription charges (i.e. the elderly, children, those on low incomes) can access such a scheme provided that their local GP surgery is a participant.

Though Government policy has promoted the role of pharmacists, several studies demonstrate that medicine counter assistants (MCAs) are often the first point of contact for consumers entering a pharmacy and frequently offer advice independent of the pharmacist. The term ‘medicines counter assistant’ refers to a member of the pharmacy team whose role is to offer advice and information to patients on OTC medicines. Since 1996 in the UK it has been a mandatory professional requirement for anyone who fulfills this role to have undertaken a recognized training course on OTC medicines.

One area where there has been limited research, and yet a significant demand for support in primary care, is dermatology, with a large number of people living with skin problems. A recent study found that in 2006 over 13 million people visited their GP with a skin problem, and dermatological conditions were the most common reason for patients visiting their GPs about a new problem. The role of community pharmacists and their staff in managing skin problems is largely unknown but potentially huge given that retail sales data suggest that as much as 18% of all OTC sales are for skincare products. Some evidence from Australia suggests that patients with a skin problem are satisfied with the advice from pharmacists and that pharmacy staff make product recommendations in as many as 39% of cases.

Nevertheless, although retail sales data give some indication of the potential volume of work generated in pharmacies by skin conditions, it offers no insight into whether these requests were treatment or symptom-related. Evidence from observational studies in pharmacies show that symptomatic skin problems accounted for between 12 and 23% of all requests. With the UK Government keen to increase the range of products available OTC, surprisingly little is known about the factors which influence pharmacy staff when selecting treatments for patients with undiagnosed skin conditions. Additionally, to our knowledge, no studies have researched whether or not pharmacists and MCAs perceive that they possess sufficient dermatological knowledge to be able to offer appropriate advice to these patients.

The aims of this qualitative study were therefore:

1. To understand the factors that influence pharmacists and MCAs in their choice of OTC skincare products.
2. To explore and define any dermatology training needs.

MATERIALS AND METHODS

Reflecting the qualitative approach, the main method employed was semi-structured telephone interviews. Telephone interviews are interactive, allow deeper investigation of issues to be addressed than face-to-face interviews\textsuperscript{14}, gather similar quality of qualitative data, and are more cost effective than face-to-face interviews\textsuperscript{15}.

Sampling

Pharmacists and MCAs

We used a convenience sampling approach. Pharmacies were recruited through a contact at the South Humber Primary Care NHS Trust, whose role was to help develop research studies in community pharmacy. This individual maintained a register of community pharmacists within the area who were interested and willing to participate in research. The aim was to recruit sufficient pharmacies to provide 10 pharmacists and 15 MCAs, at least two per pharmacy. A letter was sent to all (thirty) potentially interested pharmacies and ten initially agreed to participate though three subsequently declined. The selected pharmacies (seven) provided a suitable range of settings, and included: three suburban; two rural; one healthcare centre and one supermarket.

One of the pharmacies employed three pharmacists who worked on a shift rotation and all agreed to participate. One of us (RT) contacted the pharmacists at each site to ask them to find two MCAs who were interested in participating in the study. Those who expressed an interest were contacted by the same researcher who explained the nature of the study and gained informed, written consent. At one of the sites (supermarket), none of the MCAs agreed to participate and therefore additional MCAs were recruited from the healthcare centre pharmacy. We included only pharmacists who worked solely in community practice and MCAs who had worked in pharmacy for at least 12 months. We excluded pharmacist locums who worked only part-time in community pharmacy, and MCAs who had been in employed in the pharmacy for less than 12 months.

Data generation and analysis

Draft semi-structured interview guides were developed by discussion among the research team, based on the extant literature. The interviews involved a series of open questions designed to explore pharmacist and MCA perceptions of two key areas: the factors influencing their choice of OTC medicines for skin conditions, and their training in dermatology. The interview guides were piloted (one pharmacist and one MCA) and designed to last around 20 minutes. No major issues were identified during piloting except for some of the questions for the MCA interviews, which were subsequently modified to improve clarity. The topic guide used for the interviews is shown in the box.

Interviews with all 10 pharmacists and 15 MCAs were digitally recorded and transcribed verbatim, with each person assigned a unique identifier. All interviews were conducted by the same person (RT) who made contact with participants and arranged a suitable time to conduct the interviews.
Some pharmacy staff opted to be interviewed during quieter periods during the working day whereas most agreed a time and date away from the workplace. The Framework Approach\textsuperscript{16} to data analysis was followed and NVivo (version 9.2, QSR International) was used to facilitate data management. The framework approach is based on the creation of a ‘thematic framework’ in which emergent themes are placed in a matrix. The columns in the matrix represent the themes, and each of the rows represents a participant. Any comments relevant to the particular theme made by each participant can then be easily visualized within the matrix. The coding framework was developed independently by two members of the team to enhance reliability.

