Podiatry prescribing and the pharmacist

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Learning objectives

• To be able to interpret prescriptions from endorsed podiatrists
• To be able to determine the legality of a prescription from an endorsed podiatrist
• To be able to determine which medications may be legally prescribed by an endorsed podiatrist
• To be able to effectively and diplomatically communicate with an endorsed podiatrist

Competencies addressed

This article addresses the following competency standards: 1.1.1, 1.1.2, 1.2.1, 1.2.2, 2.2.1, 2.3.1

A Podiatrist is a health professional who diagnoses, treats and prevents disorders of the foot and lower leg by physical, biomechanical, surgical, chemical and electrical strategies and interventions. (1)

This article is designed to inform pharmacists about podiatrist prescribing and the pharmacists responsibilities and that with the new role of podiatrist prescribing cooperation between health professions is vital for the well-being of our patients.

During 2009, registered podiatrists who had completed all the requirements of the Podiatrists Registration Board could become endorsed to prescribe nominated Schedules 2, 3 and 4 items.

Endorsement of podiatrists to prescribe

The Podiatry Board of Australia may endorse the registration of suitably qualified podiatrists as qualified to administer, obtain, possess, prescribe, sell, supply or use Schedule 2, 3, 4 and 8 medicines for the treatment of podiatric conditions under sec 14(2) of the Health Practitioner Regulation National Law Act 2009 (2) available at http://www.legislation.qld.gov.au/LEGISLTN/ACTS/2009/09AC045.pdf

Class of health practitioners (section 14(2)(a)). Any person registered as a podiatrist under the National Law whose registration has been endorsed by the Podiatry Board of Australia under sec 94 as qualified to administer, obtain, possess, prescribe, sell, supply or use Schedule 2, 3, 4 and 8 medicines for the treatment of podiatric conditions Class of health practitioners(section 14(2)(b) ) Any Schedule 2, 3, 4 or 8 medicine used in the treatment of podiatric conditions included in a list of scheduled medicines approved by the Podiatry Board of Australia and published on the Board’s website at the following address: www.podiatryboard.gov.au (3)

Scope of endorsement: An endorsement under s94 indicates that the registered podiatrist is qualified to administer, obtain, possess, prescribe, sell, supply or use Schedule 2, 3, 4 or 8 medicines to patients for the treatment of podiatric conditions, from a list approved by the Board and published on its website.
Eligibility: Approved program of study in podiatric therapeutics, or a substantially equivalent program*, and
(a) a period of post-qualification experience (seven years) clinical experience in an appropriate setting where active prescribing is occurring and two confirmatory references of applicant exposure to patient care involving restricted drugs), OR
(b) completion of web-based case studies approved by the Board (20 hours) and a specified period of supervised practice (40 hours of supervision by an endorsed prescriber approved by the Board in an appropriate setting where active prescribing is occurring in a 12 month period).

A program designed and delivered by A Prof Louis Roller, Dr Jenny Gowan and Mr Stephen Marty( Chair, Pharmacy Board of Australia) on behalf of La Trobe University in Melbourne is the first such course to be approved by the Podiatrists Board of Victoria and subsequently, the Podiatrists Board of Australia. The main aim of the course (15 hours of therapeutics lecture/workshop presentations and 20 hours of web-based case studies is “to provide practicing podiatrists who have fulfilled all of the Podiatrist’s Board requirements enough information to be able to effectively and legally prescribe designated medicines with knowledge, confidence, efficacy and safety”

It is important that the participants are aware that they will have the ability to prescribe a relatively small range of medicines, but that these medicines may be very potent and possibly toxic. Therefore, it is vital that a full medical and medication history be obtained before considering prescribing anything.” (3). The program consists of 10 topics, each topic having one or more lectures linked by a specific theme to cover the drugs allowed to be prescribed by indorsed podiatrists and followed by 20 hours of web-based case studies. This is currently, the only approved course by the Podiatrists Board of Australia and is likely to be rolled out across the country in the next few months. So far, the first session was delivered in October 2009 with 9 participants and a second offering occurred in May 2010 with 40 participants. The on-line assessment case-studies went “live” in July, 2010. Both programs were delivered at La Trobe University, Melbourne, Victoria.

