



## BRAINWARE UNIVERSITY

### Term End Examination 2020 - 21

Programme – Bachelor of Science in Medical Radiology & Imaging Technology

Course Name – Clinical Radiography- Positioning Part 1

Course Code - BMRIT303

Semester / Year - Semester III

Time allotted : 75 Minutes

Full Marks : 60

[The figure in the margin indicates full marks. Candidates are required to give their answers in their own words as far as practicable.]

### Group-A

(Multiple Choice Type Question)

1 x 60=60

1. (Answer any Sixty )

(i) In PA projection of hand, it is

- |             |              |
|-------------|--------------|
| a) Pronated | b) Supinated |
| c) Everted  | d) Flexed    |

(ii) The forearm should not be X-rayed in PA position because

- |                                   |                                  |
|-----------------------------------|----------------------------------|
| a) It involves rotation of radius | b) It involves rotation of ulna  |
| c) It involves rotation of elbow  | d) Radius and ulna lies parallel |

(iii) In the lateral view of elbow joint it is not advisable to keep the

- |                                      |                            |
|--------------------------------------|----------------------------|
| a) Arm and forearm in the same place | b) Elbow flexed            |
| c) Elbow extended                    | d) Epicondyle superimposed |

(iv) In hand anterior oblique, the vertical central ray is centered over the \_\_\_\_\_

- |                           |                           |
|---------------------------|---------------------------|
| a) Head of 5th metacarpal | b) Head of 3rd metacarpal |
| c) Head of 2nd metacarpal | d) Head of 1st metacarpal |

(v) Bilateral hand posterior oblique projection is also called \_\_\_\_\_

- |                            |                    |
|----------------------------|--------------------|
| a) Rhese projection        | b) Frog projection |
| c) Ball catcher projection | d) Stenvers view   |

(vi) Which one of the following is best view to demonstrate scaphoid bone\_\_\_\_\_

- a) Ulnar deviation
- b) Posterior oblique
- c) Lateral
- d) All of these

(vii) Number of carpal bone present in hand

- a) 7 bone
- b) 8 bone
- c) 14 bone
- d) 33 bone

(viii) In wrist PA projection the vertical central ray is centered at\_\_\_\_\_

- a) Between 2nd and 3rd carpal
- b) Between 2nd and 3rd metacarpal
- c) Between radius and styloid process
- d) None of these

(ix) There are \_\_\_\_\_ phalanges in hand

- a) 14
- b) 8
- c) 15
- d) 33

(x) The palm of the hand is formed by the

- a) Carpal bone
- b) Metacarpal bone
- c) Phalanges
- d) Both Metacarpal bone & Phalanges

(xi) Where is the CR location for all lateral hand projections?

- a) Perpendicular to the third MCP joint
- b) Parallel to the second PIP joint
- c) Perpendicular to the second MCP joint
- d) Parallel to the third DIP joint

(xii) Which projection shows the coronoid process free of superimposition?

- a) AP elbow
- b) Medical oblique elbow
- c) Lateral oblique elbow
- d) AP forearm

(xiii) Which bone is the focus in the PA ulnar deviation projection of the wrists?

- a) Lunate
- b) Scaphoid
- c) Pisiform
- d) Capitate

(xiv) In order to better visualize joint space in AP view of knee joint the tube is angled 5 to 7 degree

- a) Cranially
- b) Caudally
- c) Towards medial side
- d) Towards lateral side

(xv) To demonstrate joint space in lateral view of the knee joint, it is advisable to keep the knee

- a) Flexed to 90°
- b) Flexed to 20° to 30°
- c) Extended fully
- d) In oblique position

(xvi) The main constituent of bone is \_\_\_\_\_

- a) Calcium and phosphate
- b) Magnesium
- c) Carbonate
- d) Iron

(xvii) Skyline view is used for

- a) Talus
- b) Scapula
- c) Patella
- d) Hip joint

(xviii) The bicipital groove of humerus can be demonstrated in

- a) Axial view of shoulder
- b) Tangential projection
- c) PA view of shoulder
- d) Lateral view

(xix) Which view of the shoulder shows the greater tubercle in profile?

