

## M. MED RADIOLOGY Phase I

2019 - 2020 Academic Year - Event calendar

| Period           | Events  |
|------------------|---|
| <b>2019</b>      |   |
| 11th June        | Orientation                                       |
| 29 Sept – 03 Oct | Intensive Course I                                |
| 5 Sept           | Submit (June-Aug) log book & meeting supervisor.  |
| 5 Dec            | Submit (Sept -Nov) log book & meeting supervisor. |
| <b>2020</b>      |   |
| 19 Jan – 21 Jan  | Intensive Course II                               |
| 22 - 23 Jan      | Continuous Assessment (MOCK EXAM)                 |
| 5 Mar            | Submit (Dec-Feb) log book & meeting supervisor.   |
| 23 Apr           | Submit (Mar-Apr) log book & meeting supervisor.   |
| May              | <b>Professional Examination</b>                   |

### M.Med. Radiology Phase I Academic Program for the year 2019-2020

| Date     | Week | Time      | Topics  | Lecturer | Candidate |
|----------|------|-----------|---|----------|-----------|
| 19.06.19 | 1    | 2.00-3.30 | 1. Fundamental physics and radioactivity  | ALY 1    |           |
|          |      | 3.30-5.00 | <i>[1] Abdomen 1</i>  | AHZS 1   | Student   |
| 26.06.19 | 2    | 2.00-3.30 | 2. Production of x-rays   | ALY 2    |           |
|          |      | 3.30-5.00 | <i>[2] Abdomen 2</i>  | AHZS 2   | Student   |
| 03.07.19 | 3    | 2.00-3.30 | 3. Important aspects of plain radiography   | ALY 3    |           |
|          |      | 3.30-4.30 | 4. Image receptor 1   | RZ 1     |           |
|          |      | 4.30-5.30 | 5. Image receptor 2   | RZ 2     |           |
| 10.07.19 | 4    | 2.00-3.30 | 6. Interaction of x-rays and gamma rays with matter & their effects on irradiated materials 1 | ALY 4    |           |
|          |      | 3.30-5.00 | <i>[3] Abdomen - pathological correlation</i>   | AHZS 3   | Student   |

|   |    |           |   |        |         |
|---|----|-----------|---|--------|---------|
| 17.07.19  | 5  | 2.00-3.30 | 7. Interaction of x-rays & gamma rays with matter & their effects on irradiated materials 2 | ALY 5  |         |
|   |    | 3.30-5.00 | Practical Radiography – abdomen + KUB   | KKK    |         |
| 24.07.19  | 6  | 2.00-3.30 | 8. Radiation Protection 1   | ALY 6  |         |
|   |    | 3.30-5.00 | [4] Abdomen – hot seat  | AHZS 4 |         |
| 31.07.19  | 7  | 2.00-3.30 | 9. Radiation Protection 2   | ALY 7  |         |
|   |    | 3.30-5.00 | [5] HBS   | CN 1   | Student |
| 07.08.19  | 8  | 2.00-3.30 | 10. Magnetic Resonance Imaging 1  | BK 1   |         |
|   |    | 3.30-5.00 | [6] HBS – pathological correlation+ hot seat  | CN 2   | Student |
| <b>11.08.19 – 12.08.19 Hari Raya Haji (Sunday &amp; Monday)</b> |    |           |   |        |         |
| 14.08.19  | 9  | 2.00-3.30 | 11. Magnetic Resonance Imaging 2  | BK 2   |         |
|   |    | 3.30-5.00 | [7] Chest 1   | WAWA 1 | Student |
| 21.08.19  | 10 | 2.00-3.30 | 12. Magnetic Resonance Imaging 3  | BK 3   |         |
|   |    | 3.30-5.00 | [8] Chest 2   | WAWA 2 | Student |
| 28.08.19  | 11 | 2.00-3.30 | [9] Chest - pathological correlation  | WAWA 3 | Student |
|   |    | 3.30-5.00 | [10] H&N 1  | KAS 1  | Student |
| <b>31.08.19 Merdeka Day (Saturday)</b>                          |    |           |   |        |         |
| 04.09.19  | 12 | 2.00-3.30 | 13. Radionuclide Imaging 1  | RZ 3   |         |
|   |    | 3.30-5.00 | [11] Chest- hot seat  | WAWA 4 |         |
| <b>09.09.19 Agong's Birthday (Monday)</b>                       |    |           |   |        |         |
| 11.09.19  | 13 | 2.00-3.30 | 14. Radionuclide Imaging 2  | RZ 4   |         |
|   |    | 3.30-5.00 | 15. Radionuclide Imaging 3  | RZ 5   |         |
| <b>16.09.19 Malaysia Day (Monday)</b>                           |    |           |   |        |         |
| 18.09.19  | 14 | 2.00-3.30 | 16. Measurement of X-ray and gamma ray  | RZ 6   |         |
|   |    | 3.30-5.00 | [12] H&N 2  | KAS 2  | Student |
| 25.09.19  | 15 | 2.00-3.30 | 17. Digital Imaging -Fluoroscopy and DSA 1  | NH 1   |         |
|   |    | 3.30-5.00 | 18. Digital Imaging -Fluoroscopy and DSA 2  | NH 2   |         |
| <b>29.09.19 - 03.10.19 INTENSIVE COURSE I</b>                   |    |           |   |        |         |
| **02.10.19  | 16 | 2.00-3.30 | 19. Radiological Image Quality 1  | ALY 8  |         |
|   |    | 3.30-5.00 | [13] H&N- pathological correlation + hot seat   | KAS 3  | Student |

