

# PREVENTIVE MEDICINE RESIDENCY

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## TRAINING REQUIREMENTS

### (A) INTRODUCTION

Preventive Medicine is the specialty of medical practice that focuses on the health of individuals, communities, and defined populations. Its goal is to protect, promote, and maintain health and well-being and to prevent disease, disability, and death. Preventive medicine specialists have core competencies in biostatistics, epidemiology, social and behavioural science, health policy and administration, environmental and occupational medicine, planning and evaluation of health services, management of health care organizations, research into causes of disease and injury in population groups, and the practice of prevention in clinical medicine. They apply knowledge and skills gained from the medical, social, economic, and behavioural sciences. Preventive medicine specialists are expected to be able to interpret data, integrate evidence and implement evidence-based policies and programmes with post hoc supervision.

The training in preventive medicine must be 60 months in length.

### (B) PROGRAMME OVERVIEW

- 60 months (non ACGME-I accredited)
  - 36 months Junior Residency (R1 - R3)
  - 24 months Senior Residency (R4 - R5)

### (C) TRAINING REQUIREMENTS R1 – R3

The residency accepts candidates only from PGY2 onwards. During the three years of the junior residency, the resident will be exposed to a wide range of basic practicum experiences at participating sites to gain experience in core areas such as health policy and administration, disease control and epidemiology, health promotion, occupational and environmental health and clinical preventive medicine. Because of the sheer diversity in Preventive Medicine, the rotations will be selective and arranged with consideration for the residents' aspirations wherever possible.

The rotations will provide experience in communicable disease outbreak management, Public Health agencies in the first year (including at least three months in a public health agency and at least three months in communicable disease control with exposure to epidemiological surveillance and communicable disease outbreak), followed by rotations in Public Health operational units (e.g. in health promotion units, clinical or operational departments, health research units, and regional health systems) and at the policy and programmatic level (e.g. in Ministry of Health and Ministry of Manpower and in strategic or planning units in Public Health agencies) in the years following.

Residents are to submit a 3000-word Primary Healthcare Systems (PHC) Project report as part of the evidence of learning for PHC Systems, to be eligible for promotion to senior residency. The report will be assessed by the next annual Progression PMCC after submission. Residents may submit in any year of junior residency.

A concise one-page proposal should be submitted to the routine Preventive Medicine Competency Committee (PMCC) through PD/APD before initiation. PMCC approval for the project should be obtained before the project commences.

Residents may spend up to 52 half days attachments at one or more primary healthcare organisations:

- a. For residents who have no primary healthcare exposure (as resident or non-resident), these 52 sessions will be mandatory.
- b. For residents with prior primary healthcare experience (as resident or non-resident), the 52 sessions will be optional, functioning as a scaffold for their project should the residents require it.

These half-day attachments will be arranged by the Programme.

The resident is expected to complete a Master of Public Health, either in the local Saw Swee Hock School of Public Health or equivalent overseas schools (subject to RAC's approval) to be considered for promotion to Senior Residency. The MPH may be obtained before commencing the residency (subject to RAC's approval) during (as a part time student) or with a break of service (as a full time student, usually at an overseas school). Residents with an interest in Occupational Medicine must ensure they take the appropriate modules to satisfy specialist accreditation standards.

The resident must attend the regular Preventive Medicine Thursday Education Sessions, Public Health and Occupational Medicine conferences and other organised activities through the year.

The educational calendar will provide opportunities for developing breadth outside of the trainees' specialty area, and include grand rounds, workplace health assessments, project presentations, journal clubs, case studies and paper critique sessions. In addition, trainees are provided with another half day per week for personal study and research/scholarly activities. All residents are also expected to participate in scholarly presentations at local or overseas conferences.

All training activities and achievements will be captured in a portfolio started in R1 and maintained throughout the residency.

In addition, resident has to attend the regular Preventive Medicine Grand Rounds and the weekly tutorials/seminars on preventive medicine throughout the whole two years.