- a) External rotation
- b) Internal rotation
- c) Neutral
- d) Transthoracic

(xx) The large end of the clavicle is the \_\_\_\_\_ end

- a) Lateral
- b) Medial

c) Acromial

d) None of these

(xxi) The patient is asked to take some purgative one day before the examination of LS spine in order to

a) Clear the bowel

b) To absorb the gases

c) Both of these

d) None of these

(xxii) Which of the lumbar and sacral X-ray views involves a tube tilt of 15°

a) AP lumbopelvic and lateral lumbar

b) AP pelvis and 15-S1 spot

c) 15- S1 spot AP

d) Oblique lumbar spine

(xxiii) Which of the following are demonstrated in the oblique position of the cervical spine?

a) Intervertebral foramina

b) Apophyseal joints

c) Intervertebral joints

d) All of these

(xxiv) In order to demonstrate atlas and axis in AP projection, the patient is asked to

a) Breathe normally

b) Close the mouth

c) Open the mouth

d) Move the head side to side

(xxv) The ileum, ischium and pubic are the parts of

a) Small intestine

b) Hip bone

c) Femur

d) Humerus

(xxvi) The grid is not necessary in making a radiograph of

a) Lateral pelvis

b) AP lumbar spine

c) Lateral cervical spine

d) AP view of pelvis

(xxvii) To demonstrate position for Caldwell in AP projection the central ray is directed

- a) 15° caudally
- b) 25° caudally
- c) 25° cranially
- d) 30° cranially

(xxviii) In orbit PA axial projection the central ray is at a

- a) 0° – 40° caudal
- b) 15° – 30° caudal
- c) 20° – 25° caudal
- d) 0° – 25° caudal

(xxix) Parieto – orbital oblique projection also known as

- a) Judet projection
- b) Lauenstein's projection
- c) Waters projection
- d) Rhese projection

(xxx) In reverse Towne (PA) projection the central ray is at a

- a) 30° cephalic
- b) 30° cranially
- c) Can give both 30° cephalic and 30° cranially projections
- d) 15° cephalic

(xxxi) In mandible (AP) oblique projection procedure may require a short subject tube distance upto \_\_\_\_\_ to blur the superimposed part distal from the while the part of the mandible to be radiographed remain sharply outlined

- a) 75 cm
- b) 65 cm
- c) 50 cm
- d) 100 cm

(xxxii) The waters method is also known as a \_\_\_\_\_ projection

- a) Parietocanthial
- b) Parietomental
- c) Parietoglabellar
- d) Parietonasal

(xxxiii) Which of the following is not a cranial bone?

- a) Vomer
- b) Frontal
- c) Ethmoid
- d) Sphrnoïd

(xxxiv) The central ray location for a Towne's method is

- a) 1.5 inches above glabella
- b) 2 inches above glabella
- c) 2.5 inches below glabella
- d) 2 inches below glabella

(xxxv) The occipital bone is best demonstrated with what skull positions?

- a) Towne's (AP) projection
- b) PA projection
- c) SMV
- d) Lateral

(xxxvi) Which view of the nasal bone shows the bony nasal septum?

- a) Lateral projection
- b) AP projection
- c) Water's projection
- d) Oblique projection

(xxxvii) The best projection to demonstrate the frontal sinuses is the \_\_\_\_\_ method

- a) Caldwell
- b) Towne's
- c) Water's
- d) SMV

(xxxviii) DPT stands for

- a) Digital pantomography
- b) Dental panoramic- tomography
- c) Di-pantomography
- d) None of these

(xxxix) Dental radiography consist

- a) Intra-oral radiography
- b) Extra-oral radiography
- c) Both Intra-oral radiography and Extra-oral radiography
- d) None of these