|   |    |           |   |        |         |
|---|----|-----------|---|--------|---------|
| 09.10.19  | 17 | 2.00-3.30 | Practical radiography – face, skull and PNS                         | MNMN   |         |
|   |    | 3.30-5.00 | 20. Radiological Image Quality 2                                    | ALY 9  |         |
| 16.10.19  | 18 | 2.00-3.30 | PHYSICS TUTORIAL 1  | ALY 10 |         |
|   |    | 3.30-5.00 | [14] <i>Ophthalmology</i>   | NUS 1  | Student |
| 23.10.19  | 19 | 2.00-3.30 | 21. Computed Tomography 1   | RZ 7   |         |
|   |    | 3.30-5.00 | [15] <i>Ophthalmology - pathological correlation + hot seat</i>     | NUS 2  | Student |
| <b>27.10.19                      Deepavali (Sunday)</b>                               |    |           |   |        |         |
| 30.10.19  | 20 | 2.00-3.30 | 22. Computed Tomography 2   | RZ 8   |         |
|   |    | 3.30-5.00 | 23. Computed Tomography 3   | RZ 9   |         |
| 06.11.18  | 21 | 2.00-3.30 | (1) Basic-<br>PACS/RIS/DICOM/Networking/Teleradiology               | SAA    |         |
|   |    | 3.30-5.00 | [16] <i>Urinary System 1</i>  | CN 3   | Student |
| <b>11.11.19 – 12.11.19            Sultan Kelantan Birthday (Monday &amp; Tuesday)</b> |    |           |   |        |         |
| 13.11.19  | 22 | 2.00-3.30 | [17] <i>Urinary System 2</i>  | CN 4   | Student |
|   |    | 3.30-5.00 | (2) Application-<br>PACS/RIS/DICOM/Networking/Teleradiology         | NF     |         |
| 20.11.19  | 23 | 2.00-3.30 | [18] <i>Urinary System- pathological correlation</i>                | CN 5   | Student |
|   |    | 3.30-5.00 | [19] <i>Testes/thyroid/adrenals/small parts</i>                     | AHZS 5 |         |
| 27.11.19  | 24 | 2.00-3.00 | 24. Ultrasound 1  | NH 3   |         |
|   |    | 3.30-5.00 | [20] <i>Urinary System- hot seat</i>                                | CN 6   |         |
| 04.12.19  | 25 | 2.00-3.30 | 25. Ultrasound 2  | NH 4   |         |
|   |    | 3.30-5.00 | 26. Ultrasound 3  | NH 5   |         |
| 11.12.19  | 26 | 2.00-3.30 | [21] <i>Musculoskeletal 1</i>                                       | MEA 1  | Student |
|   |    | 3.30-5.00 | Practical Radiography- Upper & Lower Limb                           | AM     |         |
| 18.12.19  | 27 | 2.00-3.30 | (3) Quality Assurance/Quality Control 1                             | MZ 1   |         |
|   |    | 3.30-5.00 | [22] <i>Musculoskeletal 2</i>                                       | MEA 2  | Student |
| 24.12.19<br><b>(TUESDAY)</b>  | 28 | 2.00-3.30 | (4) Quality Assurance/Quality Control 2                             | MZ 2   |         |
|   |    | 3.30-5.00 | [23] <i>Musculoskeletal – trauma &amp; pathological correlation</i> | MEA 3  | Student |