#### **(D) TRAINING REQUIREMENTS R4 – R5**

The senior residency rotations must include at least two sites (of different organisations) of at least six months each. Where possible, the main or later of the two sites should be with a prospective future employer of the resident. Residents may opt for one of the following developmental focus areas, and undergo the appropriate approved training programme:

- a. Occupational Medicine.
- b. Communicable Diseases.
- c. Health Promotion/Population Health.
- d. Healthcare Management
- e. Preventive Medicine in the Uniformed Services

Residents will have a personalized 2-year training programme, designed in consultation with the Programme Director, institutional faculty and the receiving organizations. The interests and career aspirations of the trainee and most importantly, the EPAs (Annex A), will be considered in the development of the training Programme. The resident will be expected to take an active part in the teaching of nurses, undergraduates and medical officers, and presentation of posters and free papers in local, regional and/or international meetings, seminars or conferences.

In addition, the trainee must fulfil either one of the following during the training programme:

- (a) Publish at least ONE first author paper\* on a public health or occupational medicine topic (in Preventive Medicine context in a refereed journal during the junior or senior residency years (Papers done prior to joining residency may be considered on a case-by-case basis), or
- (b) Demonstrates a systematic approach to acquiring knowledge and skills in their chosen field through a portfolio during R4 and R5 years with two parts:

Part 1: Three technical reports, each at least 2000 words in length, which exemplify the application of best practices. These reports may take the form of a:

- i. Scholarly article / review of a standard acceptable for journal publication;
- ii. Series of policy papers;
- iii. Comprehensive needs assessment exercise; or
- iv. Study report, covering the collection, analysis and interpretation of data for monitoring or evaluation of a health program for a defined population.

Part 2: Three process reports, one for each of the technical reports required in Part 1. These reports should document the learning experience, showing evidence of depth and rigor in the *preparation of the technical report*.

\*Senior residents are allowed to sit for the exit exam first and to be given 2 years from the date of the exit exam for their first author paper to be accepted or published. However, the paper has to be submitted by the time the resident applies for the exit exam. If the resident fails to meet the 2-year deadline, s/he will have to schedule a re-sit for the exit exam after their paper has been successfully accepted for publication.

## **(E) LOG OF OPERATIVE / CLINICAL EXPERIENCE**

The resident will compile and maintain a portfolio of their experience and evidence of capabilities through the residency. The compendium of documents shall include the following:

- a. Overview: Key information about the resident and a chronological log of activities.
- b. Narrative: Descriptive outline of the resident's development in each EPAs and development dimensions, with references/pointers to supporting exhibits that demonstrate the resident's capabilities.
- c. Rotation Reports, Detailed reports for each rotation, sequentially numbered.
- d. Exhibits: Folders of supporting exhibits categorised by type (e.g., C1 Forms, CME Activities, Form A (Learning Evaluations, Mini-CEXs, Multi Source Feedback, Papers, Presentations, Projects, Publications, Reflections, Study Trips, Teaching, Thursday Sessions, etc).

The trainee must update and maintain the portfolio regularly, and seek input from the supervisor and faculty, for both to review the progress of the resident in the achievement of the EPAs. The supervisor must provide input into the resident's rotation report.

The portfolio will be reviewed (by the Preventive Medicine Competency Committee (at least once each rotation by the Progression PMCC in R3 to determine the eligibility of the resident for Senior Residency and by the Examination Committee in R5 to determine the eligibility of the senior resident to sit the Exit Examination.

## **(F) EXAMINATIONS**

### **Supervisors Assessment**

All supervisors will meet their residents regularly (at least monthly) to ensure applicable and high-quality training experience.

The supervisor's evaluation of the senior resident should be performed at the end of every rotation using the designated forms (monthly log of EPAs, roadmap of the EPAs and C1 evaluation forms), compiled as part of the resident's portfolio and reviewed by the PMCC.