(xl) Intraoral films are

- a) Single emulsion
- b) Double emulsion
- c) Both Single emulsion & Double emulsion can be used
- d) None of these

(xli) The contrast medium used in bronchography examination is

- a) Urografin
- b) Dianasil
- c) Barium sulphate
- d) Osbil

(xlii) Radiological examination of salivary glands and its ducts by means of contrast medium is termed as

- a) Ductography
- b) Sialography
- c) Sinography
- d) Cholelithiasis

(xliii) The specialized radiological examination of lungs and bronchial tree using an opaque contrast medium is called as

- a) Bronchoscopy
- b) Bronchography
- c) Cystography
- d) Urography

(xliv) To decrease the magnification of the heart in PA view of chest, the film focal distance is kept at

- a) 40 inches
- b) 60 inches
- c) 72 inches
- d) 36 inches

(xlv) Which view is best demonstrate the radiographic examination of the sternum?

- a) PA
- b) AP
- c) Lateral
- d) LAO or RAO

(xlvi) Most common view used during chest X-ray

- a) AP view
- b) Supine AP view
- c) PA view (erect)
- d) Lateral view

(xlvii) Which of the following would best demonstrate fluid in the right pleural cavity?

- a) Left lateral decubitus
- b) Right lateral devubitus
- c) Ventral decubitus
- d) Dorsal decubitus

(xlviii) The patients chin should be elevated during chest radiography to

- a) Avoid superimposition on the apices
- b) Keep midsagittal plane parallel
- c) To reduce patient motion
- d) To reduce patient dose

(xlix) Series of X-rays in acute abdomen needed are

- a) Abdomen AP supine
- b) Abdomen AP erects
- c) Lateral decubitus and chest PA view including uooer abdomen
- d) All of these

(l) Where is central ray located for an urinary bladder projection?

- a) Lower border 2 cm below the public symphysis
- b) Lower border 5 cm below the P. symphysis
- c) Lower border 2 inches above the P. symphysis
- d) Lower border 5 inches above the P. symphysis

(li) Aspirated foreign bodies in older children and adults are most likely to lodge in the

- a) Right main bronchus
- b) Left main bronchus
- c) Oesophagus
- d) G-junction

(lii) Where is CR location for an urinary bladder projection?

- a) Lower border 2 cm below the public symphysis
- b) Lower border 5 cm below the public symphysis
- c) Lower border 2 inches above the public symphysis
- d) Lower border 5 inches above the public stmphysis

(liii) Radiographer has got the following responsibilities

- a) Clinical responsibilities
- b) Ethical responsibilities
- c) Legal responsibilities
- d) All of these

(liv) Legal responsibilities of the radiographer are



- a) Not to disclose any information about the patient
- b) Always have a female attendant at the time of female patient
- c) Always have emergency drugs
- d) All of these

(lv) Radiation dose to the staff is more during mobile/bedside radiography

- a) Patient require support during radiography
- b) Radiographer has to stand close to the source of the exposure
- c) Difficulty in limiting the beam strictly
- d) All of these

(lvi) Which of the following devices does not help in reduction of the patient dose?

- a) Grid
- b) Collimator
- c) Gonad shield
- d) Reduce thickness of part

(lvii) Lead apron should be

- a) Keep clean (no stain of contrast agent)
- b) Periodically check fluoroscopically for any crack/defect
- c) Should not be left hanging partially over the edge of the chair-seat/doubled up on the shelf
- d) All of these

(lviii) The function of lead apron is to protect the personnel from

- a) Natural radiation
- b) Remnant radiation
- c) Primary radiation
- d) Scattered radiation

(lix) The TLD/film badge be worn

- a) Under the lead apron at collar level
- b) Outside the lead apron at collar level
- c) Under the lead apron at waist level
- d) Over the lead apron at waist level

(lx) Filtration of the tube is measured in terms of

- a) mm of iron
- b) mm of aluminium
- c) mm of lead
- d) mm of carbon

