

FACULTY OF OCCUPATIONAL MEDICINE

ROYAL COLLEGE OF PHYSICIANS OF IRELAND

HIGHER SPECIALIST TRAINING IN OCCUPATIONAL MEDICINE

OUTCOME-BASED EDUCATION - OBE CURRICULUM



This Curriculum of Higher Specialist Training in Occupational Medicine was developed in 2023 by a working group led by Dr Fiona Kevitt, National Specialty Director, and the RCPI Education Department. The Curriculum undergoes an annual review process by the National Specialty Director and the RCPI Education Department. The Curriculum is approved by the Specialty Training Committee and the Faculty of Occupational Medicine.

Version	Date Published	Last Edited By	Version Comments
1.0	01 July 2024	Stephen Capper	New OBE Curriculum

National Specialty Director's Foreword

The Occupational Medicine HST Programme aims to deliver Specialists in Occupational Medicine with a broad range of clinical and academic skills. This curriculum is designed to produce well-rounded graduates with the ability to

Assess and advise on all common Occupational presentations while supporting the development of subspecialty expertise and academic interests.

The Outcome Based Education (OBE) project concerns the transition of the current minimum requirements model of the Occupational Medicine curriculum and training across to OBE which is more in line with other countries in Europe and the US. It is also one of the key initiatives of the RCPI's Strategic Plan 2021 – 2024 which aims to enhance the quality of Ireland's BST and HST training programmes to ensure they are aligned with international best practices and standards. It is also a recommendation of the Medical Council. This will involve a considerable change to both the structure and assessment of the curriculum and as such requires input from multiple stakeholders to ensure that any changes are valid and robust.

The revision project was led by the NSD, with support from the Education Specialists in RCPI. The existing curriculum was pared back to 6 main training goals, with a number of outcomes in each training goal. The 6 training goals were identified as: 1. Assessment and Management of Occupational Hazards to Health, 2. Occupational Toxicology, Chemical and Biological Hazards to Health, 3. Management and Leadership, 4. Ergonomics, Health Promotion and Organisational Psychology, 5. Research and Evidence Based Practice, and 6. Occupational Medicine Law and Ethics

Once the draft revision was complete, a workshop was held with trainers and the SpR representative. This took place on 11th November 2023, and all feedback was incorporated into the draft document. A number of trainers took away agreed sections of the curriculum and produced draft outcomes for a number of areas. Again, these were incorporated into the draft document, after being edited to meet the OBE structure.

A final draft was then sent to all trainers, with any further feedback being incorporated into the final document.

We would like to thank all the trainers and trainees that took part in this process, as well as the Education Specialists, without whose support this project would have been much more onerous.

	Contents nal Specialty Director's Foreword	1
	RODUCTION	
1.1.	Purpose of Training	4
1.2.	Purpose of the Curriculum	4
1.3.	How to use the Curriculum	4
1.4.	Reference to rules and regulations	5
1.5	Overview of Curriculum Sections and Training Goals	6
2. EXP	PECTED EXPERIENCE	7
2.1.	Duration and Organisation of Training	8
2.2.	Clinics and Training activities	10
2.3.	Participation in learning and In-house Activities	12
2.4.	Research, Audit and Teaching experiences	12
2.5.	Teaching attendance	12
2.6.	Evaluations, Examinations and Assessments	12
2.7.	Summary of Expected Experience	14
3. CO	RE PROFESSIONAL SKILLS	16
Partn	ership	17
Perfo	rmance	18
Practi	се	19
4. SPE	CIALTY SECTION – OCCUPATIONAL MEDICINE TRAINING GOALS	20
Traini	ng Goal 1 – Assessment and Management of Occupational Hazards to Health	21
Traini	ng Goal 2 – Occupational Toxicology, Chemical and Biological Hazards to Health	23
	ng Goal 3 – Management and Leadership	
Traini	ng Goal 4 – Ergonomics, Health Promotion and Organisational Psychology	27
Traini	ng Goal 5 – Research and Evidence Based Practice	29
	ng Goal 6 – Occupational Medicine Law and Ethics	
	PENDICES	
	/ENT APPENDIX	
	ce-Based Assessment and Evaluations	
Specia	alty-Specific Examination	35
	IG APPENDIX	
	Faught Programme	
	alty-Specific Learning Activities (Courses & Workshops)	
	Days	
Occup	pational Medicine Teaching Attendance Requirements	

1. INTRODUCTION

This section includes an overview of the Higher Specialist Training programme and of this Curriculum document.

1.1. Purpose of Training

This programme is designed to provide the training and professional development necessary to work as a Specialist in Occupational Medicine, one capable of dealing with the impact of health on work, the effect of work on health, prevention of occupational injury and disease and the promotion of health, safety, and welfare in the work environment. This is achieved by providing Occupational Medicine training in approved training posts, under the supervision of certified trainers, in order to satisfy the outcomes listed in the Curriculum. Each post provides a trainee with a named trainer and the programme is under the direction of the National Specialty Director for Occupational Medicine.

1.2. Purpose of the Curriculum

The purpose of the Curriculum is to guide the trainee towards achieving the educational outcomes necessary to function as an independent Specialist in Occupational Medicine. The Curriculum defines the relevant processes, content, outcomes, and requirements to be achieved. It stipulates the overarching goals, outcomes, expected learning experiences, instructional resources and assessments that comprise the Higher Specialist Training (HST) programme. It provides a framework for certifying successful completion of HST programme.

In keeping with developments in medical education and to ensure alignment with international best practice and standards, the Royal College of Physicians (RCPI) have implemented an Outcomes Based Education (OBE) approach. This Curriculum design differs from traditional "minimum requirement" designs in that the learning process and desired end-product of training (outcomes) are at the forefront of the design to provide the essential training opportunities and experiences to achieve those outcomes.

1.3. How to use the Curriculum

Trainees and Trainers should use the Curriculum as a basis for goal-setting meetings, delivering feedback, and completing assessments, including appraisal processes (Quarterly Assessments/End of Post Assessment, End of Year Evaluation). Therefore, it is expected that both Trainees and Trainers familiarise themselves with the Curriculum and have a good working knowledge of it.

