



TRAINEE HANDBOOK 2012
SPECIFIC REQUIREMENTS FOR
DIPLOMA in NEUROPATHOLOGY

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GLOSSARY

ANZNP	Australian and New Zealand Society of Neuropathology
CADASIL	Cerebral autosomal dominant arteriopathy with subcortical infarcts and leukoencephalopathy
CbD	Case-based Discussion
CPDP	RCPA Continuing Professional Development Program
CSF	Cerebrospinal fluid
DOPS	Directly Observed Practical Skills
FISH	Fluorescence in-situ hybridization
HIV	Human immunodeficiency virus
IANZ	International Accreditation New Zealand
ISN	International Society of Neuropathology
MDT	Multidisciplinary team
MELAS	Mitochondrial encephalopathy, lactic acidosis, and stroke-like episodes
NATA	National Association of Testing Authorities
NPAAC	National Pathology Accreditation Advisory Council
OHS	Occupational health and safety
PPD	Personal and professional development
QA	Quality assurance
QAP	RCPA Quality Assurance Programs Pty Ltd
RCPA	Royal College of Pathologists of Australasia
RCPA	Royal College of Pathologists of Australasia
SIDS	Sudden infant death syndrome
SOP	Standard Operating Procedure

SECTION 1

INTRODUCTION

The College offers a post-Fellowship Diploma in Neuropathology (Dip. Neuropath) for Fellows who have completed Fellowship in the disciplines of Anatomical Pathology, Forensic Pathology and General Pathology.

GENERAL AIMS OF THE TRAINING PROGRAM

The aims of the Diploma in Neuropathology are to:

- Certify professional expertise in Neuropathology;
- Allow Fellows whose practice includes a substantial component of Neuropathology to demonstrate further expertise in Neuropathology

ENROLMENT AND FEES

Fellows intending to train for the Diploma should write to the Registrar of the Board of Censors with details of their training position (full time or part time) and training program. This should be accompanied by a confirmatory letter from the supervisor(s) of the planned training program.

Training fees will be notified. In addition, Fellows will be expected to continue payment of annual membership fees. Examination fees are payable at the time of the examination application.

TRAINING REQUIREMENTS

The Diploma course of training includes the following:

- Twelve months equivalent full time experience in laboratories or institutes approved by the RCPA Board of Censors for training in Neuropathology. These would include Anatomical Pathology laboratories or institutes in which there is exposure to neuropathology incorporating; central nervous system tumours, neurodegenerative diseases, muscle and nerve diseases, paediatric neuropathology, forensic neuropathology, molecular pathology applicable to brain, nerve or muscle. Trainees may choose to incorporate fetal neuropathology into their program at the expense of a component of other mandatory requirements upon negotiation with the Chief Examiner;
- Consideration may be given to a period of pre-Fellowship training specifically in Neuropathology.

Fellows who have completed the required twelve (12) months experience are eligible for immediate award of the Diploma on successful completion of the examinations and all portfolio requirements, including logbook requirements. Please refer to Appendix 1 for details of assessment. For those who take the examination part-way during this period, award of the Diploma is deferred until the requisite 12 months experience is complete.

SUPERVISION

All training must be supervised. Trainees may nominate their own supervisor. More than one supervisor can be nominated, eg, if trainees divide the year between two or more unrelated laboratories. The College recommends that any one supervisor be responsible for no more than two trainees.

Who can be a supervisor?

The supervisor will normally be a Fellow of the RCPA; however non-Fellows may be approved by the Board of Censors if no Fellow is available. If the trainee spends significant periods working in an area where the supervisor has no personal involvement, the supervisor must certify that suitable supervision is being provided. The supervisor must also ensure that adequate supervision is arranged in their absence.

In some circumstances shared supervision may be necessary, but there must be a nominated primary supervisor with overall responsibility. Trainees working towards higher academic degrees (e.g. PhD), who find that their research supervisor is not suitable to be the RCPA training supervisor, should have a FRCPA co-supervisor.

The role of the supervisor

Supervisors should devise a prospective training (or research) program, on initial registration and annually. This should be devised in collaboration with the trainee and submitted to the Registrar of the Board of Censors. Supervisors should also ensure that the trainee has sufficient time and opportunities to carry out the required training activities.

Supervisors, and others to whom aspects of training have been delegated, are expected to monitor and provide regular feedback on the development of the trainee's competence. They should meet regularly with the Trainee; observe their laboratory performance and interaction with scientists, peers and clinicians; and review result reporting. This may be delegated to other trainers where appropriate, eg, when the trainee is on secondment to another laboratory for a segment of training.

The formal duties of supervisors, such as requirements to report the trainee's progress to the Board of Censors, are described in the RCPA Induction Manual for Supervisors and the RCPA policy on the Role of the Supervisor. Please refer to these documents for detailed information

ASSESSMENT

Assessment is by examination, project work and workplace-based assessment. Records of workplace-based achievements during training should be collected in a portfolio and submitted as evidence of competence.

Examinations

1. A **structured oral examination** encompassing all areas of Neuropathology, including: CNS tumours, neurodegenerative diseases, diseases of nerve and muscle, molecular pathology, forensic neuropathology, laboratory management and an option in fetal neuropathology.
2. A **slide (practical) examination** comprising 20 Neuropathology cases to be marked as for the Part 2 Slides Practical examination in Anatomical Pathology

Portfolio and workplace-based assessment

A variety of activities are to be completed to provide evidence of technical competence as well as broader professional development. Evidence of achievement is to be assembled in the portfolio

In summary these include the following:

- three (3) examples of personal professional development (PPD)
- brain and spinal cord autopsy examinations
- full autopsy examination
- cytology of brain smears and CSF
- neurosurgical cases
- nerve reports
- muscle reports
- frozen sections
- histochemical and immunohistochemical methods
- understanding of the applications of molecular pathology
- presentations at clinico-pathological meetings
- laboratory workplace health and safety, quality Issues and management issues

Please refer to the Portfolio Guidelines (Appendix 3) for specific requirements.

LIMITED EXAMINATION FOR NEUROPATHOLOGY DIPLOMA

At its discretion, with the exception of the oral examination, the Board of Censors may waive any component of the assessment, depending on the candidate's qualifications and experience.

Applicants for an oral examination only should be nominated by a College Fellow, or the Head of the Department or another pathologist of equivalent status from the department in which they work.

The applicant should:

- be a Fellow of the RCPA; and
- Have substantial full time experience as a specialist in Neuropathology (eg full or part-time experience as a specialist in Anatomical, Forensic or General Pathology and Neuropathology amounting to more than 10 years in aggregate, of which more than 5 years shall be in Neuropathology); or
- Have significant experience in a senior administrative or academic post with a substantial professional component in Neuropathology (e.g. full or part-time experience as a specialist in Anatomical, Forensic or General Pathology, and Neuropathology

amounting to more than 10 years in aggregate, of which more than 5 years shall be in Neuropathology).

Fellows with less than a total of ten (10) years' specialty, senior academic or administrative experience are unlikely to be approved unless there are exceptional circumstances. In this situation, the applicant and sponsor should detail why they believe an exception may be justifiable.