Box 1: Outline of topic guide for interviews

Choosing skin care products

*What factors influence you when deciding upon an over-the-counter skin care product?* Probes – *How do you judge whether or not these treatments work?*

*What treatments for skin conditions would you like to see available over-the-counter?*

*What about PGDs or pharmacist prescribing? Do you think such schemes would be of benefit to patients?*

Training in dermatology (pharmacists)

*Tell me about your training in dermatology as an undergraduate?*

*Have you undertaken any post-graduate training or CPD in dermatology? What did you do? If not, what would you like to learn?*

Training in dermatology (MCAs)

*Have you had any training in the management & recognition skin problems?* Probes - *If yes – by whom or from where? Was it enough? How useful was it?*

*If no – In what areas do you feel that you need more training?*

Research governance

Approval was obtained from the Ethical Review Panel of the School of Pharmacy and Life Sciences at Robert Gordon University. The study was exempted from NHS ethical review.

RESULTS

Pharmacist and MCA characteristics are provided in Table 1 and 2. All interviews lasted between 10 and 30 minutes. Quotes illustrating each of the emergent themes are described below.
Table 1: Pharmacist Characteristics

<table>
<thead>
<tr>
<th>Pharmacist code</th>
<th>Gender</th>
<th>Pharmacy</th>
<th>Years in Pharmacy</th>
<th>Age band</th>
<th>Pharmacist</th>
</tr>
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<tbody>
<tr>
<td>PH1</td>
<td>male</td>
<td>Suburban (multiple)</td>
<td>&gt; 20</td>
<td>45 - 50</td>
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<tr>
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<td>18 - 25</td>
<td>Locum</td>
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<td>5 - 10</td>
<td>25 - 30</td>
<td>Manager</td>
</tr>
<tr>
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<td>25 - 30</td>
<td>Part-time</td>
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<td>34 - 41</td>
<td>Part-time</td>
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Table 2: MCA characteristics

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<td>20 - 25</td>
<td>Full-time</td>
</tr>
<tr>
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<td>Supermarket (multiple)</td>
<td>11 - 15 years</td>
<td>35 - 40</td>
<td>Full-time</td>
</tr>
<tr>
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<td>6 - 10 years</td>
<td>35 - 40</td>
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</tbody>
</table>

Factors influencing pharmacists when choosing an over-the-counter skin care product

Four themes emerged when discussing the influences on pharmacists:

- Patient feedback
- Clinical guidelines
- Treatment costs
- Patient specific factors
A summary of the themes and number of participants mentioning those themes is shown in Table 3.

Table 3: Summary of factors influencing both pharmacists and MCAs when selecting a skincare product

<table>
<thead>
<tr>
<th>Factors influencing choice of OTC treatment</th>
<th>Pharmacists</th>
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<td>Treatment costs</td>
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<td>Personal experience</td>
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<tr>
<td>Patient related factors</td>
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</tr>
<tr>
<td>Pharmacist recommendations</td>
<td>1</td>
<td>2</td>
</tr>
<tr>
<td>Treatments on minor ailment scheme</td>
<td>1</td>
<td>0</td>
</tr>
<tr>
<td>GP prescribing</td>
<td>1</td>
<td>0</td>
</tr>
</tbody>
</table>

Patient feedback

The positive feedback from patients who had previously used a product had a major impact on pharmacists’ choice of treatments as summarised by one pharmacist:

‘if I have a choice, if I’ve got two different products, then I would probably go by what I’ve heard from patients and by patient experience from the past, that’s how I would choose’ [PH4]

Conversely, negative feedback on a product was an equally important sway as described by a pharmacist in relation to calamine lotion:

‘…the other thing that we’re presuming is the ease of use and the convenience of use. For example, I’ve gone off the idea of calamine lotion… but I really didn’t like it early on [in my career] because it’s very difficult to apply and I heard that back from other people … when you gave them calamine lotion they rolled their eyes because they’d tried using it before, so I suppose where we do get that feedback it can become very powerful…” [PH10]

Clinical guidelines

Using patient feedback to judge effectiveness could be difficult because patients didn’t always return to the pharmacy. One pharmacist therefore took a more pragmatic approach to treatment recommendations, relying on products suggested in clinical guidelines, professional articles or even products available via minor ailment schemes.