Trainees are expected to use the Curriculum as a blueprint for their training and record specific feedback, assessments, and training events on ePortfolio. The ePortfolio should be updated frequently during each training placement.

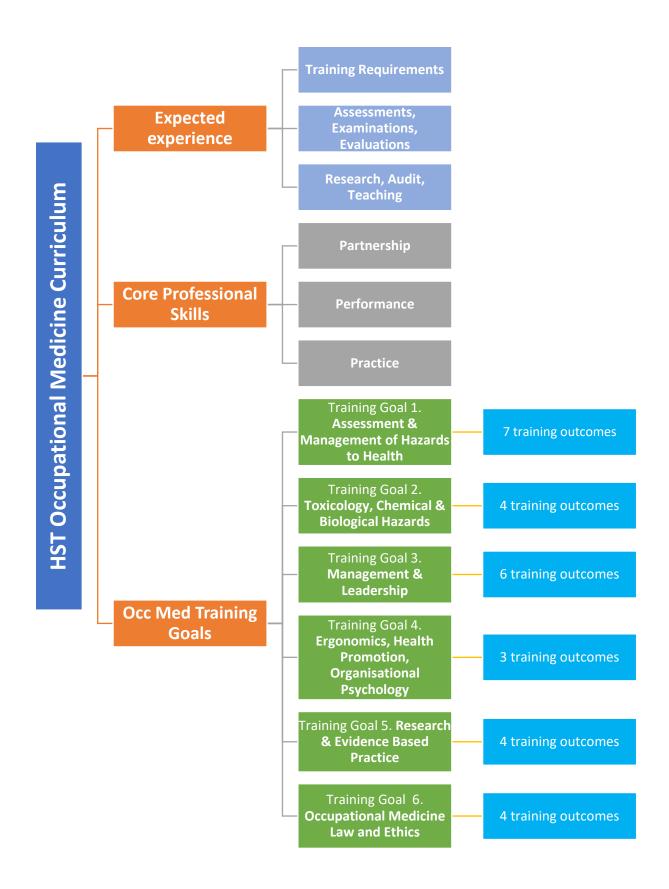
It is important to note that ePortfolio is a digital repository designed to reflect Curriculum requirements. It facilitates recording of progress through HST and evidence that training is valid and appropriate. While a complete ePortfolio is essential for HST certification, Trainees and Trainers should always refer to the Curriculum in the first instance for information on the requirements of the training programme.

Please note: It is the responsibility of the Trainee to keep an up-to-date ePortfolio throughout the programme as it reflects their individual training experience and it documents that they have successfully met training standards as expected by the Medical Council.

1.4. Reference to rules and regulations

Please refer to the following sections within the Occupational Medicine HST Training Handbook for rules and regulations associated with this post. Policies, procedures, relevant documents, and Training Handbooks can be accessed on the RCPI website following <u>this link</u>.

1.5 Overview of Curriculum Sections and Training Goals



2. EXPECTED EXPERIENCE

This section details the training experience and the service provision tasks that all Trainees are expected to complete throughout the Higher Specialist Training.

2.1. Duration and Organisation of Training

The duration of HST in Occupational Medicine is four years full time equivalent. Up to one year of research, or time spent in academic training, may be a constituent part of the four-year programme, provided that the content is relevant to Occupational Medicine. Each post within the programme to which the trainee is appointed will have a named supervisor/trainer. HST programmes will be under the supervision of the National Specialty Director for Occupational Medicine.

Core training: The four-year training programme should contain the following:

• A minimum of 18 months in an industrial sector (i.e., heavy, and light industry, engineering, electronics, manufacturing, pharmaceutical, chemical, transport etc.).

• A minimum of 1 year in the service sector (i.e., healthcare, financial services, insurance, office environment etc) and must include experience in the health service.

The occupational health units which provide training posts must be recognised by the Faculty of Occupational Medicine and ICHMT as suitable for HST. Trainees will be required to have work experience in units that offer a wide range of exposure to the various elements of the training curriculum for Occupational Medicine.

Time spent in overseas training posts in Occupational Medicine outside Ireland may be recognised provided that such posts and the content of the training and level of supervision they provide meets the requirements for HST as required by the Faculty of Occupational Medicine and ICHMT and prospective approval has been sought to undertake such training. Three out of five days training, at a minimum, will be spent at the occupational health unit and on-site visits and assessments. The remaining time will be dedicated to FOM/ICHMT approved attachments. All time spent out of the training practice must be agreed in advance with the trainer. Any time in excess of the three days minimum, for which attachments have not been arranged, must be spent in the training practice. The SpR is normally expected to have 1 half day per week, outside of the 3-day practice minimum, as protected time during which they should not be rostered. This is to allow time for personal study and will be considered part of the SpR's educational leave entitlement. It is recommended that a 2nd half day per week be allocated to the pursuit of formal research which will usually be conducted in the unit.

The trainee is encouraged to sit the examination of Licentiate of the Faculty of Occupational Medicine (LFOM) of the Royal College of Physicians of Ireland (RCPI) at the end of year two. The trainee will normally be expected by the end of year 3 to have attained the Diploma of Membership of the Faculty of Occupational Medicine (MFOM) of the RCPI enabling them to demonstrate that they have a broad understanding of occupational medical issues and their application in practice.

Trainees <u>must</u> spend the first two years of training in HST clinical posts in Ireland. The programme aims to be flexible in terms of sequence of training after this time. The first two years are directed towards acquiring a broad general experience of Occupational Medicine under appropriate supervision. An increase in the content of hands-on experience follows naturally and, as confidence is gained and abilities are acquired, the trainee will be encouraged to assume a greater degree of responsibility and independence.

Out of Clinical Programme Experience (OCPE): Trainees can undertake one, or more years out of their HST programme to pursue research, further education, special clinical training, lecturing experience, or other relevant experiences.

OCPE must be preapproved, and retrospective credit cannot be applied.