Approval for the oral only form of examination is most likely for those Fellows who fulfill at least one and preferably several of the following criteria:

- Have a national and international reputation among peers for excellence in Neuropathology;
- Are a major contributor to Neuropathology through publications (books; book chapters; or papers published in peer-refereed journals); or have presented or given invited lectures at national and international scientific meetings. Candidates with fewer than 20-30 publications or presentations are unlikely to be successful;
- Are members of national or international committees related to Neuropathology ;
- Substantially contribute to professional organisations such as learned Colleges in Neuropathology;
- Consult or advise government, academic or professional bodies in Neuropathology;
- Have national or international awards recognising research achievements or professional excellence, or for other contributions in Neuropathology.

Applicants and their sponsors should address these selection criteria in their applications, and may request for one or more of these criteria to be weighted.

The RCPA Board of Censors should receive the application including the applicant's curriculum vitae, and any supporting documents and reports from a maximum of three referees. Because referee reports may take time, the Fellows and their sponsors should send applications well in advance of the examination application closing date, which is the last working day in February each year.

At its discretion, the Board of Censors may vary any of the above guidelines depending on the circumstances and merits of a particular case.

RESOURCES

1. WHO Classification of Tumours of the Central Nervous System, W.K. Cavenee, D.N. Louise, H.Ohgaki, O.D. Wiestler, ISBN13: 9789283224303, Publication Date: 20/01/2006, Edition: 4.
2. Greenfields Neuropathology, Joseph Godwin Greenfield, Seth Love, David W. Ellison, David, N. Louise, Hodder Education, ISBN13: 9780340906811, Publication Date: 29/02/2008, Edition 8.
3. Smears and Frozen Sections in Surgical Neuropathology, Peter Burger, ISBN13: 9780692003169, Burger Medical Publishing, LLC, Publication Date: 12/10/2009, Latest Edition.
4. Diagnostic Neuropathology, Oppenheimer, Blackwell Science Ltd, ISBN13: 9780632019519, Latest edition.
5. Diagnostic Pathology of Nervous System Tumours, James W. Ironside, Tim H. Moss, David N. Louise, James S. Lowe, Roy O. Weller, Elsevier Health Sciences, ISBN13: 9780443045585, Publication Date: 28/05/2002, Edition: ?
6. Forensic Neuropathology, Helen L. Whitwell, Hodder Education, ISBN13: 9780340700044, Publication Date: 25/11/2005, Latest Edition.
7. Muscle Pathology, Victor Dubowitz, Caroline A. Sewry, Elsevier Health Sciences, Publication Date: 15/12/2005, Edition: 3.
8. Peripheral Neuropathy, Peter James Dyck, P.K. Thomas, Elsevier Health Sciences, ISBN13: 9780721694917, Publication Date: 29/04/2005, Edition: 4.
9. Non-Neoplastic Disease Central Nervous System, Louis D N Frosch, M P, ISBN: 9781933477084, Publication Date: 05/03/2010, Edition: 1.
10. Neurodegeneration: The molecular Pathology of dementia and movement disorders. Dickson and Weller. ISN Neuropath, publication 2011.
11. Cerebrovascular disease. ISN Neuropath 2011 edition.
12. Developmental Neuropathology. ISN Neuropath 2011 edition.

SECTION 2

LEARNING OUTCOMES AND RECOMMENDED TRAINING ACTIVITIES

The major functions of the neuropathologist can be categorised as

- Discipline specific functions as a medical specialist in the laboratory
- Functions as a manager in the laboratory
- Other professional functions of neuropathologists
- Generic processes employed by neuropathologists

In Section 2 of this Handbook, the discipline-specific functions are elaborated as a list of training outcomes and the activities that Trainees are recommended to perform in order to achieve the outcomes.

1 Discipline specific functions as a medical specialist in the laboratory

- 1.1 Accession, management, processing and analysis of specimens
- 1.2 Storage and retrieval of laboratory data
- 1.3 Developing and reporting a professional opinion
- 1.4 Monitoring patient progress

2 Functions as a manager in the laboratory

- 2.1 Quality assurance
- 2.2 Laboratory safety
- 2.3 Compliance with legislation
- 2.4 Managing people
- 2.5 Managing resources

3 Other professional functions of neuropathologists

- 3.1 Research and critical appraisal
- 3.2 Undertaking self-education and continuing professional development
- 3.3 Educating colleagues and others

4 Generic processes employed by neuropathologists

- 4.1 Patient safety
- 4.2 Ethics and confidentiality
- 4.3 Communication
- 4.4 Collaboration and teamwork

1 DISCIPLINE-SPECIFIC FUNCTIONS AS A MEDICAL SPECIALIST IN THE LABORATORY

Experienced neuropathologists demonstrate specialised expertise in all aspects of Neuropathology. This includes surgical pathology (non-tumour and tumour biopsies and excision specimens), brain and spinal cord autopsy pathology (coronial and non-coronial), muscle and nerve pathology and cytology. They also demonstrate expertise in neuropathology and clinical correlation and provide a consultative service to clinicians and pathologists in cases requiring a specialist Neuropathology opinion.

By the end of training, trainees are expected to demonstrate that they have acquired the experience, specialized skills and knowledge in the above areas to function as a neuropathologist.

The following lists of learning outcomes and activities are a guide as to what trainees should have achieved by the end of training.

1.1 Accession, management, processing and analysis of specimens

Outcomes

1.1.1 *Knowledge and skills - general*

- Understand basic anatomy, embryology, physiology, biochemistry and molecular pathology as applied to brain, spinal cord, muscle and nerve at a level that enables the competent performance of routine duties;
- Understand the pathology and pathogenesis of diseases of the central nervous system, peripheral nervous system and skeletal muscle;
- Demonstrate expertise in selecting, performing and advising on the most appropriate method/technique for the investigation and diagnosis of diseases of brain, spinal cord, muscle and nerve;
- Make accurate correlations with clinical diagnoses;
- Competently perform specialist autopsies that include brain, meninges, skull, nerve roots, spinal cord, peripheral nervous system, autonomic nervous system, skeletal muscle;
- Demonstrate expertise in interpreting post-mortem histological findings and ancillary investigations and recognize the limitations of such investigations;
- Competently perform and report frozen sections;
- Understand principles of histochemical and immunohistochemical methods appropriate to neuropathology and know when to use them;
- Recognise histological features of histochemical and immunohistochemical stains in normal and diseased tissues from a wide range of neuropathological specimens;
- Understand principles of common western blot and molecular pathology techniques and electron microscopy as applied to neuropathology;
- Demonstrate expertise in reporting cytology from neurological patients and understand the use and limitations of cytology in neuropathology.

1.1.2 *Intra-operative, frozen sections, smears and biopsy*

- Demonstrate expertise in interpretation of histological appearances in a wide range of neurosurgical pathology, including tumour and non-tumour pathology, inherited disorders and infections;

- Competently use techniques such as: photography, radiology, cytogenetics, flow cytometry, immunohistochemistry, immunofluorescence, electron microscopy and FISH as appropriate;
- Competently cover all the following areas:
 - Mass lesions of skull/bone
 - Mass lesions of meninges
 - Mass lesions of sella turcica
 - Mass lesions of the pineal gland
 - Mass lesions of brain and spinal cord
 - Mass lesions of nerve roots
 - Lesions of temporal lobe epilepsy
 - Focal or diffuse cerebral white matter lesions
 - Focal or diffuse cerebral lesions in immunosuppressed patients

1.1.3 Diagnosis of dementia including neurodegenerative diseases

- Competently cover the neuropathologic diagnosis of causes of dementia
 - Amyloid
 - CADASIL
 - Vasculitis
 - Paraneoplastic disease
 - Prion diseases
 - HIV
 - Metabolic diseases
 - Alzheimer's disease
 - Lewy body diseases
 - Frontotemporal dementia
 - Tauopathies
 - Synucleinopathies
 - Motor neuron disease
 - other

