NU8202: Prescribing Medicinal Products & Ionising Radiation

Module Leader
Ms Valerie Small RGN, RNT, MSc. PG Dip CHSE. A&E Cert

Additional Lecturers
Mr Derek Brown (ANP)
Professor Patrick Plunkett
Ms Eileen Relihan (Pharmacist)
Dr Michael Meeney (Radiologist)
Ms Suzanne Dennan (Radiography Services Manager)
Mr Brendan McCoubry (Radiation Safety Officer)
Ms Una O Connor (Physicist)

ECTS
10 ECTS

Pre-requisite
Extensive experience in clinical practice.

Rationale and Aims
The introduction of nurse prescribing in Ireland is central to the expansion of nursing practice aimed at improving the overall care experience for patients and clients. Nurse prescribing ensures that ‘patients receive the right care from the right person in the right setting’ (Dept. of Health & Children, 2007). The aim of this module is to equip nurses with the necessary knowledge, skills, attitudes and competencies to prescribe medicinal products and ionising radiation safely and within their scope and field of practice.

Module Content
- Principles of the prescribing process.
- Professional responsibility.
- Role development/collaborative practice agreement.
- National and international legislation and regulation.
- Legal and ethical issues in prescribing medicinal products and ionising radiation.
- Radiation protection and safety; radiation and pregnancy; radiation protection techniques; adverse reactions and reporting adverse reactions.
- Ionising radiation theory: radiological sciences; principles of ionising radiation; radiation physics; radiation biology; imaging modalities;
- Pharmacology theory: pharmacokinetics; pharmacodynamics; contraindications; drug interactions; specific drug groups relevant to specialist area and scope of practice; lifespan considerations.

Learning Outcomes
On successful completion of this module, students should be able to:

1. Demonstrate a systematic understanding of the regulatory framework associated with prescribing, including the legislation and professional guidelines, supporting safe prescribing.
2. Critically utilise evidence based knowledge and skill of patient/client assessment and consultation to achieve a holistic approach to patient/client care in the prescribing of medicinal products and ionising radiation.
3. Apply expert skills in clinical decision making in relation to prescribing medicinal products and ionising radiation.
4. Demonstrate a critical understanding of pharmacotherapeutics, pharmacodynamics, pharmacokinetics and radiological sciences.
5. Demonstrate knowledge of the role of the multi-disciplinary team and effective communication processes involved in safe medication management and appropriate use of ionising radiation (X-Ray).

**Methods of Teaching and Student Learning:** Lecture/group discussion, Student-led discussion, e-learning, clinical practice.

<table>
<thead>
<tr>
<th>Methods of Assessment</th>
<th>Weighting</th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Ionising Radiation</td>
<td></td>
<td>Pass/Fail</td>
</tr>
<tr>
<td>Competency assessment</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Minimum of 10 episodes of prescribing ionising radiation</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Prescribed medication</td>
<td></td>
<td>Pass/Fail</td>
</tr>
<tr>
<td>MCQ</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Competency assessment</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Contact Hours**

| Direct Contact: Class and online (10 radiation 20 pharmacology) | 30 |
| Assessment Student Effort                                      | 10 |
| Specified Activities                                           | 10 |
| Self-Directed Learning                                         | 10 |
| Applied Practice                                               | 150|
| **Total Hours**                                                 | **210** |

**Indicative Resources** – *more detailed lists will be provided by module lecturers*

  Dublin, An Bord Altranais.