It must be noted that even if trainees can undertake more than one year to complete their OCPE of choice, RCPI would award a maximum of 12 months of training credits towards the achievement of CSCST. In certain circumstances, RCPI may award no credits. The decision of whether to award credits for one year may differ from specialty to specialty and it is discretionary by the NSDs of each respective specialty.

For more information on OCPE, please refer to the RCPI website (<u>here</u>).

Training Principles: During the period of training the trainee must take increasing responsibility for seeing patients, making decisions, and operating at a level of responsibility which would prepare him/her for practice as an independent Specialist. New patients should be seen throughout the training period under suitable supervision and the consultant trainer should review consultations directly with the trainee. Supervision should be particularly close during the first one or two years. Over the course of HST, Trainees are expected to gain experience in a variety of settings, including regional posts. At the start of each post, fill out a Personal Goals form with their trainer and upload it on ePortfolio; the form should be agreed and signed by both Trainee & Trainer.

Core Professional Skills: Generic knowledge, skills and attitudes support competencies that are common to good medical practice in all of the medical and related specialties. It is intended that all Trainees should re-affirm those competencies during Higher Specialist Training. No timescale of acquisition is imposed, but failure to make progress towards meeting these important objectives at an early stage would cause concern about a Trainee's suitability and ability to become an independent specialist.

Recording of Evidence of training: The target numbers for training items in the following sections represent the recording requirement to document evidence of relevant and varied clinical experience; it is understood that actual number of training experiences is likely to be well in excess of these numbers.

2.2. Clinics and Training activities

Attendance at Occupational Health Clinics are required elements of all posts throughout the programme. The timetable and frequency of attendance should be agreed with the assigned trainer at the beginning of the post.

This table provides an overview of the expected experience a Specialist Registrar in Occupational Medicine should gain regarding clinics attendance, and other training activities. All these activities should be recorded on ePortfolio using the respective form.

The numbers specified in the table are indicative and should provide the Trainee with an indication of frequency for each training activity. The Trainee is recommended to exceed these numbers and to seek advice from their Trainer to agree the frequency to their training requirements.

CLINICS		
Clinic	Expected Experience	ePortfolio Form
General Occupational Medicine Specialised Occupational Medicine Clinics e.g., including but not limited to: • Aviation Medicine • Diving Medicine • Occupational Dermatology • Occupational Respiratory Medicine • Occupational Musculoskeletal Disorders	Attend at least 5 per week, record attendance Attend at least 1 per week where possible and as agreed with Trainer, record attendance	Clinics
PROCE	DURES, PRACTICAL/SURGICAL SKILLS	I
Туре	Expected Experience & DOPS	ePortfolio Form
Keystone vision test Spirometry	Record at least 2 over the course of HST, and at least 1 DOPS assessment over the course of HST Record at least 2 over the course of HST, and at least 1 DOPS assessment over the course of HST Record at least 2 over the course of HST, and at least 1 DOPS assessment over the course	
Audiometry Drug testing procedures, chain of custody etc Breath Test for Alcohol	of HST Record at least 2 over the course of HST, and at least 1 DOPS assessment over the course of HST Record at least 2 over the course of HST, and at least 1 DOPS assessment over the course of HST	Procedures, Skills & DOPS
Immunisation	Record at least 2 over the course of HST	
Use of HADS or similar tools	Record at least 2 over the course of HST	
Observe a training event	Record at least 2 over the course of HST	
Ergonomic assessment of workstation	Record at least 2 over the course of HST	

CASES			
Туре	Expected Experience	ePortfolio Form	
Record a range of	Record at least 4 over the course of HST	Cases	
chronic/unusual/long term cases			
MANAGEMENT/ENVIRONMENTAL/HEALTH POMOTION/MISCELLANEOUS			
Туре	Expected Experience	ePortfolio Form	
Design protocol for biological	Record at least 1 over the course of HST		
monitoring programme			
Develop a standard operating	Record at least 1 over the course of HST		
procedure (SOP)			
Presentation on an aspect of health	Record at least 1 over the course of HST	Policies and	
promotion		Guidelines	
Design and deliver a training event	Record at least 1 over the course of HST		
	Record at least 1 over the course of HST		
Update a departmental policy			
INDUSTRIAL ATTENDANCES/WORKSITE VISITS/SPECIAL CASES			
Туре	Expected Experience	ePortfolio Form	
Work site visits	Record at least 20 over the course of HST	Clinical and Other	
Effect of work on health	Record at least 1 over the course of HST	liaisons	
Effect of health on work	Record at least 5 over the course of HST		
MANAGEMENT EXPERIENCE			
Туре	Expected Experience	ePortfolio Form	
Management Experience	Record at least 1 over the course of HST	Management	
	(Desirable)	Experience	

2.3. Participation in learning and In-house Activities

Trainees are expected to attend a series of in-house commitments as follows:

- Attend Grand Rounds where available over the course of HST
- Attend at least 1 Journal Club per month per each year of HST
- Attend Departmental Meetings as scheduled over the course of HST
- Attend and participate in a variety of learning experiences including but not limited to seminars, lectures, case discussions, case conferences etc... (1 per month over the course of HST)

2.4. Research, Audit and Teaching experiences

Trainees are expected to complete the following activities:

- Engage in **Teaching opportunities where possible** (to include tutorials, lectures, presentations, workplace sessions, etc.) per each year of HST
- Complete 1 Audit or Quality Improvement Project, per each year of HST
- Attend **1 National or International Meeting** (FOM, ISOM, RCPI) per each year of HST
- Deliver **1** Oral presentation or Poster / **1** research project and/or **1** publication over the course of HST

In addition, it is desirable, but not expected that Trainees attempt to:

- Complete, 1 research project and/or 1 publication over the course of HST
- Attend **Committee Meetings** over the course of HST
- Pursue additional qualification relevant to Occupational Medicine over the course of HST

2.5. Teaching attendance

Trainees are expected to attend the majority of the courses and study days as detailed in the <u>Teaching Appendix</u>, at the end of this document.

