

Checklist for submission and assessment of Portfolio of Evidence: Medical Biological Scientists

This guideline is a summary of The National Curriculum for Medical Biological Scientists.

ALL requirements have to be met before assessment of Portfolio of Evidence will be considered.

- a) **Submission of documents for the assessment of the Portfolio of Evidence by the intern candidate**
- *A structured Portfolio of Evidence as prescribed in The Policy Regarding the Training of Intern Medical Scientists (Form CMS A)*
 - *A completed checklist shall accompany the request for submission of assessment (applicable to the intern candidate).*
 - *A completed Duty Certificate with official stamp.*
 - *Please indicate proof of evidence by “Y” for yes (available) and “N” for no (not available).*
 - *Indicate level of competency for practical competencies – refer to table 12.*
 - *Indicate the specific page(s) of evidence in the Portfolio of Evidence on the Checklist.*
- b) **Assessment of Portfolio of Evidence by assessors and moderator**
- *Please use the checklist (completed by the intern candidate) in the assessment process to ensure a standardized national quality of performance.*
 - *Please indicate proof of evidence by “Y” for yes (available) and “N” for no (not available).*

TABLE OF CONTENTS

1. Details of the intern medical scientist
2. Form MSC C – Intern duty certificate for completion of a two-year internship training program in an accredited HPCSA facility
3. Administrative requirements
4. Minimum requirements: Portfolio of Evidence
5. Discipline-specific Learning outcomes
 - 5.1 Professional conduct and Ethical rules
 - 5.2 Good laboratory practice (GLP) and Laboratory Safety
 - 5.3 Quality Management
 - 5.4 Scientific and Discipline-Specific Knowledge
 - 5.5 Competency Training
 - 5.6 Principles of Research
6. Final approval by the supervisor to take exit examination and submission of Portfolio of Evidence for assessment and moderation by the HPCA
7. Final exit examination by training facility
8. Final outcome by HPCSA
9. Registration
10. List of tables
 - 10.1 Possible examples of tables

1. DETAILS OF INTERN MEDICAL SCIENTIST

Name and Surname of Intern Candidate	HPCSA Intern Registration No
	Registration date
Professional Category	
Name of HPCSA Accredited Training Facility	
Name of Head of Training Facility	
Name of HPCSA Accredited Training Program	
Name of Head of Training Program / Department	
Supervisor	HPCSA Registration No
Professional Category	Registration date

2. FORM MSC C – INTERN DUTY CERTIFICATE: MEDICAL BIOLOGICAL SCIENCE

COMPLETION OF 2-YEAR INTERNSHIP TRAINING AT AN HPCSA ACCREDITED TRAINING FACILITY

1. COURSE OBJECTIVES <i>At the end of the training program the candidate should have gained knowledge, expertise, skill and a certain degree of experience in the following areas:</i>	PERIOD		Signature of Head of Training Department or official deputy confirming that the internship period had been completed satisfactorily and in an approved diagnostic/clinical setting		
	FROM	TO	PRINTED NAME	SIGNATURE	DATE
1.1 Application of basic scientific principles and academic knowledge					
1.2 Performance of laboratory methods and interpretation of patients results in a diagnostic environment (clinical practice - not in a research environment)					
1.3 Administration and management of laboratory in terms of staff, workflow and quality management in a diagnostic environment					
1.4 Application of ethical principles and good laboratory practice (GLP) in the practice of clinical diagnostics					
1.5 Bioinformatics and databases' (if applicable)					
1.6 Research principles and scientific reporting					
2. LEAVE TAKEN:					
2.1 Vacation leave			Total number of weeks		
2.2 Maternity leave			Total number of weeks		
2.3 Sick leave			Total number of weeks		

This signature is compulsory and validates internship training

Name and signature of Head of Training Facility

Official stamp

Date _____

No alterations to this document will be accepted

3. ADMINISTRATIVE REQUIREMENTS (FOR OFFICIAL USE)

Application received on		
Application received by		
MSIN date of registration		
Non-compliant	Return	
COMPLIANT:		
Identity document		
Qualifications		
HPCSA intern certificate		
Fees for assessment		
Form 36 MS		
Form 24 MS		

