

Title:	Monash Micro Imaging – MHTP Node Manager
Group & Centre:	Monash Micro Imaging, Monash Health Translation Precinct
Employment Agreement	Hudson Institute of Medical Research Enterprise Agreement 2015
Classification	RES Level A / B
Date Last Updated:	November 2018

1. About Hudson Institute

The Hudson Institute is a premier Australian discovery and translation medical research institute. By unravelling the biology underlying disease the Institute uses this information for transformative and innovative solutions to major health problems.

The Hudson Institute has diverse strengths and research excellence encompassing paediatric and perinatal medicine, cancers, infectious and inflammatory diseases, endocrinology and reproductive health. Progressing our research requires a focused and directed strategy that incorporates thematic and programmatic excellence across the Institute. The Institute Centre's coordinate their research activity to take advantage of novel approaches and new models of disease.

As the major research partner at the Monash Health Translation Precinct (MHTP) the Institute is key to the research agenda of the precinct and drives research solutions to disease, leading to better health outcomes. Sophisticated cutting edge technologies co-located with clinical and laboratory research activities in the newly built Translational Research Facility at the MHTP enable the rapid translation of breakthrough discoveries to clinical care. This co-location of the Institute alongside its partners Monash Health, one of the largest health care organizations in Australia, and Monash University, the largest tertiary education and research organisation in Australia, enable the Institute to translate research discoveries rapidly to patient outcomes. The research undertaken by the Hudson Institute addresses the major burdens of disease identified as priorities by the Federal Government and National Health and Medical Research Council and integrates its research priorities with the themes of Monash Partners, a NHMRC accredited Advanced Health Research and Translation Centre.

2. About Monash University

Monash University, Australia's largest university, is a university of transformation, progress and optimism. Our people are our most valued asset, with our academics among the best in the world and our professional staff revolutionising the way we operate as an organisation. For more information about our University and our exciting future, please visit www.monash.edu.

The Faculty of Medicine, Nursing and Health Sciences is the University's largest research faculty. World-class researchers work across disciplines including laboratory-based medical science, applied clinical research, and social and public health research. The faculty is home to a number of leading medical and biomedical research institutes and groups, and has contributed to advances in many crucial areas. Its expertise in life sciences and biomedicine is recognised both nationally and internationally. To learn more about the faculty, please visit www.monash.edu/medicine.

The School of Clinical Sciences at Monash Health (SCS) is the largest clinical teaching school of Monash University. Most of the school's research and teaching activities are based near the main university campus at Monash Medical Centre Clayton although activities also extend to a number of external sites including Dandenong, Casey, and Moorabbin Hospitals and Monash Health's Kingston Centre. The school's researchers collaborate closely with relevant clinical areas in the hospital and in many cases hold senior clinical positions. Researchers also liaise closely with the Hudson Institute of Medical Research which is located on site and forms a Department of Molecular and Translational Sciences in the school, as well as other parts of the University and external research organisations. The school is a key partner of the Monash Institute of Medical Engineering. In 2015 the School's researchers published >800 papers, and had >190 PhD students enrolled, and generated ~\$30M in research funding. In addition, the School of Clinical Sciences hosts multiple University Research Centres (including CDPP). Further details may be found at www.monash.edu/medicine/scs.

3. About Monash Health Translation Precinct (MHTP)

The MHTP is a partnership between Monash Health, Hudson Institute and Monash University located at Monash Medical Centre Clayton. The Precinct unites the largest health care service provider in Victoria with the largest Australian University and a leading medical research institute. The vision of the MHTP is to be a world leader in delivering the best healthcare by translating innovative scientific discoveries into best clinical practice in a dynamic and collaborative environment.

<http://www.mhtp.org.au/>

4. About Monash Micro Imaging - MHTP Node

The MHTP hosts a network of nine technology platforms that are co-located on a central floor within our new six-storey Translational Research Facility providing seamless interaction between our research activities through to clinical trials. Access is available throughout the MHTP as well as to national and international scientific communities.

Monash Micro Imaging (MMI) was established as a University Core facility in 2007, and is currently one of the University's Technology Research Platforms, providing state-of-the-art optical microscopy instrumentation, support and expertise to researchers and postgraduate students at Monash University and associated Research Institutes. MMI Laboratories are located on the main Clayton Campus, and at the MHTP and AMREP precincts. The Platform undertakes a range of microscopy activities to support research including training in research methods, instrument operation, method development and data analysis. Further details may be found at: <https://platforms.monash.edu/mmi/>

The MHTP node of MMI, was established in 2008 and offers microscopy services specifically catered to the needs of researchers based at the Monash Medical Centre campus, as well as providing access to specialized imaging modalities at the MMI core facility on Clayton campus. MMI technologies include advanced light microscopy, confocal microscopy, multiphoton microscopy, super-resolution microscopy, light-sheet technologies, and image data analysis. The MHTP-MMI Node operates under a Monash-Hudson Microscopy Agreement, with a 3 year term, renewable on maturation.

5. Overview of the Position

Working under the broad direction of the Monash Micro Imaging (MMI) Scientific Director and MHTP Platform Strategic Initiatives Manager, the MMI-MHTP Node Manager will be responsible for the day-to-day management and operation of the Platform.

Typical activities for this role include:

- Provision of specialised imaging support for researchers and students, specifically in the development and application of advanced microscopy, live cell and intravital fluorescence imaging and related technologies.