2.6. Evaluations, Examinations and Assessments

Trainees are expected to:

- Complete personal goals evaluation at the start of each clinical training year, targeting training opportunities that are available at each clinical site, and focusing on personal development and completion of ePortfolio.
- Complete 4 quarterly assessments per training year (1 assessment per quarter)
- Complete **1 end of post evaluation at the end of each post** (this can replace the quarterly assessment in happening at the end of a post)
- Complete 1 end of year evaluation at the end of each training year
- Successfully pass both the Licentiate of Faculty of Occupational Medicine (LFOM) and Membership of Faculty of Occupational Medicine (MFOM) Examinations. You should aim

to sit the LFOM at the end of your second year of HST and you are expected to obtain the MFOM by the end of your third year.

• Complete all the **workplace-based assessments** as appropriate, and as agreed with Trainer. It is recommended to **record at least 1 WBA** (CBD, MiniCEX, or DOPS) **per quarter** to be reviewed at the Quarterly Assessment.

For more information on evaluations, assessment, and examinations, please refer to the <u>Assessment</u> <u>Appendix</u> at the end of this document.

2.7. Summary of Expected Experience

Experience Type	Trainee is expected to	ePortfolio form
Rotation Requirements	Complete all requirements related to the posts agreed	n/a
Personal Goals	At the start of each post complete a Personal Goals form on ePortfolio, agreed with Trainer and signed by both Trainee & Trainer	Personal Goals
Clinics	Attend Occupational Medicine Outpatient and Subspecialty Clinics as indicated above and as agreed with Trainer. Record attendance per each post on ePortfolio	Clinics
Complicated/Chronic/Unusual Cases	Gain experience in complicated cases as indicated above an as agreed with Trainer. Record cases on ePortfolio	Cases
Procedures, Practical/Surgical Skills	Gain experience in procedural, practical skills as indicated above an as agreed with Trainer. Record experience on ePortfolio	Procedures, Skills & DOPS
Additional/Special Experience	Gain additional/special experience as indicated above an as agreed with Trainer. Record cases on ePortfolio	Cases
Management Experience	Gain experience in clinical management and leadership functions as agreed with Trainer. Record attendance per each post on ePortfolio	Management Experience
Deliver Teaching	Record on ePortfolio episodes where you have delivered a range of teaching, including but not limited to, tutorials, lectures, presentations, worksite sessions, etc	Delivery of Teaching
Research	Desirable Experience: actively participate in research, seek to publish a paper and present research at conferences or national/international meetings	Research Activities
Publication	Desirable Experience: complete 1 publication during the training programme	Additional Professional Activities
Presentation	Deliver 1 oral presentation or poster over the course of HST.	Additional Professional Activities
Audit	Complete and report on 1 audit or Quality Improvement (QI) Project per each year of training, either to start, continue or complete	Audit and QI
Attendance at Hospital Based Learning	Attend Grand Rounds where available. Attend MDT/Departmental Meetings/Journals Clubs and record appropriately	Attendance at Hospital Based Learning
National/International Meetings	Attend 1 per year of training. Record attendance on ePortfolio	Additional Professional Activities
Teaching Attendance	Attend courses and Study Days as detailed in the <u>Teaching Appendix</u> . Record attendance on ePortfolio	Teaching Attendance
Workplace-based Assessments	Complete all the workplace-based assessments as outlined above and as agreed with Trainer. Aim to	CBD/DOPS/Mini- CEX

	complete 1 WBA per quarter. Record respective form on ePortfolio	
Examinations	Successfully complete both the LFOM & MFOM examinations.	Examinations
Quarterly and/or End-of-Post Evaluations	Complete a Quarterly Assessment/End of post assessment with Trainer 4 times in each year. Discuss progress and complete the form	Quarterly Assessments/End- of-Post Assessments
End of Year Evaluation	Prepare for the End of Year Evaluation by ensuring the portfolio is up to date and the End of Year Evaluation form is initiated with the assigned Trainer	End of Year Evaluation

3. CORE PROFESSIONAL SKILLS

This section includes the Medical Council guidelines for medical professional conduct, regarding Partnership, Performance and Practice.

These principles are woven within training practice and feedback is formally provided in the Quarterly Evaluations, End of Post, End Year Evaluation.

Partnership

Communication and interpersonal skills

- Facilitate the exchange of information, be considerate of the interpersonal and group dynamics, and have a respectful and honest approach
- Engage with patients and colleagues in a respectful manner
- Actively listen to the thoughts, concerns, and opinions of others
- Consider data protection, duty of care and appropriate modes of communication when exchanging information with others

Collaboration

- Collaborate with patients, their families, and colleagues to work in the best interest of the patient, for improved services and to create a positive working environment
- Work cooperatively with colleagues and team members to deliver an excellent standard of care
- Seek to build trust and mutual respect with patients
- Appropriately share knowledge and information, in compliance with GDPR guidelines
- Take on-board available, relevant feedback

Health Promotion

- Communicate and facilitate discussion around the effect of lifestyle factors on health and promote the ethical practice of evidence-based medicine
- Seek up-to-date evidence on lifestyle factors that:
 - o negatively impact health outcomes
 - o increase risk of illness
 - positively impact health and decrease risk factors
- Actively promote good health practices with patients individually and collectively

Caring for patients

- Take into consideration patient's individuality, personal preferences, goals, and the need to provide compassionate and dignified care
- Be familiar with
 - Ethical guidelines
 - o Local and national clinical care guidelines
- Act in the patient's best interest
- Engage in shared decision-making and discuss consent

Performance

Patient safety and ethical practice

- Put the interest of the patient first in decisions and actions
- React in a timely manner to issues identified that may negatively impact the patient's outcome
- Follow safe working practices that impact patient's safety
- Understand ethical practice and the medical council guidelines
- Support a culture of open disclosure and risk reporting
- Be aware of the risk of abuse, social, physical, financial, and otherwise, to vulnerable persons

Organisational behaviour and leadership

- The activities, personnel and resources that impact the functioning of the team, hospital, and health care system
- Understand and work within management systems
- Know the impacts of resources and necessary management
- Demonstrate proficient self-management