1.1.4 Diagnosis of headache (in absence of a mass lesion) including;

- Competently cover the neuropathologic diagnosis of causes of headache in the absence of a mass lesion:
 - Amyloid angiopathy
 - Cerebral vasculitis
 - Meningeal carcinomatosis
 - Chronic inflammation of the meninges
 - Diffusely infiltrating glial tumour

1.1.5 Diagnosis of stroke (infarction and hemorrhage) including;

- Competently cover the neuropathologic diagnosis of stroke due to infarction or haemorrhage
 - Amyloid angiopathy
 - Cerebral vasculitis
 - Bleed into a tumour
 - MELAS
 - AV malformation
 - CADASIL

1.1.6 Diagnosis of diseases of skeletal muscle

- Diagnose weakness, muscle pain, muscle wasting in muscle diseases including;
 - Diseases of the extracellular matrix
 - Immune/inflammatory myopathies
 - Toxic myopathies
 - Myofibrillary myopathies

- Congenital myopathies
- Dystrophies
- Other
- Use ancillary tests: immunofluorescence, immunoperoxidase, biochemical assays, electron microscopic analysis, western blot techniques

1.1.7 Diagnosis of diseases of peripheral nerve

- Competently diagnose
 - Axonal neuropathies
 - Demyelinating neuropathies
- Use standard nerve fixation, nerve tease, nerve montage

1.1.8 CSF cytology

- Conduct diagnostic investigations of CSF for any reason
- Competently perform laboratory techniques for CSF analysis
- Competently perform 14-3-3 protein analysis of CSF

1.1.9 Neuropathology autopsy

- Conduct autopsies that include brain, meninges, skull, nerve roots, spinal cord, peripheral nervous system, autonomic nervous system, skeletal muscle
- Specific areas to include analysis of cases of;
 - Head injury
 - Neurologic complications of medical and surgical cause
- Specific areas to have an overview of and to have observed but not for examination or mandatory reporting;
 - Sudden infant death syndrome (SIDS)
 - Developmental abnormalities
 - Arthrogryposis multiplex

In relation to all the above outcomes, select activities that are appropriate to your training environment and, if relevant, keep a record for your portfolio

- Report a minimum of 300 biopsy cases. Logbook to be signed off by supervisor. This is a **mandatory** activity. Please refer to Portfolio Guidelines;
- Attend and report to surgeon (if permitted in training institution) a minimum of 50 frozen sections to be documented and signed off by supervisor;
- Report a minimum of 75 brain only autopsies. This is a **mandatory** activity and must include at least 50% as neurodegenerative diseases and at least one from each of the categories outlined in the portfolio;
- Report a minimum of 15 brain and spinal cord autopsies. This is a **mandatory activity**;
- Supply ten (10) de-identified reports, to be signed off by supervisor, indicating correct use and value in diagnosis of the following techniques:
 - histochemistry and immunohistochemistry
 - common western blot and molecular pathology techniques
 - electron microscopy as applied to neuropathology
- Perform brain and spinal cord dissections;
- Use ancillary tests; immunofluorescence, immunoperoxidase, biochemical assays, electron microscopic analysis, western blot techniques;
- Read text books, journals;
- Attend multidisciplinary team meetings in both tumour and muscle/nerve clinical sessions.

1.2 Storage and Retrieval of Laboratory Data

Outcomes

- Explain the principles and procedures involved in establishing a specimen storage and retrieval system;
- Conform to the specimen indexation and report and data storage conventions of the laboratory.

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Read laboratory manual;
- Read NATA and NPAAC guidelines;
- Participate in daily laboratory activities.

1.3 Developing and reporting a professional opinion

Outcomes

- Make careful observations, describe accurately, record observations succinctly, with use of photography and video when appropriate;
- Demonstrate respect for the need for accuracy, attention to detail and timeliness in the performance of all duties;
- Understand the limitations of pathological findings in the explanation of some neurodegenerative diseases and diseases of nerve and muscle;
- Understand the limitations of own ability to interpret findings and the need to seek a second opinion.

Select activities that are appropriate to your training environment and, if relevant, keep a record for your portfolio

- Write reports for autopsies, frozen sections, tissue biopsies, muscle and nerve biopsies.
- Discuss diagnoses with clinical colleagues eg, in a multidisciplinary team setting
- Provide evidence of having attended at least 30 clinical meetings (must include neurosurgical and neurology meetings, with incorporation of brain, nerve and muscle biopsy cases) during the training period and prepare and present cases at 15 of these meetings. Sign off by supervisor required.

2 FUNCTIONS OF THE NEUROPATHOLOGIST AS MANAGER IN THE LABORATORY

Experienced neuropathologists have a significant role in safely and effectively managing the laboratory in the context of finite resources. They ensure cost-effective work practices through staffing and by developing policies and procedures based on appropriate use of information and evidence. They ensure that occupational health and safety protocols are observed in all aspects of the accession, management and processing of specimens. They demonstrate leadership in the organisation to promote safe patient care and they identify matters that are reportable to the coroner.

By the end of training, trainees are expected to carry out all these functions. In particular they should understand and be able to apply workplace health and safety protocols to all aspects of accessioning, management and processing of specimen and ensure cost effective work practices

The following lists of learning outcomes and suggested activities are a guide as to what trainees should have achieved by the end of training.

2.1 Quality Assurance

Outcomes

- Apply, review and plan quality assurance strategies for monitoring processes and outputs in the laboratory
- Participate in evaluating the cost-effectiveness of current and proposed laboratory procedures and equipment in the context of limited resources.

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Review summaries of relevant requirements for laboratory accreditation and performance, for example the NATA Checklist for Laboratory Accreditation.
- Participate in case/slide/laboratory/clinical rounds, peer review meetings, external quality assurance (e.g. RCPA QAP) and continuing professional development activities
- Read current literature on QA strategies, risk management, informatics and evidence based medicine in neuropathology laboratories.
- Participate in workflow checks to ensure effective and efficient laboratory function
- Recognise, report and analyse quality problems when they arise in the laboratory
- Participate in implementing plans for testing and evaluating measures to improve the quality of laboratory practice and patient care.
- Complete the Quality Management module in the All Trainees/Learning Modules section of RCPA Education Online.

2.2 Laboratory Safety

Outcomes

- Apply, review and plan laboratory safety procedures, to protect self and staff against infection (particularly prion disease), radiation, toxic materials, electrical and fire hazards.
- Apply and evaluate processes for assessing risk and investigating and reporting hazards, in accordance with legal aspects of investigation and disclosure
- Analyse incident reports and near misses to identify opportunities for improvements in practice
- Contribute to the management of staff needs in the event of an adverse event in the laboratory

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Participate in orientation program for new staff members
- Schedule meeting with workplace occupational health and safety (OHS) Officer
- Participate in OHS drills and meetings, especially fire safety
- Participate in training to use equipment for biological, chemical and fire safety, first aid and resuscitation
- Review incident reports and explore improvements if relevant
- Follow relevant laboratory safety protocols and report breaches
- Wear appropriate safety (personal protective) equipment when in the laboratory
- Ensure relevant personal vaccinations are completed prior to commencement of duties
- Complete the Laboratory Safety module in the All Trainees/Learning Modules section of RCPA Online.

