



UNIVERSITY COLLEGE DUBLIN

An Coláiste Ollscoile Baile Átha Cliath

UCD SCHOOL OF NURSING, MIDWIFERY & HEALTH SYSTEMS

Scoil na hAltrachta, an Cnáimhseachais agus na gCoras Slainte

In partnership with the
Mater Misericordiae University Hospital
St Vincent's Healthcare Group



Medication Workbook for Year 1 BSc General Students

Student Name:

Student Number:

Introduction

This booklet has been developed as a tool to assist you in gaining knowledge of some commonly used medications in your practice placements in Stage 1. In trimester 1 of Stage 1 you will receive an introductory lecture to medication management and professional practice. This workbook will enable you to link theory to practice in relation to medication management. Medication management is an important aspect of your National Competency Assessment Document (NCAD) Assessment and the Domains and performance indicators specific to this area are detailed in the table below:

Table 1: Domains and Standards that pertain to Medication Management

Domain 1	Domain 2	Domain 3	Domain 4	Domain 5	Domain 6
1.1	2.1	3.1[c]*	4.1	5.1	6.1
1.3	2.2	3.2	4.2	5.2	6.2
	2.3 [f]*				
	2.4				

General Nursing Practice Placement

*2.3 [f] *Assists the Registered Nurse in the safe administration and management of medicines, in line with local policy*
3.1[c] *Is able to discuss clearly how medication calculations and management are carried out safely*

As a stage 1 nursing student (Novice) you will be exposed to the principles and practices of medication management as an active observer/participant. The full theoretical component of medication management will be taught in Stage 2 (Advanced Beginner). Following training in this practice placement you may be permitted to administer medication under direct supervision.

Signature Bank

Each registered nurse who acts as a Preceptor/Co-Preceptor for this student must sign this bank.

Preceptor/Co-preceptor Name (Print)	Signature	Preceptor/Co-Preceptor Initials	Ward/Area

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Learning Outcomes

During your Year 1 practice placements you should be able to:

- Summarise the Nursing and Midwifery Board of Ireland regulations in relation to medication management (Nursing and Midwifery Board of Ireland, 2020).
- Identify and explain the 10 'Rights' (R's) as per NMBI Guidance for Registered Nurses and Midwives on Medication Administration (NMBI, 2020).
- Describe the use of local policies and procedures for medication management (including controlled drugs).
- Demonstrate competent hand hygiene techniques (eg: hand washing; use of alcohol gel).
- Recognise how medications are prescribed (eg: on Medication Record, discharge prescription pad etc).
- Identify the steps involved in the administration of medication.
- Observe correct practice for checking right patient, right reason, right drug, right route, right time, right dose, right form, right form, right action, right documentation, right response double-checking of calculations and identification of patient/client and administration of medication (NMBI, 2020).
- Observe the calculation, preparation and **double checking** of medications including the identification of patients/clients and the administration of medications and identify rationale for this action.
- Recognise the different storage of medications.
- Identify a minimum of 3 different medications for each placement that are commonly used in the area and complete the workbook in relation to these medications.
- **Additional Learning Outcomes specific to this placement identified by the student/Preceptor:**

This workbook is to be completed during each Stage 1 placement.

The following explains the requirements for each section of the workbook that you are required to complete on each placement.

Medication Name	This refers to the approved (Generic) name of the medication, which is the name that must be used when the medication is prescribed
Brand/Trade Name	It is common to hear or see medications referred to by their brand name e.g. Panadol for paracetamol. It is important to be aware of the brand and generic name of medications
Medication Group	What group does the medication belong to? Is it an analgesic, anti-hypertensive, anti-pyretic, antibiotic?
Indication	Why is this medication used and for which condition and/or symptoms?
Dose	Doses may vary depending on weight, age, route used or the indications for use.
Route	How should the medication be administered e.g. orally, rectally, intravenously, inhalation, intramuscularly, subcutaneously
Frequency	How often should this medication be administered? What is meant by a 'regular prescription' and a prescription that is 'PRN'? Where possible include the maximum dose in a 24-hour period or highlight the differences in frequency depending on route used.
Peak Action/Duration of Action	For example, if analgesia has been administered, how long will it take to work and how long will it last in the patients/client's system?
Contraindications/Cautions	Important to identify contraindications
Side-Effects	When you know the side-effects, you can identify the reason quickly and prevent or manage the side-effect in an effective manner
Observed administration of medication	Indicate if you have been involved in observing the administration of the stated medication
Participate under direct supervision in preparation, calculation, administration and documentation of medication	Indicate if you have participated under direct supervision in the preparation, calculation, administration, and documentation of medication

The nurse who is administering the medicines must adhere to the ten rights of medication administration when administering medications to the patients in their practice placements (NMBI, 2020, pp-16). These are:

1. **Right Patient:** Be certain of the identity of the patient to whom the medicine is being administered by verifying the identification wristband, photograph or name and date of birth on the medicine chart.
2. **Right Reason:** Understand the intended purpose of the medicines to be administered.
3. **Right Drug:** Confirm that the name of the dispensed medicine to be administered corresponds with the generic or brand name of the prescribed medicine, and they must only administer a viable medicinal product – that is, properly packaged and within its expiry date. The nurse must also check, both by asking the patient and inspecting the allergy status box on the medicines chart, whether the patient has a known and recorded allergy to the prescribed drug or no known allergies. The allergy box must be completed.
4. **Right Route:** Administer the medicine via the prescribed anatomical route and site.
5. **Right Time:** Administer the medicine at the prescribed time and prescribed intervals.
6. **Right Dose:** Confirm, through arithmetical calculation that the dose of the medicine being administered concurs exactly with the dose prescribed. Where the local Policies, Procedures, Protocols and Guidelines (PPPGs) identify this process for high risk medicines, the dose must be independently verified.
7. **Right Form:** Confirm that the form of medicine that has been dispensed matches with the specified route of administration.
8. **Right Action:** Ensure the medicine is prescribed for the appropriate reason and state to the patient the action of the medicine and why it is prescribed.
9. **Right Documentation:** Sign, date and retain all documentation recording the administration of each medicine in the medicine's administration chart (or other document directing the administration of a medicine). The chart must only be signed to record a medicine has been administered once the medicine administration has been witnessed.
10. **Right Response:** Observe the patient for adverse effects and assess the patient to determine that the desired effect of the medicines has been achieved.

*The information you require can be obtained from a number of sources including: www.medicines.ie which contains accurate, up to date, regulator approved information on medicines available in Ireland (Medicines.ie), The Irish Medicines Formulary, British National Formulary, Hospital Formulary, the hospital/community pharmacist, doctors, nursing/midwifery colleagues, articles, local policies and guidelines and NMBI guidelines.



The Ten Rights of Medication Management



General Nursing Practice Placement 1

Medication Generic/Brand/ Trade Name	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindication/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
1.								

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
2.								

Medication Generic/Brand/ Trade Name	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ Cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
Choose medication related to specific clinical area								
3.								

Student Signature:

Preceptor Signature:

Date:

General Nursing Practice Placement 2

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ Cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
1.								

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
2.								

Medication Generic/Brand/Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/Route	Frequency	Peak Action/duration of action (If available)	Contraindications/cautions/Nursing Considerations	Side-effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
3.								

Student Signature:

Preceptor Signature:

Date:

General Nursing Practice Placement Additional Medications

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
1.								

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
2.								

Medication Generic/Brand/ Trade Name Choose medication related to specific clinical area	Medication Group and Indications	Dose/ Route	Frequency	Peak Action/ duration of action (If available)	Contraindications/ cautions/Nursing Considerations	Side- effects	Observed administration of medication	Participates preparation, calculation, administration and documentation of administered medication
3.								

Student Signature:

Preceptor Signature:

Date:

Suggested reading:

Berman, A. Synder, S. & Frandsen, G. (2021) *Kozier & Erb's fundamentals of Nursing: Concepts, Process and Practice*. 11th Ed., New Jersey: Pearson Prentice Hall.

Boyd, C. (2022), *Calculation skills for nurses*, 2nd Ed, Wiley Blackwell, Hoboken, NJ, USA.

Blair, K. (2015) *Medicines Management in Children's Nursing*, 2nd Ed., London: SAGE Publication Ltd

Hayes, C., Jackson, D., Davidson, P.M. & Power, T. (2015), "Medication errors in hospitals: a literature review of disruptions to nursing practice during medication administration", *Journal of clinical nursing*, 24, 21-22, pp. 3063-3076.

Health Information and Quality Authority (2015) *Medicines Management Guidance*. Dublin: Health Information and Quality Authority

Health Products Regulatory Authority (2022) *Safety Information*. Available online: <http://www.hpra.ie/homepage/medicines/safety-information>

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Latimer, S., Hewitt, J., Stanbrough, R. & McAndrew, R. (2017), "Reducing medication errors: Teaching strategies that increase nursing students' awareness of medication errors and their prevention", *Nurse education today*, 52, pp. 7-9.

Lister, S.E., Hofland, J., Grafton, H., Wilson, C. & Royal Marsden NHS Foundation Trust (2021), *The Royal Marsden manual of clinical nursing procedures*, 10th Ed, Wiley Blackwell, Chichester, West Sussex, UK.

Nursing and Midwifery Board of Ireland (2015) *Scope of Nursing and Midwifery Practice Framework*. Dublin: NMBI.

Nursing and Midwifery Board of Ireland (2020) *Guidance for Registered Nurses and Midwives on Medication Administration*. Available at: <https://www.nmbi.ie/Standards-Guidance/Medicines-Management> (Accessed 1st October 2024)

Starkings, S & Krause, L. (2021) *Passing Calculations Tests in Nursing*, 5th Ed., London: SAGE Publication Ltd.

Tiziani, A. (2016) *linical Cases: Drug Calculations Case Studies*, 1st Ed., Elsevier, Australia.

Useful websites

Nursing and Midwifery Board of Ireland (2020) Guidance for Registered Nurses and Midwives on Medication Administration. Available at: <https://www.nmbi.ie/Standards-Guidance/Medicines-Management> (Accessed 1st October 2024)

Online BNF available at: [medicinescomplete.com](https://www.medicinescomplete.com)

Dosagehelp.com (2018) Available online at: <http://www.dosagehelp.com/>
(Accessed: 1st October 2024)

Queens University Belfast, Numeracy Skills for Drug Calculations, Available at: <https://www.qub.ac.uk/elearning/public/NumeracySkillsforDrugCalculations/>
(Accessed: 1st October 2024)

Drug calculations quiz page ((2018) Available at: <http://www.testandcalc.com/quiz/index.asp>
(Accessed 1st October 2024)

World Health Organizations (2019) 5 Moments for medication <https://apps.who.int/iris/rest/bitstreams/1210432/retrieve>
(Accessed: 1st October 2024)