Wellbeing

- Be responsible for own well-being and health and its potential impact on the provision of clinical care and patient outcomes
- Be aware of signs of poor health and well-being
- Be cognisant of the risk to patient safety related to poor health and well-being of self and colleagues
- Manage and sustain own's physical and mental well-being

Practice

Continuing competence and lifelong learning

- Continually seek to learn, improve clinical skills and understand established and emerging theories in the practice of medicine
- Meet career requirements including those of the medical council, employer, and training body
- Be able to identify and optimise teaching opportunities in the workplace and other professional environments
- Develop and deliver teaching using appropriate methods for the environment and target audience

Reflective practice and self-awareness

- Bring awareness to actions and decisions and engage in critical appraisal of own's work to drive lifelong learning and improve practice
- Pay critical attention to the practical values and theories which inform everyday practice
- Be aware of own's level of practice and learning needs
- Evaluate and appraise decisions and actions with consideration as to what you would change in the future
- Seek to role model good professional practice within the health service

Quality assurance and improvement

- Seek opportunities to promote excellence and improvements in clinical care through the audit of practice, active engagement in and the application of clinical research and the dissemination of knowledge at all levels and across teams
- Gain knowledge of quality improvement methodology
- Follow best practices in patient safety
- Conduct ethical and reproducible research

4. SPECIALTY SECTION – OCCUPATIONAL MEDICINE TRAINING GOALS

This section includes the Occupational Medicine Training Goals that the Trainee should achieve by the end of the Higher Specialist Training.

Each Training Goal is broken down into specific and measurable Training Outcomes.

Under each Outcome there is an indication of the **recommended** training/learning opportunities and assessment methods.

In order to achieve the Outcomes, it is recommended to agree the most appropriate training and assessment methods with the assigned Trainer.

Training Goal 1 – Assessment and Management of Occupational Hazards to Health

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate competence in the assessment and management of common presentations of Occupational Health Disorders.

OUTCOME 1 – HISTORY TAKING

A Trainee should be able to obtain and collate a comprehensive clinical history including detailed occupational history, and examination where indicated, of common presentations to Occupational Health.

Assessment/learning opportunities

- Clinics attendance
- Feedback Opportunity
- Case Based Discussion (CBD) or Mini-CEX, as appropriate and as agreed with Trainer
- OSPE section of Membership of Faculty of Occupational Medicine (MFOM) Exam

OUTCOME 2 – OCCUPATIONAL MEDICINE REPORT WRITING

A Trainee should be able to construct a report to management considering confidentiality issues particular to Occupational Medicine.

Assessment/learning opportunities

- Feedback Opportunity
- Review of reports to management with trainer-trainee feedback, "SAILs" (Sheffield Assessment Instrument for Letters)
- OSPE section of MFOM Exam

OUTCOME 3 – ASSESSMENTS OF WORK ENVIRONMENT

A Trainee should be able to identify when a work site visit is indicated, conduct a work site visit and writing up a report following same, with relevant recommendations to management.

Assessment/learning opportunities

- Work site visits
- Feedback Opportunity
- Trainer-trainee feedback on work site visit reports
- Workplace Projects section of MFOM Portfolio Exam

OUTCOME 4 – CLINICAL INVESTIGATIONS IN OCCUPATIONAL MEDICINE

A Trainee should be able to identify relevant investigations, indications for same, and the ability to interpret the results and implications of these results, including informed consent. Clinical investigations to include but not limited to Spirometry, Audiometry, Vision (including colour vision), serology (vaccinations and IGRA), Chest X-Ray, Drug and Alcohol testing, (including Chain of Custody).

- Clinics attendance
- Feedback Opportunity
- DOPS, as appropriate and as agreed with Trainer
- MRO (Medical Review Officer) study day

- Spirometry and audiometry study day
- RCPI HST Ethics in Occupational Medicine programme
- OSPE section of MFOM Exam

OUTCOME 5 – FORMULATING A RETURN TO WORK / REHABILITATION PLAN

A Trainee should be able to formulate a return to work/rehabilitation plan, considering Occupational Health Law and Ethics.

Assessment/learning opportunities

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- RCPI HST Ethics in Occupational Medicine programme
- Clinical cases section of MFOM Portfolio Exam

OUTCOME 6 – PRE-PLACEMENT HEALTH ASSESSMENT

A Trainee should be able to demonstrate the ability to establish a prospective employee's fitness for proposed role, including their ability to offer regular and effective attendance considering relevant pre-existing and current health conditions and workplace risks.

Assessment/learning opportunities

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- RCPI HST Ethics in Occupational Medicine programme
- Clinical cases section of MFOM Portfolio Exam

OUTCOME 7 – OCCUPATIONAL INFECTIONS

A Trainee should be able to demonstrate in-depth knowledge of occupational infections and the role of Occupational Medicine in the management of workplace factors associated with occupational infections, including risk assessments. The trainee should also demonstrate experience of working with other disciplines on overlapping issues including TB, HIV, Hepatitis B and C.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Self-assessment tool for occupational blood exposures
- Clinical cases section of MFOM Portfolio Exam
- OSPE section of MFOM Exam
- MDT

Training Goal 2 – Occupational Toxicology, Chemical and Biological Hazards to Health

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate competence in applying the principles of human toxicology in the Occupational Medicine setting and relate these principles to the role of Occupational Hygiene, biological monitoring, and health surveillance in Occupational Medicine.

OUTCOME 1 – PRINCIPLES OF HUMAN TOXICOLOGY

A Trainee should be able to demonstrate in-depth knowledge of the toxicology of organic and nonorganic compounds, of heavy metals, workplace carcinogens, workplace mutagens and reproductive hazards, dose-response curves, biological monitoring, and health surveillance.

Assessment/learning opportunities

- Feedback Opportunity
- Lecture/tutorial/study day on the principles of human toxicology
- MCQ section of LFOM/MFOM Exam

OUTCOME 2 – TOXICOLOGICAL TESTING METHODS

A Trainee should be able to demonstrate an understanding of toxicological testing including in vitro, in vivo and in silico test methods.