There are two prerequisites for podiatrists to prescribe or supply scheduled medicines:
(i) an endorsement from the Board and
(ii) an authority under the State or Territory drugs and poisons legislation in which the podiatrist practices.

The legal requirements applicable to prescribing or supplying scheduled medicines are set down in the Drugs, Poisons & Controlled Substances legislation, such as requirements for prescriptions. It is important for endorsed podiatrists to be familiar with this legislation. The Board must not specify any Schedule 2, 3 or 4 poison in an endorsement unless the poison is, or is of a class or type of poison, approved by the Minister (State) under section 14A of the Drugs, Poisons and Controlled Substances Act 1981 and Regulations, 2005. (5)

Quality use of medicines (QUM): Endorsed podiatrists must take all reasonable steps to ensure that a therapeutic need exists and prescribe only for podiatric treatment of patients or clients under their care. The best interests of the patient or client must remain paramount at all times. The practice guidelines and the authorisation under the relevant State and Territory drugs and poisons legislation must be reviewed by the endorsed podiatrist prior to prescribing or supplying scheduled medicines.

QUM for podiatrists means:
a). selecting management options wisely by: considering the place of medicines in treating illness and maintaining health, recognising that there may be better ways than medicines to manage many disorders  
b). choosing suitable medicines if medicines are considered necessary so that the best available option is selected by taking into account of the individual, the clinical condition, risks and benefits, dosage and length of treatment, any co-existing conditions, other therapies, monitoring considerations and costs for the individual, the community and the health system as a whole.  
c). using medicines safely and effectively to get the best possible results by monitoring outcomes, minimising misuse, monitoring overuse and underuse, improving people’s ability to solve problems related to medicines, such as negative effects or managing multiple medicines. Clinical notes must accurately reflect the podiatrist's actions in relation to scheduled medicines.

Resources: The Podiatrist Board of Australia recommends that endorsed podiatrists should have essential resource material with respect to drug information. These include as a minimum: Medical Journal of Australia, The Australian Prescriber, NPS publications (including NPS news and RADAR)  
Books or electronic latest versions of  
- Australian Medicines Handbook (AMH)  
- Therapeutic Guidelines (Analgesic, Antibiotic, Cardiovascular, Dermatology, Endocrinology, Gastrointestinal, Neurology, Psychotropic, Palliative Care, Respiratory, Rheumatology, Toxicology and Wilderness)  
- eMIMs, or MIMS Annual and bi-monthly  
- Any recent textbook on Clinical Pharmacology  
- A Medical Dictionary such as Mosby’s Dictionary
Unsurprisingly, these recommended resources are remarkably similar to the resources required for pharmacies.

Prescriptions  
Prescriptions should be written for the supply of any Schedule 4 and Schedule 8 medicines. In an emergency, oral instructions for the supply of Schedule 4 and Schedule 8 medicines may be given to a pharmacist but must be confirmed in writing with a prescription as soon as practicable.

The Board encourages endorsed podiatrists to issue formal prescriptions for the supply of Schedule 2 and Schedule 3 (not a legal requirement) medicines as a means of communicating with pharmacists and ensuring patients or clients receive the correct medicines.

Prescriptions must be handwritten or computer generated and include the following criteria:  
- the date of writing  
- full details of the prescriber,  
- full details of the patient or client  
- medicine (including name, strength and quantity),  
- precise directions (except where directions are too complex and are provided separately or where administration is to be carried out by a nurse or podiatrist)  
- must be signed by the prescriber  
- must not knowingly contain any particular that is false.
The *self-administration* of Schedule 4 and Schedule 8 medicines by endorsed podiatrists is prohibited (unless prescribed by another practitioner for treatment). Podiatrists must not write a prescription other than for the person named on the prescription.