| 25.12.2019                              |    | <i>Christmas (Wednesday)</i>             |   |        |         |
|---|----|--|---|--------|---------|
| 2020                                    |    |  |   |        |         |
| 01.01.20                                | 29 | 2.00-3.30                                | (5) Film fault & Reject analysis              | NFT    |         |
|   |    | 3.30-5.00                                | [24] MSK – hot seat                           | MEA 4  |         |
| 08.01.20                                | 30 | 2.00-3.30                                | [25] CNS 1                                    | NUS 3  | Student |
|   |    | 3.30-5.00                                | Spine Radiography                             | MNMN   |         |
| 15.01.20                                | 31 | 2.00-3.30                                | 27. Mammography                               | NH 6   |         |
|   |    | 3.30-5.00                                | [26] CNS 2                                    | NUS 4  | Student |
| 21.01.20<br><b>** (Tuesday)</b>         | 32 | 2.00-3.30                                | PHYSICS TUTORIAL 2                            | NH 7   |         |
|   |    | 3.30-5.00                                | [27] CNS – pathological correlation           | NUS 5  | Student |
| <b>19.01.19 – 21.01.20</b>              |    | <b>INTENSIVE COURSE II</b>               |   |        |         |
| <b>22.01.19 – 23.01.20</b>              |    | <b>CONTINUOUS ASSESSMENT (MOCK EXAM)</b> |   |        |         |
| 25.01.20 – 26.01.20 (Saturday & Sunday) |    | <i>Chinese New Year</i>                  |   |        |         |
| 29.01.20                                | 33 | 2.00-3.30                                | [28] CNS – hot seat                           | NUS 6  | Student |
|   |    | 3.30-5.00                                | [29] Breast                                   | JH 1   | Student |
| 05.02.20                                | 34 | 2.00-3.30                                | Practical radiography – chest                 | NFT    |         |
|   |    | 3.30-5.00                                | [30] O&G                                      | JH 2   | Student |
| 12.02.20                                | 35 | 2.00-3.30                                | [31] Breast, O & G – pathological correlation | JH 3   | Student |
|   |    | 3.30-5.00                                | [32] Breast, O&G - hot seat                   | JH 4   | Student |
| 19.02.20                                | 36 | 2.00-3.30                                | [33] Interventional radiology 1               | MSA 1  | Student |
|   |    | 3.30-5.00                                | [34] Interventional radiology 1               | MSA 2  | Student |
| 26.02.20                                | 37 | 2.00-3.30                                | [35] ENT                                      | WAWA 5 | Student |
|   |    | 3.30-5.00                                | PHYSICS TUTORIAL 3                            | RZ 10  |         |
| 04.03.20                                | 38 | 2.00-3.30                                | [36] ENT- Pathological correlation + hot seat | WAWA 6 | Student |
|   |    | 3.30-5.00                                | [37] Interventional radiology – hot seat      | MSA 3  |         |
| 11.03.20                                | 39 | 2.00-3.30                                | [38] Spine 1                                  | ATM 1  | Student |
|   |    | 3.30-5.00                                | PHYSICS TUTORIAL 4                            | ALY 11 |         |