Assessment/learning opportunities

- Feedback Opportunity
- Lecture/tutorial/study day on the principles of human toxicology
- MCQ section of LFOM/MFOM Exam

OUTCOME 3 – PRACTICAL APPLICATION OF TOXICOLOGICAL PRINCIPLES

A Trainee should be able to apply the principles of human toxicology in the Occupational Medicine setting.

- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Interpretation of Material Safety Data Sheets (MSDS), Occupational Hygiene report, results of biological monitoring report.
- Risk assessments of toxicological exposure, including assessment of reproduce risk and Pregnancy Risk Assessment
- Walk-through surveys
- OSPE section of MFOM Exam

OUTCOME 4 – RELATE TOXICOLOGICAL PRINCIPLES TO REAL-WORK SETTING

A Trainee should be able to relate toxicological principles to the role of Occupational Hygiene, biological monitoring, and health surveillance in Occupational Medicine and apply this in a real work setting.

Training/learning opportunities

- Feedback Opportunity
- Design a health surveillance or biological monitoring programme.
- Develop a communication strategy to explain the rationale and potential risks to the employer and employees.
- Workplace Projects section of MFOM Portfolio Exam

Training Goal 3 – Management and Leadership

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate an understanding of the principles and practices of management in a range of workplace settings, both the public and private Occupational Health sector, and the role of Clinical Governance. Trainees should demonstrate leadership in the field of Occupational Medicine in years 3 and/or 4.

OUTCOME 1 - COMMUNICATION WITH TEAM MEMBERS, BUSINESS CLIENTS AND MANAGEMENT

A Trainee should be able to demonstrate the ability to communicate effectively and sensitively with patients, clients, and with professional colleagues in different situations.

Assessment/learning opportunities

- Feedback Opportunity
- Management team meetings
- Departmental meetings
- Committee membership
- RCPI HST Mastering Communication
- Report Writing section of MFOM Exam

OUTCOME 2 – LEADERSHIP

A Trainee should take on a leadership role in the later stages of training, such as membership of policy and guideline development committees, represent the board on external committees, lead a departmental quality improvement or change project.

Assessment/learning opportunities

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- RCPI HST Leadership in Clinical Practice
- SpR Representative
- Committee Membership
- Performing Audit/QI
- End of year evaluation

OUTCOME 3 – QUALITY IMPROVEMENT

A trainee should demonstrate competence in conducting clinical audit or quality improvement relevant to Occupational Medicine practice.

- Feedback Opportunity
- RCPI HST Performing Audit
- Conduct clinical audit/QI project
- Workplace Projects section of MFOM Portfolio Exam

OUTCOME 4 – RUNNING A BUSINESS

A trainee should demonstrate an understanding of the complexities of running an Occupational Health business in the private sector. This should include contract management, GDPR legislation, differing client needs and agreements, financial aspects of running a business.

Assessment/learning opportunities

- Feedback Opportunity
- Attend Management team meetings
- "Running a business" study day
- End of year evaluation

OUTCOME 5 – RUNNING A DEPARTMENT – PUBLIC SECTOR

A trainee should be able to demonstrate an understanding of the complexities of running an Occupational Medicine Department in the Public Sector.

Assessment/learning opportunities

- Feedback Opportunity
- Attend Departmental meetings
- Attend Management team meetings
- Committee membership
- Policy development (departmental and national)
- RCPI HST Leadership in Clinical Practice
- End of year evaluation

OUTCOME 6 – CONFLICT MANAGEMENT/TEAM WORKING

A trainee should be able to demonstrate the ability to work as part of a team, to address conflict in a timely and professional manner and seek senior support where appropriate.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Case discussions/presentations
- RCPI HST Leadership in Clinical Practice
- End of year evaluation

Training Goal 4 – Ergonomics, Health Promotion and Organisational Psychology

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate knowledge and application of the principles of ergonomics to occupational and environmental medicine. They must also demonstrate an ability to assess the need for, organise, deliver, and evaluate health promotion in a range of work environments. The Trainee is also expected to utilise knowledge of organisational psychology principles in day-to-day clinical practice in the management of workplace problems.

OUTCOME 1 – ERGONOMICS

A Trainee should be able to demonstrate knowledge and understanding of the principles of good ergonomics including physical and psychological factors, the adverse health effects of exposure to ergonomic hazards, and be able to identify when an interventional ergonomics assessment is indicated. This should include knowledge of relevant legislation, as well as familiarity with relevant assessment tools e.g., RIBA / RULA / ART / MAC etc.

Assessment and learning opportunities

- Feedback Opportunity
- Workplace Based Assessment (Mini-CEX or CBD) as indicated by Trainer
- Case discussions/presentations
- Site visits
- Study days where appropriate

OUTCOME 2 – HEALTH PROMOTION

A Trainee should be able to demonstrate knowledge and understanding of Health Promotion in the workplace, including the components of health and wellbeing in the workplace, the structuring of and measuring outcomes of a workplace health promotion programme, and the role of occupational health in workplace health promotion.

Assessment/learning opportunities

- Feedback Opportunity
- Committee membership/policy development group membership
- HSeLanD "Make every contact count" course
- NICE guidelines evidence-based guidelines for employers, healthy workplaces, promoting mental health wellbeing at work, promoting physical activity at work
- Healthy Ireland at Work: A National Framework for Healthy Workplaces in Ireland 2021-2025
- End of year evaluation

OUTCOME 3 – ORGANISATIONAL PSYCHOLOGY

A trainee should be able to demonstrate knowledge and understanding of Organisational Psychology including Organisational Workplace Psychosocial hazards, relevant legislation, codes of practice, Management standards, and the role of occupational health in the prevention and management of organizational and psychosocial hazards issues in the workplace. This should include assessing fitness as it relates to engagement in appropriate employee relations or management resolution processes and how to communicate this effectively with HR/management/the organisation.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Case management conferences
- Study days where appropriate
- End of year evaluation

Training Goal 5 – Research and Evidence Based Practice

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate and understanding of the epidemiology of work exposures and disease and injury in the workplace and apply this in everyday practice.