Prescribing principles includes:
- patient assessment and diagnosis
- appropriate choice of medicines from the list of drugs (see Table 1) for which the registration of the podiatrist has been endorsed by the Podiatrists Board of Australia

| Table 1. Approved medications which may be prescribed and/or supplied by endorsed podiatrists |
|---|---|---|
| **Type** | **Drugs** | **Schedule** |
| Analgesics | Codeine | 3 & 4 |
| | Paracetamol | S2 |
| Antihistamines | Desloratidine | S2 & 4 |
| | Promethazine | S3 & 4 |
| Anaesthetics local | Bupivacaine | S4 |
| | Lignocaine | S4 & 4 |
| | Levobupivacaine | S4 |
| | Prilocaine | S4 |
| | Mepivacaine | S4 |
| | Prilocaine | S4 |
| | Procaine | S4 |
| | Ropivacaine | S4 |
| Anaesthetic inhaled | Methoxyflurane | S4 |
| Antifungals topical | Amorolfine | S2 & 3 |
| | Bifonazole | S2 |
| | Clotrimazole | S2 |
| | Econazole | S2 |
| | Ketoconazole | S2 |
| | Miconazole | S2 |
| | Nystatin | S2 |
| | Terbinafine | S2 |
| Antifungals oral | Griseofulvin | S4 |
| | Terbinafine | S4 |
| Benzodiazepines (one dose/treatment episode) | Lorazepam | S4 |
| | Temazepam | S4 |
| Corticosteroids topical | Betamethasone | S4 |
| | Desonide | S4 |
| | Hydrocortisone | S2, 3 & 4 |
| | Hydrocortisone acetate | S2 & 3 |
| | Mometasone furoate | S4 |
| | Triamcinolone | S4 |
| Corticosteroids systemic | Betamethasone | S4 |
| | Dexamethasone | S4 |
| | Hydrocortisone | S4 |
| | Methylprednisolone | S4 |
| | Triamcinolone | S4 |
NSAIDs (systemic & topical)  
- Aspirin  S2 & 4  
- Celecoxib  S4  
- Diclofenac  S2, 3 & 4  
- Ibuprofen  S2, 3 & 4  
- Indomethacin  S4  
- Ketorolac  S4  
- Meloxicam  S4  
- Naproxen  S4  

Uric acid inhibitor  
- Colchicine  S4  

Sympathomimetics  
- Adrenaline  S4  
- Felypressin  S4  

Antibiotics: antibacterial  
- Amoxicillin  S4  
- Clavulanic acid*  S4  
- Cephalexin  S4  
- Clindamycin  S4  
- Dicloxacillin  S4  
- Flucloxacillin  S4  
- Metronidazole  S4  
- Mupirocin (topical)  S4  
- Roxithromycin  S4  
- Silver sulfadiazine  S4  

- Listed separately as above, but only available as the combination of amoxicillin+clavulanic acid.

It should also be noted that the legislation makes no restrictions on strengths or quantities on any of the listed medications with the exception of the two benzodiazepines (lorazepam and temazepam), which can only be prescribed as a single dose for one treatment episode.

Writing a prescription: involves advising the patient about the appropriate use of the medication, monitoring outcomes, administration sale and supply and completing any necessary documentation.

Prescribing must be based on knowledge of: pharmacology and therapeutics, indications for use, precautions, contraindications, interactions (drug/drug, drug/food, drug/complementary medicines) and the quality use of medicines program (6).

Other issues  Legal liability: Podiatrists must accept full responsibility for their diagnosis, rational selection of appropriate drug, treatment regimen, prescription and minimisation of medication errors.

Storage  
Podiatrists should ensure that:  
- scheduled medicines are stored securely and in accordance with the manufacturer’s recommendations.  
- details of stock administration of Schedule 4 medicines must be recorded and the details must be retrievable for three years; records must show the name of the person carrying out the transaction  
- the relevant authorities are notified of the loss or theft of any scheduled medicines.

Sale of Scheduled items by podiatrists  
The Podiatry Board is of the view that the differentiation of responsibilities between prescribers and pharmacists provides checks and balances to safeguard patients or clients and this practice should be maintained. (3)
The expertise of the pharmacist in counselling of patients or clients has an important role in follow-up care by checking adherence to the prescriber’s requirements, confirming administration times and techniques, screening for adverse reactions and referral back to the prescriber for further investigations or advice when required.