‘It’s very difficult [judging treatment effectiveness] and this comes back to what I was saying before, we often don’t get things [patients] calling back so it’s often down to various recommendations such as the CKS [clinical knowledge summaries] which we would use where that gives clear advice [and] other professional outlets such as the [Pharmaceutical] journal …or other such areas’ [PH10].

Treatment costs

The cost of medicines also influenced product choice.

‘….you also consider the economic aspect because there are some creams or emollients for dermatitis or for skin conditions that are quite expensive, so it’s just one of the things to consider before recommending anything for the patient’ [PH7]
Patient specific factors

Two pharmacists mentioned that their choice of treatment depended on specific patient factors such as age and the site of the skin problem, as illustrated by one of them:

‘Definitely a persons’ age because you would chose different things for babies and sometimes different things for elderly patients or adults. Then the area, because of course we can’t advise to use, for example, steroid products on the face and head area’ [PH5].

One pharmacist mentioned how they were influenced by treatments prescribed by local GPs:

‘…There are products that you get on prescription … you see them on prescription and then obviously you assume that they work…’ [PH9]

Only one pharmacist felt that personal experience of a product influenced their recommendations to patients:

‘I would probably advise on something which I already tried or had samples before and I can say for instance that product I know is very well absorbed by the skin and not sticky and so on, things like that’ [PH5]

Finally, one pharmacist mentioned the valuable but under-utilised influence on treatment choice gained from seeking the opinion of another colleague:

‘…One thing I think we don’t do that well as pharmacists is talk with people, other pharmacists, and I’ve got a few pharmacists and I often double up and I wouldn’t think twice if there were two pharmacists on asking the other pharmacist to come and give an opinion as well which I think improves the experience of both of us’ [PH10]

Factors influencing MCAs when choosing an over-the-counter skin care product

In contrast to the pharmacists, only two key themes emerged when discussing the factors which influenced MCAs in their choice of treatment:

- Patient feedback
- Personal experience

Patient feedback

Seven of the MCAs considered patient feedback as important when choosing an OTC medicine:

‘… Usually if they come in and we suggest a cream or lotion, 9 times out of 10 they will come back and tell us that it’s worked or if not, they’ll say well it didn’t quite work so I went to the doctor but they will come in because they’re regular customers.’ [MCA13]

Personal experience

Two of the MCAs mentioned how they recommended products which they had used themselves. One MCA who had a child with eczema, described how they would often suggest that patients try products that she had found to be effective:

‘…I’ve used quite a few things with my little girl so I can sort of say oh have you tried this or that… it’s
helped for me or I know someone it’s been quite useful for…” [MCA1].

Finally, two MCAs mentioned how they were influenced by the choices recommended by their pharmacist as well as products that were frequently sold:

‘…Either something that [the pharmacist] advised in the past or something that we sell a lot of I tend to advise’ [MCA4]

Further OTC treatments for skin conditions

When asked about the need for any further OTC medicines to help manage skin problems, seven of the pharmacists mentioned the need for some form of topical antibacterial product, as one pharmacist remarked:

‘… The main thing that I think should be available over the counter is antibiotic preparations because you can see that sometimes it’s a skin infection and you can never sell anything for it…” [PH9]

Nevertheless, one pharmacist expressed reservations about the more widespread availability of antibacterial agents, having been concerned about how some of his colleagues had dealt with sales of chloramphenicol eye drops, which have been an OTC product in the UK since 2005:

‘… I think pharmacists sometimes aren’t supervising P medicine sales as they should be… in my working memory chloramphenicol went from a POM [Prescription only medicine] to a P [Pharmacy only medicine] and I get patients that have been to see somebody else [another pharmacist] and they’ve contact lenses in or something and you know that rules out them being able to use chloramphenicol but they still get sold it because nobody bothered to screen them properly’ [PH6]

Another believed that rather than increasing the range of treatments, extending the OTC license for products such as topical steroids would be more useful:

‘…If there is a problem on the face I don’t have much choice, I’ve got to refer [to the GP] because most of the creams are not licensed to use on the face. That’s probably something that I think could be added to medication [sic] license for over the counter use’ [PH4]

Finally, one pharmacist felt that a small pack size of a potent topical steroid would be useful:

‘I suppose a more potent topical steroid in a very small pack size for a short period of time might be something that might be more beneficial” [PH6]

When prompted, pharmacists were more receptive to the idea of supplying topical antibiotic products via a patient group direction (PGD). These are written instructions for the supply or administration of medicines to a group of patients who are not individually identified before presentation for treatment17. This allows pharmacists to supply particular medicines to patients for a specific indication.