OUTCOME 1 - CRITICAL APPRAISAL AND EVIDENCE BASED PRACTICE

A Trainee should be able to critically assess relevant literature in support of their everyday practice; this should include an understanding of statistical terminology – odds ratio, relative risk, bias, chance, confounding, causality.

Assessment/learning opportunities

- Feedback Opportunity
- Journal Clubs
- Critical appraisal/evidence-based practice workshop/study day
- MFOM Exam, critical appraisal paper
- MCQ section of MFOM Exam

OUTCOME 2 – OCCUPATIONAL EPIDEMIOLOGY

A Trainee should be able to apply the principles of occupational epidemiology in relation to workplace injury, work related disease (asbestos-related disease, noise induced hearing loss, dermatitis, respiratory disease, HAVS, occupational cancers)

Assessment/learning opportunities

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Journal Club
- Study days where appropriate
- MCQ of MFOM Exam
- Clinical cases section of MFOM Portfolio Exam

OUTCOME 3 – ENGAGE WITH OTHER DISCIPLINES ON ISSUES SUCH AS TRANSMISSIBLE DISEASES

The Trainee should have experience working with other disciplines on overlapping issues including TB, HIV, Hepatitis B and C. Ideally, they should be involved in an MDT or committee representing the Occupational Medicine perspective of these strategies.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Case discussions/presentations
- MDT membership/engagement

OUTCOME 4 – UNDERTAKE RESEARCH PROJECT

A Trainee should be able to undertake a research project ideally with involvement throughout from planning to approval, execution, data analysis and presentation.

- Feedback Opportunity
- Research Project
- Presentation of research at Faculty Smiley Day

Training Goal 6 – Occupational Medicine Law and Ethics

By the end of Occupational Medicine Training, the Trainee is expected to demonstrate understanding and application of the legal aspects of Occupational Medicine and ethical considerations.

OUTCOME 1 – CONSENT IN OCCUPATIONAL MEDICINE

A Trainee should be able to demonstrate an understanding of consent as it applies to Occupational Medicine. This includes consent to an assessment, consent for reports to management and consent for communication with GP or other specialists.

Assessment/learning opportunities

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- RCPI HST Ethics in Occupational Medicine
- Study days where appropriate
- Clinical cases section of MFOM Exam

OUTCOME 2 – GDPR IN OCCUPATIONAL MEDICINE

A Trainee should be able to demonstrate an understanding and the application of GDPR legislation as it applies to Occupational Medicine.

Assessment/learning opportunities

- Feedback opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- HSeLanD Fundamentals of GDPR course
- MCQ of MFOM Exam
- Clinical cases section of MFOM Exam

OUTCOME 3 – ETHICS IN OCCUPATIONAL MEDICINE

A Trainee should be able to demonstrate an understanding of their ethical responsibilities to both the employee and the employer/management; adhere to ethical guidelines for communications between occupational physicians, doctors, managers, and others.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- RCPI HST Ethics in Occupational Medicine
- OSPE section of MFOM Exam

OUTCOME 4 – LEGAL ASPECTS OF OCCUPATIONAL MEDICINE

A Trainee should be able to demonstrate an understanding of the legislative framework of occupational health in Ireland; acts, regulations, codes of practice and guidance governing occupational health and safety including the reporting of occupational injury and disease; disability legislation, GDPR, health and safety and employment law.

- Feedback Opportunity
- Case-based discussion (CBD), as appropriate and as agreed with Trainer
- Study days as appropriate
- Expert Witness and Medico-legal report writing courses
- HSeLanD Fundamentals of GDPR course
- MCQ of MFOM Exam
- Clinical cases section of MFOM Exam

5. APPENDICES

This section includes two appendices to the curriculum.

The first one is about Assessment (i.e. Workplace Based Assessments, Evaluations and Examinations)

The second one is about Teaching Attendance (i.e. Taught Programme, Specialty-Specific Learning Activities and Study Days)

ASSESSMENT APPENDIX

Workplace-Based Assessment and Evaluations

The expression "workplace-based assessments" (WBA) defines all the assessments used to evaluate trainees' daily clinical practices employed in their work setting. It is primarily based on the observation of trainees' performance by trainers. Each observation is followed by a trainer's feedback, with the intent of fostering reflective practice.

Relevance of Feedback for WBA

Although "assessment" is the keyword in WBA, it is necessary to acknowledge that feedback is an integral part and complementary component of WBA. The main purpose of WBA is to provide specific feedback for trainees. Such feedback is expected to be:

- **Frequent**: the opportunities to provide feedback are preferably given by directly observed practice, but also by indirectly observed activities. Feedback is expected to be frequent and should concern a low-stake event. Rather than being an assessor, the trainer is an observer who is asked to provide feedback in the context of the training opportunity presented at that moment.
- **Timely**: preferably, the feedback should be a direct conversation between trainer and trainee in a timeframe close to the training event. The trainee should then record the feedback on ePortfolio in a timely manner.
- **Constructive**: the recorded feedback would inform both trainee's practice for future performance and committees for evaluations. Hence, feedback should provide trainees with behavioural guidance on how to improve performance and give committees the context that leads to a rating, so that progression or remediation decisions can be made.
- Actionable: to improve performance and foster behavioural change, feedback should include practical and contextualised examples of both Trainee's strengths and areas for improvement. Based on these examples, it is necessary to outline a realistic action plan to direct the Trainee towards remediation/improvement.

Types of WBAs in use at RCPI

There is a variety of WBAs used in medical education. They can be categorised into three main groups: *Observation of performance; Discussion of clinical cases; Feedback; Mandatory Evaluations.*

As WBAs at RCPI we use Observation of performance via MiniCEX and DOPS; Discussion of clinical cases via CBD; Feedback via Feedback Opportunity.

Mandatory Evaluations are bound to specific events or times of the academic year, for these at RCPI we use: Quarterly Evaluation/End of Post Evaluation; End of Year Evaluation; Penultimate Year Evaluation; Final Year Evaluation.