The role of the pharmacist in the process of monitoring medications is recognised by laws which regulate pharmacy record keeping, labelling and dispensing. Therefore, the Podiatry Board advises that the sale or supply of scheduled medicines will generally be regarded by the Podiatry Board as professional conduct which is of a lesser standard than that which might reasonably be expected of an endorsed podiatrist by his or her peers. (3)

The Podiatry Board has determined that an endorsed podiatrist generally **not** sell any scheduled medicines. Exceptions to this rule may apply to: the supply of Schedule 2, 3, 4 or 8 medicines in an emergency situation, the provision of scheduled medicines in unusual clinical situations, in remote areas or after hours or wherever access to a pharmacy is likely to be difficult. (3)

In supplying medicines in emergency or other exceptional circumstances, endorsed podiatrists are reminded that legal requirements for record keeping, labelling and dispensing must be met and that good practice always demands adequate counselling about the use of medicines, their side effects and potential interactions.

As the professional expertise of the pharmacist is not available to the patient or client in these situations, the obligation on the endorsed podiatrist to meet these legal and professional duties is increased. The Board has determined that the same restrictions apply to non-endorsed podiatrists who are using Schedule 2, 3, 4 or 8 medicines within their defined scope of practice. Sample and starter packs are considered to fall within these restrictions. (3)

**Poisons Schedules**

Poisons are not scheduled on the basis of a universal scale of toxicity. Although toxicity is one of the factors considered, and is itself a complex of factor, the decision to include a substance in a particular Schedule also takes into account many other criteria such as the purpose of use, potential for abuse, safety in use and the need for the substance. (5,7)

The Poisons schedules for therapeutic use are essentially - Schedules 2, 3, 4 & 8. Approval was signed by the Minister on 25 June 2009. Lists of Schedule 2, Schedule 3 and Schedule 4 poisons are published on Podiatrists Board of Victoria website; endorsed podiatrists may possess, prescribe, use (administer), supply or sell (but not in an open shop): the following Schedule 2, 3 and 4 medicines (now on the Podiatrists Board of Australia website) (2) and as per Table 1.

**Schedule 2: Pharmacy Only Medicine** are substances, the safe use of which may require advice from a pharmacist and which should be available from a pharmacy; or where there is no pharmacy service available, from a licensed person.

**Schedule 2 medicines approved for prescribing by endorsed podiatrists:** amorolfine, aspirin, bifonazole, clotrimazole, desloratidine, codeine (removed on 1 May, 2010), diclofenac, econazole, hydrocortisone and hydrocortisone acetate, ibuprofen, ketoconazole, lignocaine, miconazole, nystatin, paracetamol, prilocaine, terbinafine
Schedule 3 Pharmacists Only Medicines are substances the safe use of which requires professional advice but which should be available to the public from a pharmacist without a prescription, must determine therapeutic need, give personal advice on safe & effective use, not available for self-selection, limited advertising and display, labelled to indicate the place of supply.

Schedule 3 medicines approved for prescribing by endorsed podiatrists: amorolfine, codeine (in combination and in quantities not exceeding 5 days supply), diclofenac, hydrocortisone and hydrocortisone acetate, ibuprofen, promethazine.

Schedule 4 Prescription Only Medicines are substances, the use or supply of which should be by or on the order of persons permitted by State or Territory legislation to prescribe and should be available from a pharmacist on prescription.

Schedule 4 medicines approved for prescribing by endorsed podiatrists: adrenaline, amoxycillin, aspirin, betamethasone, bupivacaine, celecoxib, cephalexin, clavulanic acid, clindamycin, codeine, colchicine, desonide, dexamethasone, diclofenac, dicloxacillin, felypressin, flucloxacinil, griseofulvin, hydrocortisone, ibuprofen, indomethacin, ketorolac, levobupivacaine, lignocaine, lorazepam (limit one dose per treatment episode), meloxicam, mepivacaine, methoxyflurane, methylprednisolone, metronidazole, mometasone furoate, mupirocin, naproxen, prilocaine, procaine, promethazine, ropivacaine, roxithromycin, silver sulfadiazine, sulindac, temazepam (limit one dose per treatment episode), terbinafine, triamcinolone.