- Supervision of junior technical staff, research staff and students as needed.
- Support of research requirements of other research staff and students by providing advice and assistance on experimental approaches of research projects, grant applications, methods, instrument operation and analysis for microscopy and related techniques.
- Responsibility for the management of the MMI-MHTP Imaging laboratories: this includes overseeing day-to-day instrument maintenance, user access and appropriate OHS/QMS.
- Facilitating access to specialized microscopes that are not available within the facility (located at Monash Clayton Campus or elsewhere) to researchers as required.
- Assisting in overseeing repairs and annual servicing in conjunction with the SCS/Hudson and MMI Managers.
- The position will also oversee the MMI-MHTP Imaging operational budget (maintenance and running expenses) with assistance from the local School Manager/Institute Chief Operating Officer for all aspects of financial reporting.
- Forward planning with respect to funding applications for infrastructure and user or instrument policy development.
- Technical development, assessment and validation of new imaging instrumentation, scientific methodologies and techniques.
- Coordinate the development and promotion of educational and training materials and programs for staff and students in use of the applications of the technology.

6. Accountabilities, Characteristics and Responsibilities

Area	Requirement
Qualifications, Experience and Attributes:	<ul style="list-style-type: none"> ▪ Level A: PhD (or equivalent) qualification in cell/molecular biology or equivalent biomedical stream, with significant imaging experience. ▪ Level B: Postdoctoral experience in cellular imaging. ▪ Extensive experience with confocal and live cell imaging techniques and ability to translate this to new systems, such as intravital fluorescence imaging. ▪ Extensive experience with other analytical fluorescence imaging techniques or similar advanced imaging (multiphoton, super-resolution, lifetime). ▪ Advanced knowledge and application of image analysis software for microscopy data analysis. Desirable: macro writing or scripting, and automation of analysis procedures. ▪ Experience in managing imaging instrumentation and working in a facility. ▪ A high level of interpersonal communication skills (written and verbal) and the ability to work with academic research staff, students, technical staff and industry. ▪ Experience in supervision of postgraduate students, particularly with regards to experimental skills development and recording and image analysis of data.
Publications and Research Output	<ul style="list-style-type: none"> ▪ Will have an established publications history including first author publications. ▪ Will assist with the production of conference and seminar papers and publications to facilitate the

	training of scientists, students and technologists in microscopy techniques and applications.
Awards and Grants	<ul style="list-style-type: none"> ▪ Will coordinate and/or contribute to the preparation of grant submissions to internal and external funding bodies for equipment and associated infrastructure. ▪ May act as associate investigator on research grants in support of microscopy based research.
.Leadership and Contributions to Research Training	<ul style="list-style-type: none"> ▪ Will supervise or coordinate other research/technical staff and/or undergraduate or postgraduate research students, with respect to imaging projects.
Peer Recognition	<ul style="list-style-type: none"> ▪ Involvement in professional activities including, subject to availability of funds, attendance at conferences and seminars in the field of microscopy and biological imaging.
Research Translation – Commercialisation, Clinical & Public Health Activities	<ul style="list-style-type: none"> ▪ Nil
Reporting lines	<ul style="list-style-type: none"> ▪ Reports to <ul style="list-style-type: none"> • MMI Director for scientific and academic matters • MHTP Platforms Strategic Initiatives Manager for local organisational and administrative matters • MMI-MHTP Advisory Committee, which provides general oversight, advice and endorsement

7. Working Relationships

Internal

- Supervisor
- Laboratory Head
- Laboratory Staff
- Scientific Support staff
- Graduate/Postgraduate Students

External

- External collaborators

8. About the Hudson Institute

Vision and Values:

Our Vision: We strive to enhance human health and the quality of life through ground-breaking, collaborative, medical research discoveries and innovation, and ensure its direct impact on the community.

Our Mission: To capitalise on our multidisciplinary research strengths and academic and health partnerships to provide transformative and innovative solutions to major health problems.

Our Values:

Innovation: We inspire and enable world class researchers at the frontiers of science and medicine to find new and transformative solutions to people’s greatest health challenges.

Collaboration: Our multidisciplinary, integrated approach creates an enriched, energetic environment that encompasses the entire lifespan; this allows our researchers and clinicians to leverage each other’s knowledge to spark creative ideas and make unexpected discoveries.

Community: We care deeply about improving the health and wellbeing of people in the community and we are committed to rewarding their investment in science.

Excellence: Integrity and passion underpin our pursuit of the highest level of knowledge achieving significant outcomes whilst nurturing and inspiring the next generation of scientists.

Other relevant information:

- The Hudson Institute is a totally smoke free workplace.
- The position is subject to terms set out in the Hudson Institute Enterprise Agreement (2015), Policies and Procedures and any subsequent variation to these.
- The Hudson Institute is an Equal Employment Opportunity Employer.
- The Hudson Institute has a commitment to Occupational Health and Safety. It is a condition of employment that staff comply with all health and safety related policy and procedures and take part in activities designed to improve the health and safety of the workplace.
- It is a requirement of the position to participate in the annual Performance Planning and Review process.

9. Endorsement

Name: (Supervisor)			
Signed:		Date:	
Name: (Employee)			
Signed:		Date:	
Name: (HR)			
Signed:		Date:	