One of the pharmacists felt that his colleagues were likely to be more careful when supplying antibacterials through a patient group direction:

‘I think there’s a danger in making it [topical antibiotic] a P medicine but I think under a PGD that’s sometimes a little more prescriptive… and the inclusion and exclusion criteria are often clearer with those
[PGDs] so the pharmacists know it’s a prescription only medicine I think it gets treated with a bit more respect for that reason' [PH6]

In contrast, one pharmacist felt that further switches were unnecessary:

'…I’m quite happy with the range that we’ve got at the moment. I think we have a good range… I can’t think of an instance where I’ve thought I wish that product was available' [PH3]

Compared to the pharmacists, most of the MCAs were more circumspect about increasing the range of treatments available. In fact, ten of the MCAs didn’t perceive the need for more dermatological treatments:

'From what I’ve come across I think that there seems to be enough products… and I think the ones that you do need to see a doctor for, you need to see a doctor for a reason' [MCA3]

One MCA expressed concern that making more potent treatments available would inevitably remove the safeguards in place when a treatment was issued by a doctor. They illustrated this point with reference to topical steroids:

'…It would be very difficult to judge how much people are using…especially the steroid creams… my ex [partner] actually had quite bad eczema and seeing the creams that [they] was prescribed for the bad eczema it was good with how they worked and how quickly they worked, but I think it would be very difficult to monitor if it was available over the counter because you’re not guaranteed that everybody’s going to come back…' [MCA5]

This perception of a lack of monitoring was reiterated by another, especially for long-term skin conditions:

'… If it’s something more long-term then I think it’s better if they do get it on prescription anyway' [MCA9]

By contrast, one MCA believed that it would be in the interests of patients to be able to provide a further supply of treatment originally prescribed to them, particularly topical steroids:

'Things like Betnovate® [potent topical steroid] often you get people who’ll come in and they’ve already had it on a prescription and it may be quite some time ago and they know it works and they think they can come and buy it from us but unfortunately we can’t sell it. Preparations like that would be handy to have as a P rather than a POM' [MCA10]

Three MCAs believed that it would be appropriate to supply topical antibiotics, especially for infected insect bites or impetigo in children, based on the belief that early intervention would not only prevent the spread of the infection, but in the case of impetigo, for more practical reasons as one explained:

'… I think it would be a lot more useful [having OTC antibiotics]… we get quite a lot of people coming in saying oh what’s this [in children] and a lot of the time the pharmacist says I think you should go to the doctors… my little girl goes to nursery and they say after 24 hours if using [antibiotic] cream you can take them back so I think if you could buy something instant and sometimes you can’t even get into the doctors straight away and a lot of people don’t want to go to the doctors with it [impetigo] … I think to have a topical antibiotic would be quite good for things like that' [MCA1].
Pharmacist’s perception of their training needs in dermatology

Within the context of training needs, the main themes to emerge were:

- Limited undergraduate teaching
- Post-registration training self-directed
- Differential diagnostic training needed

**Limited undergraduate teaching**

The majority of pharmacists commented on how they had received limited teaching in dermatology during their undergraduate studies as illustrated by an older pharmacist:

'I don’t think we were really given much [dermatology teaching] at all as an undergraduate. It was minimal at the time… you got to remember going back to 1970s we were still using things like coal tar paste and Lasser’s paste and hydrocortisone wasn’t available over the counter … so I would say that my undergraduate training was very sparse…' [PH3]

Another pharmacist who had qualified within the last five years also explained how his dermatology teaching was limited:

'… she [the lecturer] was quite passionate and she was a very good teacher but the amount of time allowed … was probably not sufficient so we sort of blitzed through it, did a few bits and bobs talked about a few over the counter treatments and various skin conditions and that was it really… the undergraduate training was quick and brief…’ [PH6]

**Post-registration training**

For many pharmacists, post-registration training was felt necessary given the number of patients they encountered with skin problems, and very much self-directed as discussed by one pharmacist:

'…I very quickly realised that these patients [with skin problems] were going to be something I was going to see day to day and I didn’t feel well enough equipped to deal with them… so I did go away and do some CPD [continual professional development], read some articles, looked at some colour photographs, got a minor illness book that I tend to refer to sometimes, I went through all the bits and bobs of skin conditions…' [PH6]