The Preventive Medicine resident will be directly supervised on this rotation by an appropriate public health practitioner. Overall supervisory responsibility remains with PD. Each resident will be assessed by as follows:

- Resident Evaluation Form.
- MOH Common HO/MO/MOT/Resident Evaluation Form (FORM C-1).
- Learning Evaluation Document.
- Multi-Source Feedback.
- Mini-CEX (minimum 4 cases), where relevant.
- Patient Evaluation Form (minimum 4 patients), where relevant.
- Others as assigned.

### **Formative assessment**

The resident must meet the PD and the PMCC at six monthly intervals for an oral discussion and assessment of the resident's development, based on the portfolio including the specific rotation reports.

The PMCC will submit to the RAC a comprehensive PMCC Review Report after each six-month rotation, assessing the progress of all residents. The PMCC will, based on the workplace-based assessments and supervisor's reports, assess the residents on whether they are making good, satisfactory. If not, the PMCC will recommend appropriate remedial actions and follow up monitoring.

### **Feedback**

Residents should perform a yearly evaluation of teaching faculty and the training programme using the designated forms. These forms must be submitted to the RAC and kept absolutely confidential.

The PD and the PMCC will obtain feedback on the workload and training activities from the residents during the above-mentioned meetings so that remedial action can be taken to improve the training programme.

## Examinations

R1	R2	R3	R4	R5
MPH  Routine PMCC Review	MPH  Routine PMCC Review	MPH  Progress PMCC Review	Routine PMCC Review  Written Examination <ul style="list-style-type: none"> <li>• Short-Answer Question Paper</li> <li>• Data Interpretation Policy/Programme Translation paper</li> </ul>	Routine PMCC Review  Oral Examination (Prepared Presentation and a Portfolio-based VIVA)

## (H) CHANGES IN TRAINEESHIP PERIOD AND LEAVE OF ABSENCE )

### I. Changes in Training Period

Residency should be continuous. If a training programme is interrupted for any reason whatsoever, the RAC may at its discretion, require the trainee to undergo a further period of training in addition to the minimum requirements of the programme or terminate the residency altogether. All residents must conform to the residency training programme as approved by the RAC and complete all the exit and training requirements within the maximum period of candidature.

### II. Leave of Absence

All residents are to comply with the prevailing MOH policy on Leave of Absence.

### III. Overseas Postings

Overseas attachment during Senior Residency training is not permitted (*refer to JCST Circular 114/14*).

## Annex A

### List of Public Health and Occupational Medicine EPA titles

No.	EPA title
*PH1	Designing, implementing and evaluating health promotion programmes in various settings
*PH2	Developing preparedness and response plans for public health emergencies
*PH3	Conducting investigations into and managing communicable disease outbreaks
*PH4	Designing public health surveillance and monitoring programmes in communities
*PH5	Designing, implementing and evaluating chronic disease management programmes
*PH6	Conducting comparative analyses of health care systems
*PH7	Conducting studies to determine the health needs and/or risk factors of disease in a defined population / community
*PH8	Developing public communications plans, including risk communication, for public health issues
*PH9	Providing health promotion and disease prevention consultation at the population and individual levels
OM1	Diagnosing and managing workers with an occupational/ work-related disease or injury
OM2	Conducting Fitness-to-Work assessments
OM3	Conducting work injury compensation assessments
OM4	Conducting health counselling and medical management for workers, and their families, who are required to travel or relocate overseas
OM5	Conducting workplace assessments from the perspective of Occupational Health & Safety (OHS) and advising workplaces accordingly (including their legislative obligations)
OM6	Designing or optimising medical surveillance programmes, for hazard exposures, at workplaces
OM7	Designing or optimising evidence-based workplace Occupational Health and Health Promotion programmes
OM8	Developing organisational and medical management protocols to address substance abuse, violence, and psychosocial hazards at workplaces
OM9	Designing or optimising disaster preparedness and emergency management response plans for workplaces
OM10	Designing or optimising pandemic business continuity contingency plans for workplaces
OM11	Conducting WSH incident/ accident investigations as part of a multi-disciplinary team

\*Common Entrustable Professional Activities (EPAs) for Public Health and Occupational Medicine in Junior Residency