|                            |    |           |                                       |       |         |
|----------------------------|----|-----------|---------------------------------------|-------|---------|
| 18.03.20                   | 40 | 2.00-3.30 | [39] Spine 2                          | ATM 2 | Student |
|                            |    | 3.30-5.00 | Mammography - positioning             | SA    |         |
| 25.03.20                   | 41 | 2.00- .30 | [40] Spine - pathological correlation | ATM 3 | Student |
|                            |    | 3.30-5.00 | [41] Drugs in Radiology               | CN 7  | Student |
| 01.04.20                   | 42 | 2.00-3.30 | [42] Spine – hot seat                 | ATM 4 |         |
|                            |    | 3.30-5.00 | [43] Contrast media                   | KAS 4 | Student |
| 08.04.20                   | 43 | 2.00-3.30 | (6) QA/QC mammography                 | SS    |         |
|                            |    | 3.30-5.00 | PHYSICS TUTORIAL 5                    | NH 8  |         |
| 15.04.20                   | 44 | 2.00-3.30 | [44] Cardiac imaging technique        | KAS 5 | Student |
|                            |    | 3.30-5.00 | [45] OSCE section                     | JH 5  |         |
| 22.04.20                   | 45 | 2.00-3.30 | PHYSICS TUTORIAL 6                    | RZ 11 |         |
|                            |    | 3.30-5.00 | [46] MSK - ultrasound & arthrography  | ATM 5 | Student |
| MAY 2018 PROFESSIONAL EXAM |    |           |                                       |       |         |

\*\*Please take note these dates had to be adjusted because the usual academic day (Wednesday) clashes with Public Holidays and Mock Exam.

List of lecturers and its abbreviation

|      |                                 |      |                            |
|------|---------------------------------|------|----------------------------|
| RZ   | Dr. Rafidah Zainon              | NH   | Dr. Nur Hartini Mohd Taib  |
| ALY  | Dr. Ahmad Lutfi Yusoff          | KAY  | En. Khalid Osman           |
| MSA  | P.M Dr. Mohd Shafie Abdullah    | ABJ  | En. Arifin Haji Jaffar     |
| MEA  | P.M Dr. Mohd Ezane Aziz         | NF   | En. Nik Fauriza Nik Lah    |
| JH   | Dr. Juhara Haron                | SS   | Pn. Siti Salwa Hassan      |
| KAS  | Dr. Khairul Amir Sayuti         | SA   | Pn. Siti Afidah Hamat      |
| CN   | Dr. Chandran Nadarajan          | MNMN | En. Mohd Nordin Mohd Nor   |
| ATM  | Dr. Ahmad Tarmizi Musa          | KKK  | En. Khew Kuan Kooi         |
| AHYS | Dr. Ahmad Hadif Zaidin Samsudin | AM   | En. Azahadi Mamat          |
| WAWA | Dr. Wan Aireene Wan Ahmed       | NFT  | Pn. Norfataha Mohd Daud    |
| NUS  | Dr. Nur Asma Sapiai             | SAA  | Pn. Siti Aishah Abdul Aziz |
| BK   | Dr. Bilgin Keserci              |      |                            |

List of candidates (TO BE FILLED UP BY STUDENTS)

| No. | Candidates | Singkatan | Supervisor |
|-----|------------|-----------|------------|
| 1   |            | Stud 1    |            |
| 2   |            | Stud 2    |            |
| 3   |            | Stud 3    |            |
| 4   |            | Stud 4    |            |
| 5   |            | Stud 5    |            |
| 6   |            | Stud 6    |            |
| 7   |            | Stud 7    |            |
| 8   |            | Stud 8    |            |
| 9   |            | Stud 9    |            |
| 10  |            | Stud 10   |            |
| 11  |            | Stud 11   |            |
| 12  |            | Stud 12   |            |
| 13  |            | Stud 13   |            |
| 14  |            | Stud 14   |            |
| 15  |            | Stud 15   |            |
| 16  |            | Stud 16   |            |
| 17  |            | Stud 17   |            |
| 18  |            | Stud 18   |            |
| 19  |            | Stud 19   |            |
| 20  |            | Stud 20   |            |

## **Guidelines for the students for presentation**

Structural approach in each system

### **Section 1.**

- Radiological anatomy (gross and functional whenever applicable)
- Embryology as a guide/outline to understand congenital anomalies, variants and some developmental problems

### **Section 2.**

- Radiographic images –
  - plain radiographic anatomy – various views
  - radiographic critique
  - measurement-line and angles to assess; eg. Dislocation, scoliosis, cervico-vertebral junction, etc.
  - normal variant
  - functional correlation
  - flourosopic imaging
  - cross sectional images –CT, MR, US
  - angiographic images – (whenever applicable)

These sections approach should be applied in all systems. However, with the time limitation, each component should be adjusted accordingly.

**Note- The student needs to confirm with the lecturers for the classes in advance [suggest- a week earlier].**