

## CORPORATE AND ACADEMIC SERVICES

Part 1: Basic Data						
Module Title	Radiotherapy and Oncology Theory and Practice					
Module Code	UZYSWS-30-M		Level	М	Version 1	
Owning Faculty	Faculty of Health Sciences	n and Applied	Field	Allied Health Professions		
Contributes towards	MSc Radiotherapy and Oncology					
UWE Credit Rating	30	ECTS Credit Rating	15	Module Type	Professional Practice	
Pre-requisites	None		Co- requisites	None		
Excluded Combinations	UZYSGL-40-M Radiotherapy Technology and Oncology Practice		Module Entry requirements	None		
Valid From	January 2016		Valid to	January 2021		

## MODULE SPECIFICATION

CAP Approval Date	6 October 2015

	Part 2: Learning and Teaching		
Learning Outcomes	On successful completion of this module students will be able to:		
	<ol> <li>Apply oncological principles to tumours requiring more complex management strategies (Component A&amp;B)</li> </ol>		
	<ol> <li>Critically evaluate multi-modality treatment strategies for a range of malignancies in the management of the patient with cancer (Component A&amp;B)</li> </ol>		
	<ol> <li>Critically evaluate a range of imaging techniques performed in radiotherapy for localisation, planning and verification (Component A&amp;B)</li> </ol>		
	<ol> <li>Produce and evaluate treatment plans for common treatment sites (Component A)</li> </ol>		
	<ol> <li>Critically appraise the principles and applications of brachytherapy (Component B)</li> </ol>		
	<ol> <li>Critically evaluate the radiographers role in the context of the inter- professional team in the management of radiotherapy patients (Component A&amp;B)</li> </ol>		

	7. Analyse the radiographers role in health promotion and education demonstrating an understanding of the patient pathway for a range of conditions (Component A&B)
Syllabus Outline	<ul> <li>Treatment Management</li> <li>Oncological management of tumours that may require complex treatment strategies (e.g. malignancies of the head and neck and gynaecological system)</li> <li>Application of radiobiological principles in the administration of radiotherapy for standard and non-standard treatment strategies, including brachytherapy. Application of fractionation schedules and tolerance doses</li> <li>Pharmacology, cytotoxic chemotherapy and hormone therapy, applications in practice and current regimes.</li> <li>Radiotherapy Technique <ul> <li>Equipment design, function and role in localisation and verification techniques</li> <li>New developments in imaging modalities; evaluation of imaging systems and protocols</li> <li>Multifield isocentric techniques and dosimetry of specific malignancies</li> <li>Principles, techniques, clinical applications and dosimetry of brachytherapy</li> <li>Superficial (including electron and photon) techniques and dosimetry</li> </ul> </li> <li>Quality control principles <ul> <li>Treatment room design and radiation protection</li> <li>Patient immobilisation and consideration of tumour mobility</li> <li>Error management and quality assurance systems in radiotherapy.</li> <li>The role of the radiographer within the healthcare team. Interprofessional relationships, communication and team working, extended roles. Professional boundaries and accountability, patient perspectives.</li> </ul> </li> <li>Professional portfolio to include evidence of: management of a wide variety of patients with cancer from the pre-treatment stage to radiotherapy delivery; adoption of appropriate professional and ethical behaviour; application of current radiation regulations, health and safety policies and guidelines for practice.</li> </ul>
Contact Hours	This module contains a professional practice component, 150 notional hours are allocated to the academic theory content. This module will be timetabled over 11 weeks (theory only, not practice) and will include 6 hours a week of delivery which will be a mixed approach of small group practical sessions using VERT and the radiotherapy computer planning system, lectures and seminars.

	In addition to this, blending learning is key to the success of learning for this module and independent study will be needed to be completed. This will be approximately 84 hours.          Placement         Prior to placement there is the delivery of clinical documentation (including Professional code of conduct) and clinical skills sessions (e.g. Basic Life Support and Manual Handling). Whilst on placement there are support visits by
	Students will be informed prior to placement if they are required to go for a
	Students will be informed prior to placement if they are required to go for a period of time during the placement to another clinical site. This is to ensure they gain the breadth of experience needed for assessment of competency. Students are expected to attend a desirable minimum of 90% of clinical practice time and an absolute minimum of 80% of clinical practice time as stipulated by The Society and College of Padiographers in order to meet
	professional requirements satisfactorily. https://www.sor.org/learning/document-library/student-radiographer- attendance-management-guidelines/student-radiographer-attendance- management (members only access).
Learning Learning Methods	<b>Scheduled learning</b> includes lectures, discussion groups, practical sessions on the VERT system and student led presentations. Formative assessment and feedback related to the assessment component will consist of group based discussions on the seen questions (assessment Component B).
	<b>Independent learning</b> includes hours engaged with essential reading, interactive online learning materials, assessment preparation and revision. Students will have opportunity to gather evidence whilst on clinical practice to help support their learning for the summative assessment.
	<b>Placement learning</b> involves rotating around a number of radiotherapy areas (please see placement documentation) undertaking approximately 472.5 hours clinical time. Bank holidays occur during this time period and therefore no half days will be taken during these weeks in order to increase clinical time. Clinical competencies are assessed by qualified Practice Educators within a Radiotherapy department.
Key Information Sets Information	Key Information Sets (KIS) are produced at programme level for all programmes that this module contributes to, which is a requirement set by HESA/HEFCE. KIS are comparable sets of standardised information about undergraduate courses allowing prospective students to compare and contrast between programmes they are interested in applying for.