2.3 Compliance with Legislation

Outcomes

- Understand legal and ethical aspects of neuropathology.
- Demonstrate basic knowledge of requirements of Approved Pathology Provider (Australia) or other relevant undertakings.
- Operate with awareness of the potential for medical litigation and the role of pathologists as defendants or consultants, and apply appropriate risk management strategies.
- Ensure laboratory compliance with current requirements for notifiable diseases
- Identify acceptable standards of billing practice appropriate to the work setting

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Review summaries and seek advice from appropriate senior staff.
- Locate sources of pathology financing information, e.g. Medicare Benefits Schedule, Health Insurance Act or other documentation relevant to your jurisdiction
- Document incidents and discussions with medicolegal implications and discuss with supervisor or a senior colleague
- Review laboratory manuals and State/Territory/country legislation regarding notifiable diseases
- Maintain currency with the relevant requirements for notifiable diseases

2.4 Managing People

Outcomes

- Review and use orientation and training protocols for new staff
- Provide supervision and constructive feedback to staff
- Display skills in conflict resolution in the workplace.
- Behave in accordance with equal opportunity and antidiscrimination practices in the workplace

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Participate in staff and business meetings in the Department
- Observe administrative procedures in relation to selection and appointment of staff.
- Reflect on observations of interactions in the workplace.

- Participate in training on giving and receiving feedback and/or read articles on the subject
- Participate in a conflict resolution course and/or read articles on the subject
- Assist in the orientation and mentoring of junior colleagues
- Participate as a representative on College committees

2.5 Managing resources

Outcomes

- Describe budgetary considerations in an established anatomical pathology laboratory
- Describe issues concerned with the assessment, procurement, installation, maintenance and use of laboratory equipment and electronic information systems
- Identify sources of funding for laboratory testing

Select activities that are appropriate to your training environment and, if relevant, keep a record for your *Portfolio*

- Review and discuss with senior staff laboratory budget reports including income, expenditure, salary, overtime, annual leave and sick leave costs, maintenance and consumables costs
- Participate as an observer in committees concerned with resource management
- Teach colleagues to use new laboratory equipment and IT software and hardware.
- Attend training sessions concerned with implementing new technology, noting costs and benefits of the technology
- Access Medicare Benefits Schedule and other documents relevant to your jurisdiction
- Demonstrate judicious use of auxiliary investigations and immunohistochemical stains

3 OTHER PROFESSIONAL FUNCTIONS OF THE NEUROPATHOLOGIST

Experienced neuropathologists maintain their professional competence through self-education throughout their career. They contribute to the body of knowledge and/or enhancement of practice in their discipline through research and by educating colleagues. They continuously reflect on their practice and demonstrate and promote professional behaviour and attitudes at all times, being responsible and accountable to colleagues and the community.

The following lists of learning outcomes and suggested activities are a guide as to what trainees should have achieved by the end of training.

3.1 Research and critical appraisal

Outcomes

- Critically appraise sources of medical information, discriminating between them in terms of their currency, format, authority and relevance.
- Develop a personal strategy, using IT software where appropriate, to discover, store, access and share information resources.
- Apply and interpret basic statistical and epidemiological concepts and data
- Demonstrate skill in developing a research proposal, conducting appropriate research activities and writing up for peer review/publication
- Comply with the requirements of relevant bodies concerned with ethics in human and animal research
- Prepare reports and papers for publication that comply with the conventions and guidelines for reporting biomedical research
- Contribute to data analysis and publication in the department

Select activities that are appropriate to your training environment and, if relevant, keep a record for your portfolio

- Undertake at least one project under supervision and write up for submission for publication
- Participate in and present cases, reviews and original work, to peers at grand rounds, specialist meetings, journal club, etc
- Attend research meetings
- Contribute to writing research proposals and ethics submissions
- Use clinical and laboratory databases for research for collecting, organizing and analysing data.
- Use a standard bibliographic application (e.g. EndNote) to download citations from a search and organise them into a personal database.
- Read reference material on basic statistical concepts including distribution, mean, median, standard deviation, statistical significance, confidence intervals, correlation, sensitivity, specificity, predictive values, incidence and prevalence
- Consult a medical librarian, statistician or researcher

3.2 Undertaking Self-Education and Continuing Professional Development

Outcomes

- As part of a personal continuing education strategy, practice the habit of identifying and documenting own learning needs, planning educational strategies to meet them, monitoring achievements through self-assessment and reflecting on the outcomes.
- Identify personal learning preferences and reflect on how effective they are in developing competence
- Demonstrate up to date knowledge of and ability to appraise medical and pathological literature and innovations in areas relevant to anatomical neuropathology.

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Formulate a personal learning plan
- Complete an online learning style inventory and explore a variety of ways to learn
- Apply various computer-based instructional tools, such as electronic tutorials for confirming or updating knowledge and skills.
- Review RCPA CPDP documentation to identify and apply activities and recording strategies that may be applicable.
- Select relevant mentors to guide professional activities
- Regularly review journals relevant to anatomical neuropathology and participate in or lead discussions on contemporary issues
- Participate in and present personal work at relevant educational meetings and journal clubs.
- Participate in case/slide/laboratory/clinical rounds, peer review meetings, external quality assurance (e.g. RCPA QAP) and continuing professional development activities

3.3 Educating Colleagues and others

Outcomes

- Prepare and deliver educational sessions, incorporating the principles of adult learning and using effective oral, visual or written modes, and reflect on their effectiveness
- Contribute to the informal education of laboratory personnel, peers, medical students and other health professionals
- Translate and convey technical concepts and information in an understandable manner to people without a background in anatomical neuropathology.

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Participate in and contribute to departmental teaching sessions, clinico-pathological meetings, conference presentations
- Prepare posters or educational articles of scientific investigations in pathology and present to peers and other health professionals.
- Mentor students and other trainees and advise on effective preparation for examinations
- Read journals relevant to anatomical neuropathology, including articles on effective teaching strategies
- Participate in training on the effective teaching and supervision of adult learners in laboratory and clinical settings, such as the "Teaching on the Run" program
- Seek evidence of own teaching effectiveness

4 GENERIC PROCESSES EMPLOYED BY THE NEUROPATHOLOGIST

Experienced neuropathologists ensure patient safety through timely, accurate, appropriate, ethical use of investigations. They show respect for patient confidentiality and rights. They collaborate and communicate appropriately with others, showing awareness of cultural and linguistic diversity.

By the end of training, trainees are expected to respect patient rights and confidentiality, ensure patient safety and communicate appropriately.

4.1 Patient Safety

Outcomes

- Advocate for, and protect, patient rights.
- Promote understanding of health and disease, including relevant epidemiology and public health issues, to patients, clinicians and the community.
- Promote timely and appropriate use of pathology investigations
- Apply risk management strategies to minimise errors
- Knowing own limitations and when to refer

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Access and read relevant sections of the National Patient Safety Education Framework document.

4.2 Ethics and Confidentiality

Outcomes

- Demonstrate respect for parents' points of view and wishes and act with compassion at all times
- Practice ethically, which includes:
 - promptness of reporting
 - interacting appropriately with clinicians, laboratory staff and other health professionals
 - knowing when to seek opinion from others
 - financial probity
- Comply with legal, ethical and medical requirements relating to patient records and documentation, including confidentiality, informed consent and data security.
- Differentiate between ethically appropriate and ethically inappropriate procedures.
- Identify appropriate courses of action in regard to unprofessional conduct by or ill health in a colleague.
- Comply with copyright and intellectual property rules.
- Recognise and respect cultural and religious factors impacting on professional practice.
- Describe strategies to ensure equity of access to pathology testing for patients

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- (from 2012) Complete the Ethics module in the All Trainees/Learning Modules section of RCPA Education Online.