Prescription issues
The podiatrist's stationery needs to identify the name and address of the practitioner and should be stored securely to prevent theft and manipulation of prescription pads.

The podiatrist in writing a prescription must comply with legislation appropriate records must be kept which includes: medication history, contra-indications, known allergies, interactions with prescribed, OTC and complementary medicines.

Checking procedures includes determining the right patient, at the right time, with the right medication, at the right dose, by the right route of administration, at the right frequency, with the right expiry date and with the right documentation.

Prescriptions should be written with a view of minimising the ability to alter the prescription; it should indicate, clear intentions and follow prescribing conventions. A clear understanding of the importance of prescribing appropriately, and the processes involved, allows prescribers with the confidence to prescribe rationally, independently and free from coercion. Inappropriate prescribing can lead to ineffective and unsafe treatment; it can exacerbate or prolong illness; it can cause distress or harm to patients; and it can be more costly.

The prescribing podiatrist must maintain appropriate records, utilise checking procedures, have safe storage of scheduled items and be able to dispose of scheduled items efficiently and safely.

If the prescribing podiatrist is supplying a Schedule 4 item, the medicine must be dispensed according to all legal requirements and must include an appropriate container, medication advice, directions for safe and effective use, checking procedures, appropriate record keeping and labelling including any Cautionary and Advisory labels (APF21).

The label must be legible and must be expressed in a way that the patient can understand and must contain (as for pharmacy dispensed medicines) the following:
- name of drug, form, strength, quantity.
Scenario
Ms Bennet, Elizabeth Bennet, hobbles into your pharmacy using crutches and with a bandaged left foot. She presents you with the following prescriptions from the local podiatrist, Mr Thomas Darcy.

<table>
<thead>
<tr>
<th>Mr Darcy, BPod (Hons)</th>
</tr>
</thead>
<tbody>
<tr>
<td>181 xxxx Street</td>
</tr>
<tr>
<td>Suburb, 30XX</td>
</tr>
<tr>
<td>Tel: 03 9XXX XXX</td>
</tr>
</tbody>
</table>

Registered and Endorsed Podiatrist (Registration # xxx)

**PATIENT'S NAME:** Ms Bennet, Elizabeth Bennet
**ADDRESS:** 246 xxxx, Suburb, 30XX
**DATE:** Today's date

- **R/ Cephalexin Capsule 500 mg**
  - 24 Take two capsules twice a day at twelve-hourly intervals until finished
- **R/ Panadeine Forte tablets**
  - 20 Take two tablets *FOUR* times a day at six-hourly intervals if required for pain

**Current complaint:** Ms Bennet tells you that she has a very painful, red toe which is exuding pus adjacent to the nail. It was much too painful to wear a shoe and it is obviously infected. She had hurt her toe some months ago by playing soccer with her old school all-girl team using football boots that were too small for her. She has had the pain for quite some time, but over the last couple of weeks, it had become excruciating and was oozing pus. Last week, Mr Darcy diagnosed that she had chronic paronychia leading to acute paronychia (her current complaint). He told her that the acute phase is due to a bacterial infection (usually *Staphylococcus*). This aggravates the chronic condition. The proximal nail fold becomes painful and the pus should be drained. This is what Mr Darcy did a week ago. However, the infection seems to be getting worse and Mr Darcy drained the pus again. He decided that antibiotic treatment was called for and he could also write a script to give her pain relief.

**Background:** Ms Bennet is 28 years old, weighs 56 kg, is 158 cm tall (BMI 22.4 kg/m²). She is single and is a project manager for a major bank. She exercises regularly and eats a good mixed diet. She smokes about 10 cigarettes a day, drinks wine with meals when she socialises. She does not have any known medical conditions.