4. MINIMUM REQUIREMENTS: PORTFOLIO OF EVIDENCE

The Portfolio of Evidence is an evidence-based program and shall contain original evidence properly signed off by trainer and intern candidate. The Portfolio of Evidence shall be structured in a formal, manner as described in this document:

- All pages shall be numbered and reflected in the Contents page
- The portfolio shall contain all the components (as heading) and sub-components (as sub-headings)
- Assessment method shall be indicated and provided for each component.
- Each component shall be indicated by:
 - (i) a front page with the specific heading,
 - (ii) each sub-component shall be indicated by a page with the specific sub-heading, (iii) completed relevant table (as summary) and properly signed off by both candidate and trainer, (iv) evidence of assessment, (v) original signed off evidence.
- All components shall be listed in the proposed Tables listed below (Tables 1 to 12).

	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
Cover page:		
Full names		
MSIN number		
Discipline and professional category		
Period of internship		
Contact details of intern candidate Telephone: Email:		
Date of submission		
Contents page (numbered) containing all the components, sub-components, assessment, tables, exit assessment by the training facility.		
Letter from head/s of training program/s (including the following): *(if more than one training facility involved in training, letters must be submitted from both facilities)		
Period of internship (dates)		
Copy of HPCSA-approved training program		
CV of candidate		
Rotation roster (including dates, duties, location and supervisor for entire internship period) – Table 1		

5. DISCIPLINE-SPECIFIC LEARNING OUTCOMES

5.1 Professional Conduct and Ethical Rules

	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
<i>SHALL be performed in a diagnostic/clinical setting. Knowledge and understanding of:</i>		
Professional Conduct and Ethical Rules – Table 2		
Guidelines and Acts – Table 3		
<i>Proof of assessment (including signature and date from training supervisor)</i>		
<i>Comments by assessor/reasons for non-compliance</i>		

5.2 Good Laboratory Practice and Laboratory Safety

	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
<i>Knowledge and understanding of:</i>		
Personal Protective Equipment (PPE)		
Safe handling, storage and disposal of chemicals		
Safe handling, storage and disposal of biological samples		
Management of chemical and biological spills		
Fire hazards and safety drill		

Physical and ergonomic hazards		
Safe handling, service and maintenance of equipment		
Exposure to laboratory management and administration		
<i>Proof of assessment (including signature and date from training supervisor)</i>		
<i>Comments by assessor/reasons for non-compliance</i>		
5.3 Quality Management		
<i>SHALL be performed in a diagnostic/clinical setting. Knowledge and understanding of:</i>		
	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
Laboratory accreditation and audits - Table 4		
Internal and External Quality Assurance programs - Table 5		
Validation of diagnostic test methods/platforms/kits – Table 6		
SOP's and guidelines – Table 7		
Operation and maintenance of lab equipment		
Non-conformances – identification and resolution		
<i>Proof of assessment (including signature and date from training supervisor)</i>		
<i>Comments by assessor/reasons for non-compliance</i>		

5.4 Scientific and Discipline-specific knowledge		
	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
List of appropriate text books/literature – Table 8		
List of journal clubs attended / presented – Table 9		
List of lectures / seminars / workshops / conferences / courses - Table 10		
List of assignments / case studies – Table 11		
¹ Proof of assessment (including signature and date from training supervisor)		
Comments by assessor/reasons for non-compliance		
5.5 Competency Training		
<i>MUST be performed in a diagnostic/clinical setting</i>		
	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
List of all practical competencies – Table 12 (include competency level - refers to Table 12 as example)		
Understanding the principles and application of a test method in a clinical/diagnostic setting		
Trouble-shooting of a test method		
Understanding the limitations of a test method		