- Review appropriate literature and guidelines including the National Patient Safety Education Framework
- Read the most recent Australian Medical Association Code of Ethics
- Read the Australian Medical Council Good Medical Practice Code of Conduct
- Access and read documents relating to cultural competence, including those concerning indigenous people, such as Aboriginal and Torres Strait Islander and Maori people
- Reflect on professional behaviour of self and others, identifying potential for ethical dilemmas and strategies to deal with them

4.3 Communication

Outcomes

- Employ effective oral, written and electronic communication strategies, including the production of concise, grammatically correct written reports.
- Use appropriate language in all communications, showing awareness of cultural and linguistic diversity.
- Demonstrate good interpersonal communication skills such as active listening and accepting and offering appraisal
- Comply with guidelines for handling sensitive information.
- Advise laboratory staff about testing methodologies, quality assurance techniques and delineating protocols for the issuing of results
- Advise clinicians on the choice and performance of laboratory procedures and the interpretation and relevance of pathological findings, taking into account clinicians' and patients' needs.
- Consult with clinical specialists and pathologists on issues of patient care and professional practice and in seeking and providing referral opinion on difficult cases

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Participate in training sessions on communications, cross-cultural communications, presentation skills, etc.
- Compose written reports at an appropriate level of responsibility and
- seek feedback from supervisor, colleagues and clinicians
- Document telephone communication of pathological findings, interpretations, clarification of requests and complaints where appropriate, seeking feedback from supervisors and colleagues
- Read documents relating to etiquette and proper use of electronic communications such as email
- Consult style guides for correct use of grammar and terminology for written communications
- Demonstrate findings to clinicians with clear clinico-pathological correlation
- Participate in clinico-pathological meetings
- Liaise with clinicians as to the most appropriate specimen for diagnosis
- Give expert neuropathologic consultative opinion and advice on referred cases

4.4 Collaboration and teamwork

Outcomes

- Contribute effectively to the activities of laboratory and health care teams, recognizing responsibilities and limitations of own role.
- Consult with laboratory colleagues, other medical practitioners and health care professionals

- Contribute effectively to inter-disciplinary team activities, such as peer review sessions and other education and quality activities, recognizing responsibilities and limitations of own role
- Promote the role of pathologists as vital contributors to patient care

Select activities that are appropriate to your training environment and, if relevant, keep a record for your Portfolio

- Identify the elements of an effective team and reflect on your observations of teams in your work place and others with which you interact
- Network and share information with colleagues, using available technologies
- Plan, organize and review teaching activities, together with supervisor, peers and laboratory staff.
- Participate in mentoring programs
- Participate in College activities and meetings
- Participate in departmental meetings

APPENDICES

- Appendix 1 Assessment
- Appendix 2: Supervisor's report form and guidelines
- Appendix 3 Portfolio Guidelines
- Appendix 4 Personal Professional Development (PPD) guidelines
- Appendix 5 Case report guidelines
- Appendix 6 Forms and logbook pages

Appendix 1

Assessment

Assessment of the Diploma in Neuropathology is by

- Formal examination
- A portfolio of evidence of having participated in a sufficient number and type of activities
- Satisfactory progress (supervisor's) reports.

All components must be passed to gain an overall pass.

Examinations

The examination has two components. Candidates who are successful in the slide examination will be invited to proceed to the oral examination.

Histopathology slide (practical) examination

This is a three (3) hour examination of 20 neuropathology cases to be marked as for the Part 2 Slides Practical examination in Anatomical Pathology. The examination will be held in designated examination centres.

In some cases, the diagnosis may not be straightforward or there may be no definite diagnosis. The emphasis will be on rational and scientific approaches to differential diagnosis as part of problem solving in diagnostic neuropathology

Candidates who fail the first attempt may repeat the slide examination in the next assessment cycle. Candidates who obtain a borderline result will be invited to participate in the oral examination however they will be examined on additional cases through discussion of these cases across a double header microscope with either the Chief or Associate Chief Examiner or other senior examiner. This opportunity will be at the discretion of the Chief Examiner and will not be available to any candidate obtaining a clear fail result.

Structured oral examination

The structured oral examination is held centrally for candidates who have passed slide examination. Candidates progress through a series of stations, each of which will take approximately ten (10) minutes to complete and will be examined by two examiners. The content of the examination encompasses all areas of neuropathology, including CNS tumours, neurodegenerative diseases, diseases of nerve and muscle, molecular pathology, forensic neuropathology, laboratory management and an option in fetal neuropathology.

Portfolio

The hard copy portfolio must be made available to the Supervisor to check periodically. To facilitate checking by the Supervisor, a print-out of the portfolio summary spreadsheet (Excel file format) must be included as the front page of the portfolio.

The hard copy portfolio and summary spreadsheet will be checked for completeness by the Supervisor at the time of the pre-examination Supervisor's report. It is strongly recommended that Trainees commence these activities at the earliest possible time after commencing training.

In summary, the portfolio activities include

- Autopsy brain and spinal cord examination
- Full autopsy examination
- Cytology of brain smears
- Neurosurgical cases

- Nerve reports
- Muscle reports
- Understanding of the applications of molecular pathology
- Presentations at multidisciplinary clinico-pathological meetings
- Laboratory workplace health and safety, quality Issues and management issues
- Peer-reviewed publication OR project OR conference presentations.

Detailed instructions are included in the Portfolio guidelines (Appendix 3) and on the forms that must be used to record the activities which are in Appendix 6). Detailed guidelines for activities related to personal professional development are in Appendix 4. The portfolio summary spreadsheet (Excel file) may be downloaded from the RCPA website.

A print-out of the portfolio summary spreadsheet should be appended to the pre-examination supervisor's report which is sent to the College. The summary will be reviewed by the Chief Examiner and the Registrar of the Board of Censors. The signatories and trainee may be contacted to confirm evidence of satisfactory completion. The portfolio and summary must be provided to the Supervisor for review when they are preparing the annual Supervisor's report

Supervisor's reports

Trainees must submit a Supervisor's report for each year of training, including periods of rotation as well as an additional pre-examination Supervisor's report with the appended print-out of the portfolio summary spreadsheet. Please refer to *RCPA Trainee Handbook – General Requirements* for key dates for submitting these reports.

It is the Trainee's responsibility to ensure that the pre-examination Supervisor's report is completed and submitted by the due date. Failure to do so may jeopardise the accreditation of training time or finalisation of examination results.

Summary of assessment requirements

Item	Completion	Assessed by	Comments
Histopathology slide examination	Final year (usually May)	Examiners with at least 5 years post-Fellowship experience.	
Structured oral examination	Final year (August)	Examiners with at least 5 years post-Fellowship experience.	
Portfolio of evidence of having completed specified workplace activities	Prior to being awarded the Diploma.	Assessed by Chief Examiner or delegate. Summary spreadsheet checked for completeness by BOC Registrar. If not satisfactory, the candidate may be required to undertake further portfolio activities.	Supervisor will review the hard copy portfolio when preparing the pre-examination supervisor's report.

Assessment calendar

Please refer to the *RCPA Training Handbook – General Requirements* on the RCPA website for enrolment dates and on the website for assessment dates.