	Key Infor	mation Set - Mo	odule data			
	Number	of credits for this	module		30	
	Hours to be allocated	Scheduled learning and teaching study hours	Independent study hours	Placement study hours	Allocated Hours	
	300	66	84	472.5	622.5	8
	The table belo constitutes a - Written Exam	w indicates as a	a percentage t xam	he total asses	sment of the	module wh
	Please note th necessarily re of this module	at this is the tot lect the compo description:	al of various ty nent and modu	vpes of assessule weightings	sment and wi	ill not ssment secti
		Total assessm	ent of the mod	ule:		
		Written exam as	seesement no	rcontago	E0%	_
		Portfolio asses	sment percent	tage	50%	_
		Practical exam	assessmentp	percentage	0%	
					100%	
eading rategy	Core readin Any core rea accessing it, given a study or in the Libr carried out.	<b>g</b> ding will be ind e.g. students i v pack or be re ary. Module gu	dicated clearl may be expe ferred to text uides will also	y, along with cted to purch is that are av preflect the r	the method nase a set te railable elec range of rea	d for ext, be tronically, ding to be
	Further read	ling				
	All students a variety of bib Many resour- authors and module hand expected to b	are encourage liographic and ces can be acc ournal titles av book and upd eflect the rang	d to read wid full text data cessed remotivailable throu ated annually ge of reading	ely using the bases and ir tely. Guidand Igh the Libra /. Assignmer carried out.	e library sea nternet reso ce to some l ry will be giv nt reference	rch, a urces. key ven in the lists are
	Access and	skills				
	Students are reading base science/heal	expected to b d on their tran h related degr	e able to ide sferable skill ee. However	ntify and retr s learnt from r, this module	ieve approp the previou e offers an c	riate Is opportunity

	to further consolidate their information skills. Students will be given the opportunity to attend library sessions on areas they require additional support with such as using appropriate databases and search skills. Online support is available through the library web pages, including interactive tutorials on finding books and journals, evaluating information and referencing.
Indicative Reading List	The following list is offered to provide validation panels/accrediting bodies with an indication of the type and level of information students may be expected to consult. As such, its currency may change during the life span of the module specification. Current advice on additional reading will be available via the module handbook or Blackboard pages. Cancer Research UK (2014) <i>CancerStats: Cancer statistics for the UK.</i> Available from: http://www.cancerresearchuk.org/cancer-info/cancerstats/. [Accessed 15 September 2014] College of Radiographers (2013) <i>Code of Professional Conduct.</i> Available from: http://www.sor.org/learning/document-library/code-professional-conduct [Accessed 15 September 2014] Department Of Health (2012) <i>Radiotherapy Services in England.</i> Available from: https://www.gov.uk/government/publications/radiotherapy-services-in- england-2012. [Accessed 15 September 2014] Department Of Health (2012) <i>Improving Outcomes: A strategy for cancer.</i> Available from: https://www.gov.uk/government/publications/improving- outcomes-a-strategy-for-cancer. [Accessed 15 September 2014] Health and Care Professions Council (20012) <i>Standards of Conduct,</i> <i>Performance and Ethics.</i> Available from: http://www.hcpc- uk.org.uk/aboutregistration/standards/standardsofconductperformanceandethi cs/index.asp. [Accessed 15 September 2014] Hoskins, P. (2012) <i>Radiotherapy in Practice: External Beam Therapy</i> [online] 2 <sup>nd</sup> ed. Oxford: Oxford University Press. [Accessed 15 September 2014] O'Toole, G. (2012) <i>Communication: core interpersonal skills for health</i> <i>professionals,</i> Elsevier, London. Symonds, P. and Walter, J. (2012) <i>Walter and Miller's Textbook of</i> <i>Radiotherapy</i> [online] London: Churchill Livingstone. [Accessed 15 September 2014]

	Part 3: Assessment
Assessment Strategy	Component A: To consist of a portfolio of critically evaluative case studies and prescribed clinical competencies based on the Society

and College of Radiographers (SCOR) Education Framework and Health and Care Professions Council (HCPC) Standards of Proficiency for Radiographers. The critically evaluative case studies are undertaken as identified in the practice assessment document.
Rationale: An opportunity for the student to demonstrate clinical competence in line with the requirements of the SCOR Education Framework and HCPC Standards of Proficiency for Radiographers, through formative and summative assessment. These competencies build upon the previous objectives in placement 1 to ensure the students have gained proficiency in all areas to the required standard. The portfolio is assessed in practice and marked as pass / fail as students need to meet a minimum requirement to practice safely at this level. The academic team will oversee the marking of the clinical evaluations of the case studies. There is opportunity for students to receive formative feedback throughout the placement.
Component B assesses the theoretical principles and by having seen exam questions, the students can use their critical reading and writing skills to develop detailed discussions.
During the theory part of this module, students will be undertaking formative assessment in the form of a wiki. This will incorporate anatomy, oncology and technical aspects of the module. The students will get an opportunity to present this to their peers and receive feedback. They will also continue their portfolio of evidence of practical skills related to radiotherapy computerised/ dosimetry planning which was started in the first module - Science and Technology in Radiotherapy.

Identify final assessment component and element	А		
% weighting between components A and B (Star	ndard modules only)	A:	B:
First Sit			
Component A (controlled conditions) Description of each element		Element v (as % of co	weighting omponent)
1. Clinical Portfolio		Pass	s/Fail
Component B Description of each element		Element v (as % of co	weighting omponent)
1. Seen written exam (2hrs)		1(	00

Resit (further attendance at taught classes is not required)			
Component A (controlled conditions) Element weighting			
Description of each element	(as % of component)		
1. 1. Clinical Portfolio	Pass/Fail		
Component B	Element weighting		
Description of each element	(as % of component)		

1. 1.	Seen written exam (2hrs)	100

If a student is permitted an **EXCEPTIONAL RETAKE** of the module the assessment will be that indicated by the Module Description at the time that retake commences.