Others felt the need to improve their knowledge of skin conditions and had done so through reading articles in professional journals, completing on-line courses or simply looked things up themselves when the need arose:

'I did some training on-line and I’m trying to look through internet [sic] and books … but mainly I think if you want to know more you just have to start looking yourself' [PH5]

Only one pharmacist said that they had received formal training in dermatology which was included in a clinical diploma they had undertaken. They felt that this had been useful but were not interested in pursuing any further dermatological training:

'It isn’t a subject that particularly interests me [dermatology], I’m a hands off kind of pharmacist' [PH2]

Finally, one pharmacist said that although they had undertaken CPD (which is a professional
requirement) none of this was in dermatology:

'CPD wise there are a lot of CPDs that I have done but I haven’t done any dermatology yet' [PH8]

**Differential diagnostic training needed**

Four of the pharmacists mentioned that training in differential diagnosis would be beneficial, as one pharmacist suggested:

'A lot of these more acute things, your infectious things or your allergies… we were never really taught how to differentiate one rash from another…' [PH6]

For the other pharmacists, CPD though helpful had possibly not been enough, and some expressed the desire to know more about specific skin conditions, as one mentioned in relation to psoriasis:

'I think I’d like to learn a little more about psoriasis to be honest… I don’t think I’m extremely confident with psoriasis' [PH10]

Only one pharmacist specifically mentioned undertaking any CPD from industry-based training material:

'…I feel a formal course on identifying skin cancers [would be useful]. The ones I’ve done have all been from manufacturer’s material but that is it…' [PH3]

**MCA’s perceptions of their training needs in dermatology**

Few of the MCAs had received any specific training in the recognition and management of skin problems, apart from their mandatory accredited courses which seemed to cover very little. However, some mentioned that they had received additional dermatology training material through their companies:

'…We do get packs through [from Head Office] every so often, we had one recently about children/babies skin problems… it’s just general, what to look for, what to advise. We get them every so often' [MCA6]

Others described how they had simply learnt to recognise different conditions through a combination of reading, encountering the problems in the pharmacy and from observing the pharmacist:

'Over the years some training, nothing too in depth but magazine articles, experience really and listening to the pharmacist when they’ve counselled people' [MCA8]

However, this training appeared to be insufficient to meet their needs; eight of the MCAs mentioned the need to be able to distinguish between various rashes as summed up by one:

'I think more probably just more focused on different types of rashes because we see a lot of them' [MCA6]

This improved knowledge would allow a greater degree of autonomy as one explained:

'…We always have to get the pharmacist to double check but if we could recognise things ourselves I think it’d make it better because we wouldn’t have to speak to the pharmacist so much…' [MCA6]

Other MCAs expressed an interest in learning about specific skin conditions such as eczema or
psoriasis. One was particularly interested in knowing more about acne and its treatment as she explained:

'We do get a lot of people asking for acne treatments so I think something [training] for acne… I think a lot of people suffer or seem to suffer [with acne] and we get parents coming in for their teenagers with acne and want to know what they can use…' [MCA15]

DISCUSSION

This qualitative study has provided some insight into the factors associated with the decision-making process when pharmacists and MCAs select an OTC medicine for the treatment of undiagnosed skin problems. The study also revealed a perceived need among pharmacy staff for further training in dermatology. Previous research considering the factors deemed important by pharmacists when selecting an OTC product identified six factors: product formulation, self-use, efficacy, ease of use, clinical evidence and patient feedback. Some of these were mentioned by pharmacists during the interviews but it appeared that the relative importance of factors was not well defined, though this could not be explored in any detail with the current qualitative approach. Nevertheless, there was general agreement that selection of a product was based to a large extent on positive patient feedback, a view espoused by other pharmacists. Likewise, MCAs stressed the important influence of patient feedback, and identified the influence of personal experience.