**Current medications:** the only medication she takes is Loette (levonorgestrel 100 mcg/ethinyloestradiol 20 mcg) as an oral contraceptive.
Hypersensitivity reported (on your computer) Penicillin; she had serious breathing difficulties and major skin eruptions (urticarial) within minutes of taking a single dose of amoxycillin about two years ago

Treatment of acute paronychia
The infection is most likely due to *Staphylococcus aureus*. The treatment of first choice (9) is dicloxacillin or flucloxacillin 500 mg orally four times a day at six-hourly intervals for 7 days. For patients hypersensitive to penicillins (excluding immediate hypersensitivity), cephalexin 1 g twice daily at 120-hourly intervals for 7 days.

Issues related to prescribing
The prescription written by Mr Darcy complies with all the requirements of a legal prescription for S4 items and both items on the prescription are on the prescribing list for endorsed podiatrists (see Table 1). However, while Mr Darcy was aware of Ms Bennets’s hypersensitivity, but through some failure of communication, the message did not get through that her hypersensitivity was in fact an immediate one and hence even cephalosporins cannot and must not be used in this circumstance. For immediate penicillin hypersensitivity, the Antibiotic Guidelines recommend clindamycin 450 mg three day at eight-hourly intervals for 7 days. (9)

Action: You would need to contact Mr Darcy and diplomatically indicate the above problem and suggest to him that clindamycin can be used appropriately. Clindamycin may be prescribed by endorsed podiatrists). See Table 1.

The final prescription would be for clindamycin 150 mg capsules with a dosage regimen of three capsules three times a day at eight-hourly intervals for 7 days. The 450 mg three times a day is the maximum recommended, but is needed to ensure penetration to the infected sites. The replacement prescription could be given as a telephone order and followed up when practicable with a paper prescription.

Ms Bennet would need to be counselled to continue with the antibiotic treatment until finished. She should also be warned about the possibility of diarrhoea which is more serious than just the self-limiting type (frequent, liquid with mucus and possibly, blood), ie the isolating of *Clostridium difficile* leading to antibiotic-induced colitis (pseudomembranous colitis) (10,11). You would carry out the usual counselling for the Panadeine Forte, ie, no more than eight tablets per day ensuring no additional paracetamol is taken and to be taken only if pain is actually present.

Note that at this point in time, podiatrists cannot prescribe on the PBS and Ms Bennet would need to pay the full private price of the prescription.

References
2. Roller L, Gowan J, Marty S. Therapeutics Update Course for Podiatrists, Department of Podiatry, La trobe University, Bundoona, 2010.
7. Standard for the Uniform Scheduling of Drugs and Poisons 2009.
10. e-MIMS, CMPMedica 2010

Questions: Indicate the correct answer
1. An endorsed podiatrist has received endorsement from
   a the Pharmacy Board of Australia
   b the Pharmacy Board of Victoria
   c* the Podiatrists Board of Australia
   d the Podiatrists Board of Victoria
   e the relevant section of the SUSDP

2. An endorsed podiatrist may prescribe
   a one week’s supply of lorazepam tablets
   b* one week’s supply of temazepam tablets
   c one week’ supply of codeine phosphate 60 mg tablets
   d a once only dose of lorazepam for each procedure
   e a once only dose of codeine phosphate 60 mg tablet

3. In this case study for Ms Bennet, the appropriate number of Dalacin C capsules that should be dispensed by the pharmacist to fulfill the requirements of the prescription above would be
   a 6
   b 12
   c 18
   d 21
   e* 63

4. In this case study for Ms Bennet, she should be advised to take the
   a clindamycin capsules until the infection disappears
   b* clindamycin capsules until finished
   c Panadeine Forte until finished
   d clindamycin capsules at least half an hour before food
   e clindamycin capsules immediately after food

5. Clindamycin
   a is the antibiotic of first-choice for treating acute paronychia
   b* is used in treating antibiotic induced pseudomembranous colitis
   c is effective in treating Clostridium difficile infections
   d is the antibiotic of first-choice for treating acute paronychia in patients with delayed penicillin hypersensitivity
   e* is the antibiotic of first-choice for treating acute paronychia in patients with immediate penicillin hypersensitivity