Appendix 2

Guidelines for completing the Supervisor's report form

The Supervisor

The role and responsibilities of supervisors are outlined in the following documents which are available on the RCPA website:

- RCPA induction manual for supervisors
- Policy (Supervision of Training)

The Supervisor's Report Form can be downloaded from the RCPA website:

<http://www.rcpa.edu.au/Careers/Training/SupervisorReports.htm>

The form should be completed by the Supervisor in consultation with other pathologists and laboratory staff with a significant role in the Trainee's training program and with reference to the Trainee's portfolio.

Trainees must make their up-to-date portfolio and logbooks available to the supervisor for the annual, rotation and pre-examination reviews. For the pre-examination review, a print-out of the portfolio summary spread sheet must also be made available.

The portfolio should include evidence of completion of the following activities:

- Neurodegenerative disease autopsies (case log plus two autopsy DOPS)
- surgical cases
- frozen sections
- cytology; brain smears and CSF
- muscle and nerve biopsies, including nerve tease, nerve montage
- molecular genetics (must include brain tumour, neurodegenerative brains and nerve/muscle cases)
- histochemical and immunohistochemical methods (must include brain tumour and western blot of skeletal muscle)
- clinical meetings
- laboratory management and quality management
- personal professional development
- all previous Supervisors' reports

Submitting the Supervisor's Report

It is the Trainee's responsibility to submit this form by the due date. At least one Supervisor's Report is due annually and may be submitted with the annual registration for the subsequent year.

For Trainees who participate in rotational programs, one report is required for each period of rotation at a different institution and should be submitted on completion of the rotation. For Trainees sitting the examination, the pre-examination Supervisor's report is due by the date specified in the *RCPA Trainee Handbook – General Requirements* (on the RCPA website). A print-out of the portfolio summary spreadsheet must be appended to this report. Reports must be available for consideration at the examinations.

Please post this form by the due date to
The Royal College of Pathologists of Australasia
207 Albion Street
Surry Hills NSW 2010 AUSTRALIA

Faxed reports will not be accepted

Appendix 3

Portfolio Guidelines for Trainees and Supervisors

This document contains guidelines to assist Trainees to compile the portfolio and the portfolio summary.

The activities to be recorded in the portfolio are carried out in the workplace and provide evidence that the Trainee is developing the desired technical skills and professional values and behaviours that are not readily assessed by formal examinations.

Trainees should accumulate evidence for the portfolio from the commencement until the completion of training. We strongly recommend that Trainees commence activities **early** in training.

The forms for recording these workplace activities are in Appendix 6. They can also be downloaded from the RCPA website. They are

- Full autopsy DOPS
- Clinical meetings
- Laboratory Management and Quality Management

The hard copy forms should be filed in a portfolio folder with thirteen (13) separate sections, numbered as in the Table of items/activities (overleaf).

A logbook should also be kept for recording

- Brain only autopsies
- Brain and spinal cord autopsies
- Neurosurgical biopsies
- Muscle and nerve biopsies
- Frozen sections
- Brain smears
- CSF cytology
- Histochemical & immunohistochemical methods
- Molecular genetics

Pages for the logbook are included in Appendix 6. We recommend that you preserve them by keeping them in a plastic folder which you keep with you at all times.

A soft copy **portfolio summary** (Excel spreadsheet) should be compiled so that you can keep track of what you have completed. The spreadsheet can be downloaded from the RCPA website.

It is the Trainee's responsibility to keep both hard and soft copy records **up-to-date**. The Supervisor should review and sign off completed portfolio forms and logbook on the annual, rotation and pre-examination Supervisor's report.

The only document from the portfolio required for submission to the College is a print out of the portfolio summary spreadsheet. The actual portfolio should not be sent unless requested for audit purposes.

	<h2 style="margin: 0;">Neuropathology</h2> <h3 style="margin: 0;">Portfolio requirements</h3>
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Portfolio Section	Mandatory activities	Evidence
1	<p>Neurosurgical biopsy cases. Report a minimum of 450 cases during training. Cases that the trainee has reviewed but not reported should not be included.</p>	<p>Logbook records, signed periodically by supervisor or delegate.</p>
2	<p>Brain and spinal cord autopsies Report a minimum of 75 brain only autopsies. This must include at least 50% as neurodegenerative diseases. Report a minimum of 15 brain and spinal cord autopsies.</p>	<p>Logbook records, signed periodically by supervisor or delegate.</p>
3	<p>Full autopsy Perform at least two (2) full autopsies on deaths from different neurodegenerative disease causes, both of which have a peripheral and central pathology</p>	<p>Autopsy DOPS form Both Autopsy DOPS forms to be signed off as satisfactory by the observer (supervisor or delegate). Case reports are also required.</p>
4	<p>Frozen sections Perform and report to surgeon a minimum of 50 during training.</p>	<p>Logbook records, signed by supervisor or delegate.</p>
5	<p>Brain smears Perform and report to surgeon a minimum of 50 during training.</p>	<p>Logbook records, signed by supervisor or delegate.</p>
6	<p>CSF cytology Perform and report CSF cytology investigations. Minimum of 25 reports</p>	<p>Logbook records, signed by supervisor or delegate.</p>
7	<p>Muscle and nerve biopsies Report on a minimum of 75 muscle biopsies and 20 nerve biopsies, including nerve tease and nerve montage.</p>	<p>Logbook records, signed by supervisor or delegate.</p>
8	<p>Molecular genetics Ten (10) specimens for which these investigations are required (brain tumour, neurodegeneration and nerve and muscle cases)</p>	<p>Logbook records, signed by supervisor or delegate.</p>
9	<p>Histochemical and immuno-histochemical methods One hundred (100) de-identified reports indicating correct use and value in diagnosis of these techniques in neuropathology (brain tumour, neurodegeneration and nerve and muscle cases).</p>	<p>Logbook records, signed by supervisor or delegate</p> <p>De-identified copies of the signed laboratory reports should be retained in the Portfolio.</p>

10	<p>Clinical meetings (CPC, MDT, etc) Provide evidence of having attended at least 30 meetings. These must include neurosurgical and neurology meetings, with brain, nerve and muscle biopsy cases. Trainee should prepare and present at 15 of these meetings.</p>	<p>Logbook records, signed by supervisor or delegate. Record topic, date, duration, brief description (maximum 1 page). Record to be signed off by supervisor.</p>
11	<p>Laboratory workplace health and safety, quality issues and management issues Complete the Safety module in the All Trainees/Learning Modules section of RCPA Education Online.</p>	<p>Laboratory Management and Quality Management Form Sign and date form and have it witnessed</p>
12	<p>Personal professional development Three (3) examples are required during training, in which the trainee must be the major contributor to the items presented.</p>	<p>See Guidelines for Personal Professional Development (Appendix 4)</p>
13	<p>Supervisor's report/s for each year and/or rotation</p>	<p>Reports and a brief reflection (maximum 1 page) on the supervisor's comments for each report.</p>

Appendix 4

Guidelines: Personal Professional Development

By the completion of training the portfolio should contain three (3) examples of personal professional development in the area of neuropathology, quality and audit or health & safety where the trainee is the major contributor to the endeavor presented.

Required items:

At least **one (1)** example should come from Category A (see below). The remainder should be from Category A and/or Category B activities, noting that some activities have a maximum number per portfolio. Trainees are **strongly advised to commence** these activities early in training.