Ability to interpret a finding in clinical practice and report result		
<i>Proof of assessment (including signature and date from training supervisor)</i>		
<i>Comments by assessor/reasons for non-compliance</i>		
5.6 Principles of Research		
<i>Knowledge and understanding of:</i>		
	To be completed by intern Yes (include page no.) or No (provide reasons)	Compliance (assessor/moderator) Yes or No (if no please provide reasons)
Protocol development and appropriate use of published literature (literature review)		
Research ethics		
Plagiarism		
Funding and budgeting		
Biostatistics and / or databases (if applicable)		
Scientific report to be prepared in the following format: Abstract (250-300 words), Introduction, Methods, Results, Discussion, Conclusion, References		
Presentation (Power Point)		
Peer-reviewed assessment (by peers of the training team)		
<i>Proof of assessment (including signature and date from training supervisor)</i>		
<i>Comments by assessor/reasons for non-compliance (to include on each item)</i>		

	<i>Name and Signature</i>	<i>Date</i>
6. Final approval by the supervisor of the Portfolio of Evidence and permission to take the facility-based exit-assessment		
7. Final exit assessment by training facility (Head of Training Program)		
8. Final outcome by HPCSA	Approved / Failed / Revised	
9. Registration by HPCSA		

Documentation for all forms of assessment done during the training period needs to be included. It is important to note that proof of skills or competency should be in the form of tests/assignments/case reports or similar. Proof of on-the-bench training only i.e. technical competency is not sufficient.

List all components of the training program in tables. These have to be signed and dated by the candidate and verified by internal assessor or supervisor.

9. LIST OF TABLES TO BE SUBMITTED

- Table 1. Rotation roster during two-year internship
- Table 2. Professional conduct and Ethical rules
- Table 3. Guidelines and Acts
- Table 4. Laboratory audits
- Table 5. IQC / EQA programs
- Table 6. Validation of diagnostic test methods / platforms / kits
- Table 7. Laboratory SOPs
- Table 8. List of textbooks//Literature
- Table 9. List of journal clubs attended and presented
- Table 10. List of lectures / seminars / workshops / conferences / courses (indicate attendance / presentation)
- Table 11. List of assessments / assignments / case studies
- Table 12. List of all practical / technical competencies and level of competency i.e. theoretical versus supervised practice versus able to perform independently

Evidence SHALL be provided under the appropriate heading indicated below – please summarize activities and provide evidence to support listed activities.

9.1 Possible examples of tables

Table1. Rotations Roster

Name of Laboratory	From	To	Total Period	Supervisor signature
Short description of activities				
Name of Laboratory	From	To	Total Period	Supervisor signature
Short description of activities				
Name of Laboratory	From	To	Total Period	Supervisor signature
Short description of activities				

Table 2. Professional conduct and Ethical rules

Subject	Method of Instruction	Method of Assessment	Pass /Fail	Date	Signature of intern candidate	Signature of trainer

Table 3. Guidelines and Acts

Subject	Method of Instruction	Method of Assessment	Pass /Fail	Date	Signature of intern candidate	Signature of trainer

Table 4. Laboratory audits

Type of Audit	Method of Instruction	Method of Assessment	Number of non-conformances	Date	Signature of intern candidate	Signature of trainer

Table 5. IQC / EQA programs

Program	Number of challenges	Outcome in percentage	Date	Signature of intern candidate	Signature of trainer

Table 6. Validation of diagnostic test methods / platforms / kits

Test method / Platform / Kit	Outcome	Date	Signature of intern candidate	Signature of trainer

Table 7. Laboratory SOPs

Subject	Method of Instruction	Method of Assessment	Pass /Fail	Date	Signature of intern candidate	Signature of trainer

Table 8. List of textbooks

Textbook / prescribed material	Author

Table 9. List of journal clubs attended and presented

Date	Subject	Presented	Attended	Signature of intern candidate	Signature of trainer

Table 10. List of lectures / seminars / workshops / conferences / courses

Date	Lectures / Seminars / Workshops / Conferences / Courses	Presented	Attended	Signature of intern candidate	Signature of trainer

Table 11. List of assessments / assignments / case studies

Date	Assessments / Assignments / Case studies	Presented	Attended	Signature of intern candidate	Signature of trainer

Table 12. List of all practical / technical competencies and level of competency

Method / technique / instrument	Competency levels (signed and dated by supervisor)				Comment/Note
	*1	*2	*3	*4	

- *1. Observe a demonstration
- *2. Perform under supervision
- *3. Perform independently
- *4. Extensive experience