Recording WBAs on ePortfolio

It is expected that WBAs are logged on an electronic portfolio. Every trainee has access to an individual ePortfolio where they must record all their assessments, including WBAs. By recording assessments on this platform, ePortfolio serves both the function to provide an individual record of the assessments and to track trainees' progression.

Formative and Summative Feedback

The Trainee can record any WBA either as formative or summative with the exception of the *Mandatory Evaluations* (Quarterly/End of Post, End of Year, Penultimate Year, Final Year evaluations).

If the WBA is logged as formative, the trainee can retain the feedback on record, but this will not be visible to an assessment panel, and it will not count towards progression. If the WBA is logged as summative it will be regularly recorded and it will be fully visible to assessment panels, counting towards progression.

Specialty-Specific Examination

Successfully pass both the Licentiate of Faculty of Occupational Medicine (LFOM) and Membership of Faculty of Occupational Medicine (MFOM) Examinations. You should aim to sit the LFOM at the end of your second year of HST and you are expected to obtain the MFOM by the end of your third year.

	WORKPLACE-BASED ASSESSMENTS
CBD Case Based Discussion	 This assessment is developed in three phases: Planning: The Trainee selects two or more medical records to present to the Trainer who will choose one for the assessment. Trainee and Trainer identify one or more training goals in the curriculum and specific outcomes related to the case. Then the Trainer prepares the questions for discussion. Discussion: Prevalently, based on the chosen case, the Trainer verifies the Trainee's clinical reasoning and professional judgment, determining the Trainee's diagnostic, decision-making and management skills. Feedback: The Trainer provides constructive feedback to the Trainee. It is good practice to complete at least one assessment per quarter in each year of training.
DOPS Direct Observation of Procedural Skills	This assessment is specifically targeted at the evaluation of procedural skills involving patients in a single encounter. In the context of a DOPS, the Trainer evaluates the Trainee while they are performing a procedure as a part of their clinical routine. This evaluation is assessed by completing a form with pre-set criteria, then followed by direct feedback. It is good practice to complete at least one assessment per quarter in each year of training.
<i>MiniCEX Mini Clinical</i> Examination Exercise	 The Trainer is required to observe and assess the interaction between the Trainee and a patient. This assessment is developed in three phases: 1. The Trainee is expected to conduct a history taking and/or a physical examination of the patient within a standard timeframe (15 minutes). 2. The Trainee is then expected to suggest a diagnosis and management plan for the patient based on the history/examination. 3. The Trainer assesses the overall Trainee's performance by using the structured ePortfolio form and provides constructive feedback. It is good practice to complete at least one assessment per quarter in each year of training.
Feedback Opportunity	Designed to record as much feedback as possible. It is based on observation of the Trainees in any clinical and/or non-clinical task. Feedback can be provided by anyone observing the Trainee (peer, other supervisors, healthcare staff, juniors). It is possible to turn the feedback into an assessment (CDB, DOPS or MiniCEX)
	MANDATORY EVALUATIONS
QA Quarterly Assessment	As the name suggests, the Quarterly Assessment recurs four times in the academic year, once every academic quarter (every three months). It frequently happens that a Quarterly Assessment coincides with the end of a post, in which case the Quarterly Assessment will be substituted by completing an End of Post Assessment. In this sense the two Assessments are interchangeable, and they can be completed using the same form on ePortfolio. However, if the Trainee will remain in the same post at the end of the quarter, it will be necessary to complete a Quarterly Assessment. Similarly, if the end of a post does
EOPA End of Post Assessment	not coincide with the end of a quarter, it will be necessary to complete an End of Post Assessment to assess the end of a post. This means that for every specialty and level of training, a minimum of four Quarterly Assessment and/or End of Post Assessment will be completed in an academic year as a mandatory requirement.
EOYE End of Year Evaluation	The End of Year Evaluation occurs once a year and involves the attendance of an evaluation panel composed of the National Specialty Directors (NSDs); the Specialty Coordinator attends too, to keep records of and facilitate the meeting. The assigned Trainer is not supposed to attend this meeting unless there is a valid reason to do so. These meetings are scheduled by the respective Specialty Coordinators and happen sometime before the end of the academic year (between April and June).
PYE Penultimate Year Evaluation	The Penultimate Year Evaluation occurs in place of the End of Year Evaluation, in the year before the last year of training. It involves the attendance of an evaluation panel composed of the National Specialty Directors (NSDs) and an External Member who is a recognised expert in the Specialty outside of Ireland; the Specialty Coordinator attends too, to keep records of and facilitate the meeting. The assigned Trainer is not supposed to attend this meeting unless there is a valid reason to do so.
FYE Final Year Evaluation	In the last year of training, the End of Year Evaluation is conventionally called Final Year Evaluation, however, its organisation is the same as an End of Year Evaluation.

TEACHING APPENDIX

RCPI Taught Programme

The new RCPI Taught Programme consists of a series of modular elements spread across the years of training.

Delivery will be a combination of self-paced online material, live virtual tutorials, and in-person workshops, all accessible in one area on the RCPI's virtual learning environment (VLE), RCPI Brightspace.

The live virtual tutorials will be delivered by Tutors related to this specialty and they will use specialty-specific examples throughout each tutorial. Trainees will be assigned to a tutorial group and will remain with their tutorial group for the duration of HST.

Trainees will receive their induction content and timetable ahead of their start date on HST. Trainees must plan the time to complete their requirements and must be supported with the allocation of study leave or appropriate rostering.

As the HST Taught Programme is a mandatory component of HST, it is important that Trainees are released from service to attend the Virtual Tutorials and, where possible facilitated with the use of teaching space in the hospital.

Specialty-Specific Learning Activities (Courses & Workshops)

Trainees will also complete specialty-specific courses and/or workshops as part of the programme.

Trainees should always refer to their training curriculum for a full list of requirements for their HST programme. When not sure, Trainees should contact their Programme Coordinator.

Study Days

Study days vary from year to year, they comprise a rolling schedule of hospital-provided topic-specific educational days and national/international events selected for their relevance to the HST curriculum.

Trainees are expected to attend the majority of the study days available and **at least 8 per training year**.

Occupational Medicine Teaching Attendance Requirements