Most of the pharmacists and some of the MCAs felt the need for antibacterial products to be made available to them. Currently, only one topical antibiotic, chloramphenicol, can be purchased through pharmacies in the UK, and a recent analysis found that since its OTC launch, there has been a substantial increase in sales of chloramphenicol which was not accompanied by a reduction in prescribing. Attempts to allow the OTC supply in the UK of two oral antibiotics, trimethoprim and nitrofurantoin, for uncomplicated acute bacterial cystitis, were withdrawn in 2010 though the oral antiviral, famciclovir is available for purchase in pharmacies in Australia for the treatment of herpes labialis. Furthermore, a triple topical antibiotic product containing neomycin, bacitracin and polymyxin for the management of skin infections has been available over-the-counter in the US for some time. This widespread availability of antibacterials is thought to have contributed to the development of resistant bacterial strains. For example, topical mupirocin was available as an OTC product in New Zealand from 1991 to 2000 and one study has suggested that a steady increase in mupirocin resistance to staphylococcus aureus is likely to be due to the OTC availability of the drug. More recently there have been fears that the widespread use of OTC antibiotic creams in the US might also have contributed to bacterial resistance. These concerns are likely to result in pharmacists in the UK being unable to supply topical antibiotics in the foreseeable future.

While individual pharmacists expressed a desire for further training on particular skin conditions, there was a view that further knowledge on differentiating between skin problems, particularly rashes, was required, a view shared by MCAs. Additionally, some MCAs who had worked in pharmacies for several years, felt confident at recognising different skin problems, but had also
acquired the knowledge of some conditions experienced by their own children, a view noted in other work.\textsuperscript{27}

An important function for pharmacists enshrined in much health policy in the UK has been to manage minor ailments and to assist patient self-care for those problems amenable to treatment in pharmacies. The belief that skin conditions are minor ailments has been re-enforced to some extent both by Government, in white papers such as Pharmacy in England\textsuperscript{2}, and organisations such as the National Pharmacy Association, who have deemed certain skin conditions as minor ailments that can be managed through pharmacies.\textsuperscript{28} Additionally, the inclusion of skin problems in some minor ailment schemes in parts of the UK only serves to re-enforce this view, and will undoubtedly result in patients choosing to visit pharmacists for advice on a skin problem.

To facilitate an effective triage role, pharmacists and their staff require sufficient knowledge of different skin conditions, or at least to be cognizant of the features that should prompt referral to the GP. Our study suggests that some pharmacists and MCAs identified an important gap in their dermatological knowledge, namely the ability to differentiate between skin rashes which are believed to commonly present in pharmacies.\textsuperscript{29} This knowledge gap represents a potential stumbling block to undertaking an effective triage role.

Few studies have examined the ability of community pharmacists to recognise and manage different skin conditions though the evidence that is available highlights the need for further training.\textsuperscript{30,31} Despite this potential lack of knowledge, support for pharmacists dealing with skin problems was identified in a study of minor ailment management by GPs.\textsuperscript{32} There is some evidence that MCAs can and do play an active role in helping those with skin problems without input from pharmacists. In one study it was found that 55\% of OTC products sold for symptomatic skin problems were conducted by pharmacy assistants alone.\textsuperscript{33} To our knowledge there have been no studies that have addressed the appropriateness of inventions by MCAs to identify and manage dermatological problems. Consequently, in order to define their training needs more clearly, future studies need to assess the dermatological knowledge base of MCAs.

This appears to be the first qualitative study to explore the factors influencing pharmacy staff when recommending treatment for symptomatic skin problems. Nonetheless, the study does have some recognised limitations. The small sample size relative to quantitative studies is clearly a limitation in terms of the transferability of the study, although qualitative studies are not designed to be statistically generalizable to the wider population. A second potential limitation using a small sample size is whether data saturation was achieved. It is difficult to determine when saturation has occurred but the fact that no additional themes emerged as the interviews progressed suggests that it is likely that data saturation was attained. Furthermore, since the study was conducted in only one geographical area, the observations may not be completely representative of the wider population of pharmacists and MCAs. Finally, because we used a convenience sampling technique to recruit participants, we cannot exclude the possibility of non-respondent bias.

Since potentially up to a quarter of all symptomatic requests for advice in pharmacies are for skin problems, it is important that pharmacy staff feel they have sufficient dermatological knowledge...
to be able to distinguish between conditions responsive to pharmacy care and those which require the involvement of the GP. The current study suggests that some pharmacists and MCAs feel that they lack the ability to perform this role confidently.

CONCLUSION

This study has revealed that positive patient experience is a powerful influence when recommending treatments in response to undiagnosed skin conditions among both pharmacists and medicine counter assistants. Both pharmacists and MCAs felt that further training in the differential diagnosis of skin problems would be of value. In relation to undiagnosed skin problems, it is unclear whether treatment from pharmacies leads to a satisfactory resolution of a patient’s condition. Further research is necessary to explore the outcomes associated with pharmacy supported self-care for patients with undiagnosed skin problems.

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