The appropriate portfolio documentation and signoff for each activity is summarised below

Category A	Maximum number per portfolio	Documentation in portfolio
One (1) project , undertaken under supervision, which is written up to a standard that is acceptable for publication	No limit	Copy of project report, with sign off from the supervisor that work was performed and written up by the trainee.
Principal author on one (1) publication in a peer-reviewed journal on a neuropathology case	No limit	Copy of article or manuscript with evidence of submission; sign off from the supervisor that the trainee made a major contribution to the work
Two (2) oral and/or poster presentations on a Neuropathology topic at a national or international meeting The trainee must be a major contributor to the work being presented and is significantly responsible for the production of the poster	No limit	Copy of meeting poster abstracts and A4 or A3 printout of mini version of the poster; sign off from the supervisor that the trainee made a major contribution to the work and production of the poster

Category B	Maximum number per portfolio	Documentation in portfolio
Oral presentation by the trainee of a topic, or case/cases at a hospital meeting, clinical meeting, regional meeting or grand round where the trainee had a major contribution to preparing and delivering the presentation	Two per portfolio	Copy of documentation including printout of (eg) PowerPoint slides etc from the presentation; sign off from supervisor that the trainee made a major contribution to preparing and delivering the presentation
Presentation of a written report on a complex case in AP with appropriate discussion of the relevant points and issues; worked up and reported by the trainee. Refer to Appendix 5 for guidelines. The written report should be submitted to the Chief Examiner AP	Three per portfolio	Copy of the written case report; sign off from the supervisor that the trainee made a major contribution to the reporting of the case. Sign off from the Chief Examiner on adequacy of the written report.

for formal assessment.		
Prepare and present teaching sessions (lecture/seminar) for medical students, lab staff, GPs etc	Two per portfolio	Copy of the teaching material (PowerPoint slides, brochures etc); sign off from the supervisor that the trainee made a major contribution to the session. Sign off from the Chief Examiner on adequacy of the written report.

Submission of written reports for assessment by the Chief Examiner

Please post the reports to

The Chief Examiner, Neuropathology
The Royal College of Pathologists of Australasia
207 Albion Street
Surry Hills NSW 2010 AUSTRALIA

Appendix 5

Guidelines for written case reports

Requirements

The cases must have been handled personally by the Trainee as part of their supervised training.

The written report should be

- No more than 10 pages of single spaced type;
- The discussion, clinico-pathological correlation must be at least twice as long as the remainder of the report;
- The appraisal of the cited literature should be critical and selective;
- The reference list should include 15 - 30 references, including recent peer-reviewed literature;
- Photomicrographs/illustrations must be high quality.

Signed declarations of originality from the Trainee and Supervisor must be included with each case report:

Trainee's declaration: "I certify that I reported this case as part of my personal supervised practice during my accredited training in Neuropathology. The case report is original. It has not been submitted for assessment and has not been used by any other Trainee.

Supervisor's declaration: "As the supervisor for Dr., I certify this case was examined and reported personally by Dr. during training in Neuropathology. The case report is original and has not been used by any other Trainee."

Suitable topics and techniques

Trainees may choose from the case types and techniques below. The techniques can be combined in a single case, eg, molecular biology with immunohistochemistry, (eg, neurodegenerative disease, muscle disorder, nerve disorder)

Cases

- 2 neurodegenerative cases
- 2 nerve or muscle cases,
- 2 brain tumour cases

Techniques:

- immunohistochemistry (e.g. peroxidase-based immunohistology or immunofluorescence)
- western blot protein analysis
- electron microscopy
- molecular biology techniques
- in-situ hybridisation

Assessment

Case reports will be assessed as satisfactory or unsatisfactory. A case report that is assessed as unsatisfactory may be revised and re-submitted one time only.

Appendix 6

Forms and logbook pages

Appendix 6 contains master copies of forms to be used to record activities for the portfolio. Please make as many copies as you need and file the completed forms safely in the portfolio folder.


The forms are:


- Autopsy DOPS
- Clinical meetings
- Laboratory Management and Quality Management

Appendix 6 also contains master copies of logbook pages. Eventually the College will supply a logbook. In the meantime, please make as many copies of the logbook pages as you need and file the completed forms safely in a plastic folder.

The logbook pages are for:

- Brain only autopsies
- Brain and spinal cord autopsies
- Neurosurgical biopsies
- Muscle and nerve biopsies
- Frozen sections
- Cytology: brain smears and CSF
- Histochemical & immunohistochemical methods
- Molecular genetics

 <h1 style="margin: 0;">RCPA</h1> <p style="margin: 0;">The Royal College of Pathologists of Australasia</p>	<h2 style="margin: 0;">Neuropathology Autopsy DOPS form</h2> <p style="margin: 0;">(DOPS = Directly Observed Practical Skill) This form is to be completed by the observer</p>		
<p>How to use this form</p> <p>The supervisor or delegate is asked to observe the trainee conducting two full neuropathology autopsies on deaths caused by different neurodegenerative diseases, both of which have a peripheral and central pathology. Please use a separate form for each.</p> <p>The trainee should also write up a case report for each, including</p> <ul style="list-style-type: none"> • Clinical history and investigations • External examination • Macroscopic dissection • Microscopy • Ancillary investigations • Diagnosis • Clinico-pathological correlation including a discussion of the diagnosis/cause of death relating to underlying aetiology and recurrence risk <p>Completed Autopsy DOPS forms & case reports are to be retained in the Portfolio, whether pass or fail. Both forms should be sighted by the supervisor and signed off on the annual supervisor report.</p>			
Trainee name	Trainee ID		
Observer/Assessor name	Observer/Assessor position		
Type of case	Complexity of case (tick box) <input type="checkbox"/> low <input type="checkbox"/> medium <input type="checkbox"/> high		
Please comment on whether these aspects of the trainee's performance are satisfactory for the stage of training (SY= satisfactory; NS = not satisfactory; n/a=not applicable)	SY	NS	n/a
Identify & understand the significance of the clinical history and investigations			
External examination and identification of abnormalities			
Macroscopic dissection and identification of abnormalities			
Appropriate ancillary investigations			
Microscopic report			
Diagnosis/cause of death identification			
Appropriateness and relevance of clinico-pathological correlation			
Please comment on any other relevant aspects, especially on aspects for improvement			
Final outcome (please circle) Satisfactory Not Satisfactory	Date of assessment	Time taken for assessment	Time taken for feedback
Signature of assessor	Signature of trainee		
Print name			

 <p style="margin: 0;">RCPA The Royal College of Pathologists of Australasia</p>	<p style="margin: 0;">Neuropathology Brain only autopsies Log</p>
--	--

How to use this form

During training, the trainee should log a minimum of 75 brain only autopsies. At least 50% should be neurodegenerative and must include a minimum of 3 prion diseases, 10 neurotrauma and 10 neurologic complications of medical and surgical cause.

At the end of each year, the log should be sighted by the supervisor and signed off on the annual supervisor report.


Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING

Trainee name	Trainee ID
---------------------	-------------------

	Date	ID and description of specimen
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		
11.		
12.		
13.		
14.		
15.		
16.		
17.		
18.		
19.		
20.		

Supervisor name.....

Supervisor signature.....Date.....

 <p style="margin: 0;">RCPA The Royal College of Pathologists of Australasia</p>	<p style="margin: 0;">Neuropathology Brain and spinal cord autopsies Log</p>	
<p>How to use this form During training, the trainee should log a minimum of 15 brain and spinal cord examinations.</p> <p>At the end of each year, the log should be sighted by the supervisor and signed off on the annual supervisor report.</p> <p>Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING</p>		
<p>Trainee name</p>	<p>Trainee ID</p>	
	Date	ID and description of specimen
1.		
2.		
3.		
4.		
5.		
6.		
7.		
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10.		
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20.		

Supervisor name.....

Supervisor signature.....Date.....



Neuropathology Neurosurgical biopsy cases Log

How to use this form

During training, the trainee should log a minimum of 450 neuropathology surgical cases. Cases that the trainee has reviewed (eg QAP) but not reported should **not** be included.

Please place a tick (✓) in the column to denote whether the specimen is benign, malignant or normal/inflammatory.

At the end of each year, the log should be sighted by the supervisor & signed off on the annual supervisor report.

Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING


Trainee name	Trainee ID
--------------	------------

Place a tick (✓) in the column to denote whether the specimen is **B**enign, **M**alignant or **N**ormal/**I**nflammatory.

	Date	ID of specimen	Benign	Malignant	Normal Inflamm
1.					
2.					
3.					
4.					
5.					
6.					
7.					
8.					
9.					
10.					
11.					
12.					
13.					
14.					
15.					
16.					
17.					
18.					
19.					
20.					

Supervisor name.....

Supervisor signature.....Date.....

 RCPA The Royal College of Pathologists of Australasia	Neuropathology Muscle and nerve biopsies Log
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How to use this form

During training, the trainee should log a minimum of 75 muscle biopsies and 15 nerve biopsies, including nerve tease and nerve montage. Cases that the trainee has reviewed (eg QAP) but not reported should **not** be included.

Please indicate whether muscle (M) or nerve (N)

At the end of each year, the log should be sighted by the supervisor & signed off on the annual supervisor report.


Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING

Trainee name	Trainee ID
---------------------	-------------------

	Date	M(uscle) or N(erve)	ID and brief description of specimen
1.			
2.			
3.			
4.			
5.			
6.			
7.			
8.			
9.			
10.			
11.			
12.			
13.			
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20.			


Supervisor name.....

Supervisor signature.....Date.....

 <div style="display: inline-block; vertical-align: middle;"> <h1 style="margin: 0;">RCPA</h1> <p style="font-size: small; margin: 0;">The Royal College of Pathologists of Australasia</p> </div>	<h2 style="margin: 0;">Neuropathology Frozen sections Log</h2>																																																																																																																														
<p>How to use this form</p> <p>During training, the trainee should perform, report and log a minimum of 50 frozen sections.</p> <p>Please place a tick (✓) in the column to denote whether the specimen is benign, malignant or normal/inflammatory.</p> <p>At the end of each year, the log should be sighted by the supervisor & signed off on the annual supervisor report.</p> <p>Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING</p>																																																																																																																															
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Supervisor name.....

Supervisor signature.....Date.....

 <p style="margin: 0;">RCPA The Royal College of Pathologists of Australasia</p>	<p style="margin: 0;">Neuropathology Brain smears Log</p>
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How to use this form

During training, the trainee should perform, report and log a minimum of 50 brain smears.

Please place a tick (✓) in the column to denote whether the specimen is benign, malignant or normal/inflammatory.

At the end of each year, the log should be sighted by the supervisor & signed off on the annual supervisor report.

Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING


Trainee name	Trainee ID
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Place a tick (✓) in the column to denote whether the specimen is Benign, Malignant or Normal/inflammatory.

	Date	ID of specimen	Benign	Malignant	Normal/ Inflamm
1.					
2.					
3.					
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16.					
17.					
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19.					
20.					

Supervisor name.....

Supervisor signature.....Date.....

 <p style="margin: 0;">RCPA The Royal College of Pathologists of Australasia</p>	<p style="margin: 0;">Neuropathology CSF cytology Log</p>
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How to use this form

During training, the trainee should perform, report and log a minimum of 25 CSF cytology investigations,

Please place a tick (✓) in the column to denote whether the specimen is benign, malignant or normal/inflammatory.

At the end of each year, the log should be sighted by the supervisor & signed off on the annual supervisor report.

Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING

Trainee name	Trainee ID
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Place a tick (✓) in the column to denote whether the specimen is **B**enign, **M**alignant or **N**ormal/inflammatory.

	Date	ID of specimen	Benign	Malignant	Normal/ Inflamm
1.					
2.					
3.					
4.					
5.					
6.					
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20.					

Supervisor name.....

Supervisor signature.....Date.....

 <h1 style="margin: 0; font-size: 2em; letter-spacing: 0.2em;">RCPA</h1> <p style="margin: 0; font-size: 0.8em;">The Royal College of Pathologists of Australasia</p>	<h2 style="margin: 0;">Neuropathology Histochemical & Immunohistochemical methods Log</h2>
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How to use this form

During training, the trainee should log a one hundred (100) investigations using histochemical and immunohistochemical techniques. Only cases that the trainee has reported should be logged on this form. It is expected that these cases will overlap with cases logged in other sections of their log). Cases that the trainee have reviewed but not reported should **not** be included. Cases should be from brain tumours, neurodegeneration cases and muscle biopsies

A copy of the de-identified (no patient details) laboratory report for each case should be appended to this form and should be retained in the portfolio.

At the end of each year, the log should be sighted by the supervisor and signed off on the annual supervisor report.


Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING

Trainee name	Trainee ID
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	Date	ID of specimen and brief description
1.		
2.		
3.		
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9.		
10.		

Supervisor name.....

Supervisor signature.....Date.....

 <div style="display: inline-block; vertical-align: middle;"> <h1 style="margin: 0;">RCPA</h1> <p style="font-size: small; margin: 0;">The Royal College of Pathologists of Australasia</p> </div>	<h2 style="margin: 0;">Neuropathology Molecular Genetics Log</h2>
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How to use this form

During training, the trainee should log ten (10) investigations on which molecular genetic investigation are required. Cases should include; brain tumour, neurodegeneration, muscle/nerve cases. Only cases that the trainee has reported should be logged on this form. Cases that the trainee has reviewed but not reported should **not** be included.

A copy of the de-identified laboratory report for each case should be appended to this form and should be retained in the portfolio.

At the end of each year, the log should be sighted by the supervisor and signed off on the annual supervisor report.


Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING

Trainee name	Trainee ID
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	Date	ID of specimen and brief description
1.		
2.		
3.		
4.		
5.		
6.		
7.		
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10.		

Supervisor name.....

Supervisor signature.....Date.....

 RCPA The Royal College of Pathologists of Australasia		Neuropathology Clinical Meetings Summary		
How to use this form During the training period, the Trainee should attend a minimum of 30 clinical meeting, (which must include neurosurgical and neurology meetings, with brain, nerve and muscle biopsy cases) and should present at 15 of them. Each meeting is to be signed off by the supervisor or delegate. Please indicate whether the trainee simply attended (A) or whether s/he presented cases (P) as well Trainees should retain a list of the cases/entities presented at each meeting in the Portfolio. Please START A NEW FORM AT THE BEGINNING OF EACH YEAR OF TRAINING				
Trainee name				Trainee ID
	<i>Date</i>	<i>Brief description of meeting</i>	<i>Attend only or present case</i>	<i>Supervisor signature</i>
1.				
2.				
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15.				

 <p>RCPA The Royal College of Pathologists of Australasia</p>	<p>Neuropathology Laboratory Management and Quality Management</p>
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I have completed the relevant sections of the following modules in the All Trainees/Learning Modules section of RCPA Education Online.

- Laboratory Safety module
- Quality Management module

Trainee name:.....

Trainee signature:

Witness name.....

Witness signature:

Date: