# PART THREE

### **Postgraduate Courses**

Your education doesn't have to stop at undergraduate level. LYIT offers an extensive range of flexible postgraduate learning opportunities in a variety of interesting areas, including Executive and Professional Masters, Taught Masters and Higher Diplomas.



# POSTGRADUATE COURSES AT LYIT

### Staidéar larchéime ag LYIT

At LYIT we have a wide range of programmes - from specialist masters and executive education to higher diplomas, research masters programmes and PhD's - which are designed to prepare graduates to face the challenges of complex business environments.

The Institute's academics hold the highest qualifications from some of the most prestigious universities. This, combined with

their industry experience, helps provide an environment of excellence in teaching and research where students study a wide range of subjects through a variety of teaching methods. Our success within this postgraduate space is down to an unwavering commitment to excellence.

Take time to explore the postgraduate opportunities available, and join us on a journey we promise you won't regret!

### **Executive & Professional Masters**

Master of Business in Innovation & Leadership
Master of Science in Leadership & Innovation in the Public Service
Master of Arts in Learning & Teaching
Master of Science in Innovation in Fintech
Master of Science in Innovation in Fintech Research



### Master of Business in Innovation & Leadership

National Framework: Level 9
LYIT Internal Code: LY\_BINOL\_M
Duration: 2 years,

2 years, part-time

#### Key Features Include:

- Focused on developing responses to key strategic issues
- Leading national and international best practice speakers

- Discussion-based mode of delivery
- Two day block delivery plus online over two years
- Action learning communities of practice using reflective learning approach (8 half days)
- Assessment is assignment based and centred on work issues
- Dissertation based on major in-house organisational project

### What will I study?

Year 1	Credits	Year 2	Credits
Managing People (M)	5	Action Learning Research (M)	5
Innovation & New Product Development (M)	5	Corporate Governance (M)	5
Leadership (M)	10	Professional Development (M)	5
Managing Change (M)	5	Knowledge Management & Learning (M)	5
Driving Innovation (M)	10	Dissertation (M)	20

(M) = Mandatory

### Master of Science in Leadership & Innovation in the Public Service

National Framework: Level 9
LYIT Internal Code: LY\_BIMPS\_M
Duration: 2 years,
part-time

### Key Features Include:

- Focused on developing responses to key public reform agenda issues
- Leading national and international best practice speakers
- Programme developed by LYIT and Ulster University in collaboration with the Office of An Taoiseach and the Office of the First Minister and Deputy First Minister

- who were integral to deciding on the content, structure and philosophy of the programme
- Discussion-based mode of delivery
- 6 x 2 day block delivery plus online over 2 years
- Action learning communities of practice reflective learning approach (6 half days)
- Assessment is assignment based and centred on work issues
- Dissertation based on major in-house and organisational project
- Residential modules based in the Republic of Ireland and Northern Ireland

### What will I study?

Year 1	Credits	Year 2	Credits
Context of Leadership, Innovation & Transformation (M)	10	Digital Transformation & Shared Services (M)	10
Transformational Leadership & Strategic Management (M)	10		
Citizen Centric Policy Design (M)	10	Performance Management (M)	10
Change & Cultural Management (M)	10	Research Project (M)	30

### Master of Arts in Learning & Teaching

National Framework: Level 9

LYIT Internal Code: LY\_HMALT\_M

**Duration:** 2 years,

part-time

### Key Features Include:

• Focused on developing professional practice in learning and teaching

- Leading national and international best practice speakers
- Blended learning delivery
- Work based learning and research in all modules
- Block delivery over 2 years at weekends
- Assessment is assignment based
- Links theory to practice

### What will I study?

		Credits
Semester 1	Student Centred Learning & Teaching (M)	10
Semester i	Academic Writing in Research (M)	5
Semester 2	Assessment (M)	10
	Enhanced Learning & Teaching through Creativity & Scholarship (M)	10
	Choose one of the following electives (E):	10
	Technology Enhanced Learning	
Compotes 2	Inclusive Curriculum	
Semester 3	Educational Leadership Management	
	Effective Supervision	
	Restorative Practice: A Transformative Approach to Teaching & Learning	
	Recognition of Prior Learning	
	Alcohol and Other Drugs: Responding to Teachers Needs in Today's Society	
Semester 4	Research Methods (M)	15
Semester 5	Dissertation (M)	30

(M) = Mandatory, (E) = Elective



### Master of Science in Innovation in Fintech Master of Science in Innovation in Fintech Research

National Framework: Level 9

LY\_BINFT\_M (Masters) LY\_BIFTR\_M (Research)

**Duration:** 1 - 2 years

#### Key features

 The Fintech Learning Labs (FTLL) talent development is a learner centred design (Employers & Employees) and is exclusively work based learning for employees.

- It is an agile upskilling platform addressing complex skill needs.
- FTLL's focus is to shape education provision as 'HE designed by Enterprise for Enterprise', to future proof for the impacts of emerging technologies in the Fintech sector.
- The programme has three areas/stages of knowledge development; Fundamentals, Enabling and lastly Work Based Research Project

### Master of Science in Innovation in Fintech What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Fintech (Financial Services & Emerging Technologies) (M)	10	Financial Services Regulation (M)	10	Work Based Learning Research Project E)	30
Innovation and Entrepreneurship in the Fintech Sector (M)	10	Culture, Communication and Influencing in the Fintech sector (M)	10	Dissertation (E)	30
Design Thinking (M)	10	Action & Enquiry (M)	10		

(M) = Mandatory, (E) = Elective

### Master of Science in Innovation in Fintech Research What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Fintech (Financial Services & Emerging Technologies) (M)	10	Financial Services Regulation (E2)	10	Dissertation/ Major Project (M)	60
Innovation and Entrepreneurship in the Fintech Sector E1	10	Culture, Communication and Influencing in the Fintech sector E2	10		
Design Thinking E1	10				

(M) = Mandatory, (E) = Elective

Learners must do the Mandatory module Fintech (Financial Services & Emerging Technologies) plus one elective module from E1 and one elective module from E2 then the 60 credit Dissertation in one of the specialised areas.

Special Regulations:

Students must complete 30 credits worth of taught modules. The Dissertation topic must be consistent with the overall Programme Learning Outcomes.

## Taught Masters, Structured Research Masters & Postgraduate Diplomas

Master of Arts/Postgraduate Diploma in Arts in Accounting

Master of Science/Postgraduate Diploma in Science in Management Practice

Master of Science/Postgraduate Diploma in Science in Marketing Practice

Postgraduate Diploma in Six Sigma & Business Improvement

Master of Arts/ Postgraduate Diploma in Arts in Governance, Compliance & Data Protection in Financial Services

Master of Science in Sports Performance Practice

Master of Science in Sports Performance Practice Research

Master of Arts in UX Design & Applied Innovation Research

Master of Arts/Postgraduate Diploma in Arts in UX Design & Applied Innovation

Master of Science in Big Data Analytics

Master of Science in Big Data Analytics & Artificial Intelligence

Master of Science in Artificial Intelligence Research

Master of Science in Applied Computing Research

Master of Science in Cloud Technologies

Master of Science in Cloud Technologies Research

Master of Science in Computing in Enterprise Applications Development

Master of Science in Computing in DevOps

Master of Science in Computing in DevOps Research

Master of Science in Computing in Cybersecurity

Master of Science in Computing in Cybersecurity Research

Master of Science in Computer Science Education Research

Master of Science in Digital Healthcare

Master of Science in Digital Healthcare Research

Master of Science/Postgraduate Diploma in Science in Advancing Health & Social Care

Master of Science/Postgraduate Diploma in Science in Therapeutic Interventions for Alcohol & Other Drugs

#### Master of Arts in Accounting

Postgraduate Diploma in Arts in Accounting

National Framework: Level 9

LY\_BACCT\_M (Masters)
LY\_BACCT\_G (Postgrad Dip)

**Duration:** 

1 year, full-time 2 years, part-time PGDip: 9 months



### Key features

- Generous exemptions from ACCA, CPA, CAI, and CIMA
- Proven track record with professional exams
- Two month industry placement
- 100% employment record including the "Big 4"
- Leading national and international best practice speakers

#### What will I study?

Semester 1	Credits	Semester 2	Credits
Tax Practice (M)	10	Advanced Finance (M)	5
Audit Practice (M)	10	Integrated Case Studies In Accounting (M)	5
Performance Measurement (M)	5	Advanced Financial Accounting (M)	10
		Corporate Governance (M)	5
Research Methods (M)	5	IT Applications for the Professional Accountant (M)	5
		Choose from one of the following Electives (E)*:	
Academic Writing (O)	5	Work Based Learning Project Research Development & Dissertation	15 15

(M) = Mandatory, (E) = Elective, (O) = Optional

### Master of Science in Management Practice

Postgraduate Diploma in Science in Management Practice

National Framework: Level 9

LY\_BMANG\_M (Masters)
LY\_BMANG\_G (Postgrad Dip)

**Duration:** 

1 year, full-time, 2 years, part-time PGDip: 9 months



#### Key features

- Industry placement
- Small class sizes, facilitating a learner centred approach
- Exposure to leading national and international practitioners
- Hands-on projects
- Best practice seminar series
- Focus on reflective learning

### What will I study?

Semester 1	Credits	Semester 2	Credits
Managing the Innovation Process (M)	5	Applied Strategic Business Planning (M)	10
Strategic Operations Management (M)	10	Data Analysis (M)	5
Accounting Information for Decision Making (M)	5	Behavioural Economics (M)	5
Research Methods (M)	5	Work Placement (M)	10
Managing Change (M)	5		
Academic Writing (O)	5	Dissertation (M)*	15

(M) = Mandatory, (E) = Elective, (O) = Optional

<sup>\*</sup>Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits)

<sup>\*</sup>Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits)

#### Master of Science in Marketing Practice

Postgraduate Diploma in Science in Marketing Practice

National Framework: Level 9

LYIT Internal Code: LY\_BMARK\_M (Masters) LY\_BMARK\_G (Postgrad Dip)

**Duration:** 

1 year, full time 2 years, part time PGDip: 9 months



### Key features

- Industry placement
- New focus on digital marketing and analytics
- Excellent track record of graduate employment in marketing positions
- Small class sizes, facilitating a learner centred approach
- Hands-on projects

### What will I study?

Semester 1	Credits	Semester 2	Credits
Driving Marketing in SMEs (M)	10	Applied Strategic Business Planning (M)	10
Managing the Innovation Process (M)	5	Work Placement (M)	10
Research Methods (M)	5	Managing Sales (M)	5
Digital Marketing (M)	10	Data Analysis (M)	5
Academic Writing (O)	5	Dissertation (M)*	15

(M) = Mandatory, (E) = Elective, (O) = Optional

### Postgraduate Diploma in Six Sigma & Business Improvement

National Framework: Level 9

LYIT Internal Code:

LY\_BSSBI\_G (Postgrad Dip)

**Duration:** 

1 year, full-time 2 years, part-time

### **Key features**

- This course will provide participants with six sigma management and statistical techniques.
- Learners will also complete an applied industry project where they will have the opportunity to practically apply the knowledge, skills and competencies gained from formal study and propose an improvement plan for a company based on Six Sigma Methodology.

### What will I study?

Semester 1	Credits	Semester 2	Credits
Six Sigma Management (M)	10	Leadership and Managing Change (M)	10
Statistical Techniques (M)	10	Advanced Statistical Techniques (M)	10
Process and Operations Improvement (M)	10	Applied Industry Project (M)	10

<sup>\*</sup>Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits)

### Master of Arts in Governance, Compliance & Data Protection in Financial Services

Postgraduate Diploma in Arts in Governance, Compliance & Data Protection in Financial Services

National Framework: Level 9

LYIT Internal Code: LY\_HGOVE\_M (Masters) LY\_HGCDP\_G (Postgrad Dip)

**Duration:** 

1 year, full-time 2 years, part-time PGDip: 9 months

### Key features

- Aims to meet the legal, compliance, Governance and I.T. needs of financial services companies and has been developed in collaboration with a number of key employers within the relevant industry.
- The Masters programme offers a capstone as a substantial research project, either a traditional dissertation or a work based learning project based on situated learning and reflection, marrying best practice literature with situated practice, to form critical insights on theory in practice.

### What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Financial Services Industry (M)	10	Financial Services Regulation (M)	10	Work Based Learning Project/Dissertation (M)*	30
Governance Ethics & Regulation (M)	5	It Security, Compliance & Privacy (M)	10		
Principles of Information Systems (M)	5	IT Risk Management & Audit (M)	10		
Data Protection Practice (M)	5				
Research Methods (M)	5				

(M) = Mandatory

Not all modules will be offered in a given year. LYIT reserves the right to select which modules will run depending on demand and availability of resources.

LYIT reserves the right to resequence which modules appear in which semester.

\*Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits)



### Master of Science in Sports Performance Practice

Master of Science in Sports Performance Practice Research

National Framework: Level 9

LYIT Internal Code: LY\_HSPEF\_M (Masters) LY\_HSPER\_M (Structured Research Masters)

#### **Duration:**

1 year, full-time 2 years, part-time

### Key features

- Flexible part-time and full-time options
- Excellent career opportunities for graduates
- The long-term commitment by government to spending in sport, announced in tandem with the new National Sports Policy 2018 will ensure the growth of this sector for at least the next ten years.

### What will I study?

	Master of Science in Sports Performance Practice Master of Science in Sports Performance Practice Research	Credits
	Sports Nutrition (M)	10
	Physiology of Sport & Exercise (M)	10
Semester 1	Research Methods (M)	5
	Data Analytics (M)	5
	Academic Writing (O)	5
	Master of Science in Sports Performance Practice	
	Work Based Learning Research Project (E)	30
	Strength & Conditioning (M)	10
Semester 2	Sports Performance Analysis (M)	10
	Professional Practice (M)	10
	Dissertation (E)	30
	Master of Science in Sports Performance Practice Research	
Semester 2	Research Dissertation (M)	60

(M) = Mandatory, (E) = Elective, (O) = Optional



### Master of Arts in UX Design and Applied Innovation

Master of Arts in UX Design & Applied Innovation Research

National Framework: Level 9

**LYIT Internal Code:** 

LY\_DUEAI\_M (Masters)

L\_DUEAR\_M

(Structured Research Masters)

LY\_DUEAI\_G (Postgrad Dip)

**Duration:** 

1 year, full-time

### Key features

- During this course, you will enhance your capabilities in user experience design (UX) and explore strategic design thinking methods underpinned by an end user centred clarity
- You will advance your skills in refined innovation processes, improve your visual communication skills, gain an insight into consumer behaviour & digital markets and explore emerging technologies.

### What will I study?

	Master of Arts in UX Design & Applied Innovation Master of Arts in UX Design & Applied Innovation Research Postgraduate Diploma in Arts in UX Design & Applied Innovation	Credits
	UX – User Experience Design (M)	10
	Consumer Behaviour & Digital Markets (M)	10
Semester 1	Innovation & New Product Development (M)	5
	Research Methods (M)	5
	Work Placement (E)*	5
	Master of Arts in UX Design & Applied Innovation	
	Postgraduate Diploma in Arts in UX Design & Applied Innovation	
	UI – User Interface Design (M)	10
Semester 2	Emerging Technologies (M)	10
	Professional Development (M)	10
	Master of Arts in UX Design & Applied Innovation	
Semester 2	Dissertation / Research Project (E)	30
	Master of Arts in UX Design & Applied Innovation Research	
Semester 2	Dissertation (M)	60

(M) = Mandatory, (E) = Elective

<sup>\*</sup>Required for Postgraduate Diploma only



### Master of Science in Computing in Big Data Analytics

National Framework: Level 9
LYIT Internal Code: LY\_KDATA\_M

**Duration:** 

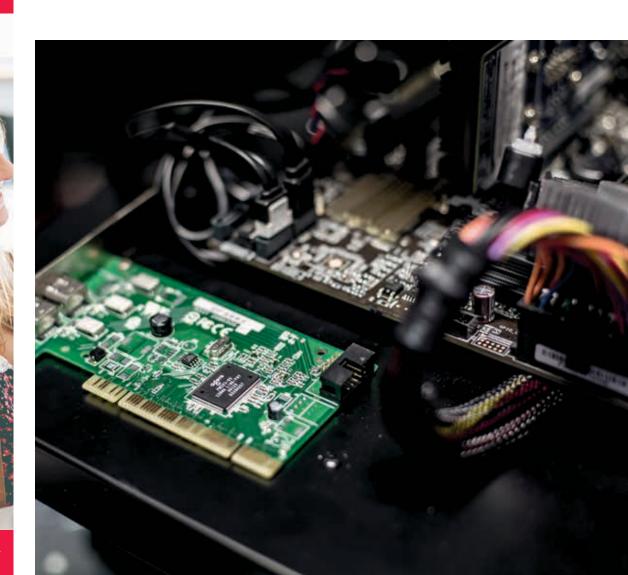
1 year, full-time 2 years, part-time

### **Key features**

- Data Analytics are used across all parts of the economy.
- Demand for Data Analysts is growing dramatically
- Flexible part-time and full-time options
- Industry input into course design

### What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Business Intelligence (M)	10	Machine Learning (M)	10	Dissertation (M)	30
Mathematics for Analytics (M)	10	Big Data Analytics (M)	10		
Big Data Architecture (M)	10	Data Science (M)	10		



### Master of Science in Big Data Analytics and Artificial Intelligence Master of Science in Big Data Analytics and Artificial Intelligence Research

National Framework: Level 9

LYIT Internal Code:

LY\_KDAAI\_M (Masters)

LY\_KAFIR\_M (Structured Research

Masters)

**Duration:** 

1 year, full-time, 2 years, part-time

### Key features

- Graduates' skills provide competitive advantage for businesses
- Opportunities in Big Data Analytics are expanding all the time
- Flexible part-time and full-time options

### Master of Science in Big Data Analytics and Atrificial Intelligence What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Mathematics for Analytics (M)	10	Big Data Analytics (M)	10	Dissertation (M)	30
Artificial Intelligence 1 (M)	10	Big Data Architecture (M)	10		
Machine Learning (M)	10	Artificial Intelligence 2 (M)	10		

(M) = Mandatory

### Master of Science in Big Data Analytics and Artificial Intelligence Research

### What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 2	Credits
Machine Learning (M)	10	Mathematics for Big Data Analytics (O)	10	Dissertation (M)	60
Artificial Intelligence 1 (M)	10	Mathematics for Big Data Analytics (O)	10		



### Master of Science in Computing in Applied Computing Research

National Framework: Level 9

LYIT Internal Code: LY\_KAPCR\_M

Duration: 1 year, full-time

#### Enables the student to tailor their studies to their specific career needs and professional interests

- Provides an excellent platform for further research studies
- Blended delivery with an option for some modules to be entirely online
- A highly applied and industry relevant course which offers graduates opportunities to improve their workplace performance.

### Key features

• Brings together theory and practice and draws on the student's own background and experience

### What will I study?

Module	Programme	Credits	Block
IT Systems for Delivery of Healthcare (E)	MSc in Digital Healthcare	5	1 (OL)
Systems Engineering for ICT in Healthcare (E)	MSc in Digital Healthcare	5	2 (OL)
Data Operations (E)	MSc in Digital Healthcare	5	1 (OL)
Assessing Wearable Sensing Systems (E)	MSc in Digital Healthcare	5	2 (OL)
Ethics in Healthcare Research Analysis (E)	MSc in Digital Healthcare	5	2 (OL)
Data Analysis & Statistical Analysis (E)	MSc in Digital Healthcare	5	3 (OL)
Wearable Sensor Technologies (E)	MSc in Digital Healthcare	5	1 (OL)
Research & Development for Healthcare Innovation (E)	MSc in Digital Healthcare	5	3 (OL)
Enterprise & Datacentre Networking (E)	MSc in Cloud Technologies	5	3 (OL) 1 (OC)
Virtual Server Administration (E)	MSc in Cloud Technologies	5	1 (OL) 1 (OC)
Computer Systems Programming (E)	MSc in Cloud Technologies	5	1 (OL)
Private Cloud Technologies (E)	MSc in Cloud Technologies	5	1 (OL) 2 (OC)
Security & Legal Issues (E)	MSc in Cloud Technologies	5	2 (OL)
Advanced Database Development (E)	MSc in Cloud Technologies	5	2 (OL)
Storage Technologies (E)	MSc in Cloud Technologies	5	3 (OL)
Secure Infrastructure (E)	MSc in Cybersecurity	5	1 (OL) 1 (OC)
Cryptography & Forensic Analysis (E)	MSc in Cybersecurity	5	1 (OL) 1 (OC)
Software Compliance (E)	MSc in Cybersecurity	5	2 (OL) 2 (OC)
Threat Management 1 (E)	MSc in Cybersecurity	5	2 (OL)
Information Security Management 1 (E)	MSc in Cybersecurity	5	2 (OL)
Business Intelligence (E)	MSc in Big Data Analytics	5	1 (OC)
Machine Learning (E)	MSc in Big Data Analytics	5	1 (OC)
Mathematics for Data Analytics (E)	MSc in Big Data Analytics	5	2 (OC)
Big Data Analytics (E)	MSc in Big Data Analytics	5	2 (OC)
Big Data Architecture (E)	MSc in Big Data Analytics	5	3 (OC)
Artificial Intelligence 1 (E)	MSc in Big Data Analytics & Al	5	2 (OC)
Artificial Intelligence 2 (E)	MSc in Big Data Analytics & Al	5	3 (OC)
Research Dissertation (M)		60	

(M) = Madatory, (E) = Elective

(OC) = (On Campus) (OL) = (On Line)

Block 1 = September to November, Block 2 = December - March, Block 3 = March - May

Students choose 30 credits from the above modules along with the Research Dissertation (no more than 20 ECTS credits can be taken from a single MSc Programme).

### Master of Science in Cloud Technologies Master of Science in Cloud Technologies Research

National Framework: Level 9

LYIT Internal Code:

LY\_KCLGT\_M (Masters)

LY\_KCLOR\_M (Structured Research

Masters) **Duration:** 

1 year, full-time 2 years, part-time WP

### **Key features**

- Industry placement option
- Industry input into course design
- Excellent employment record for graduates
- An area of high skills demand

### Master of Science in Cloud Technologies Research What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Private Cloud Technologies (M)	10	Storage Technologies (M)	10	Dissertation (M)	30
Enterprise & Data Centre Networking (M)	10	Security & Legal Issues (M)	10		
Please choose one of the following Electives (E):		Machine Learning (M)	10		
Virtual Server Administration (E)	10				
Computer Systems Programming (E)	10				

(M) = Mandatory, (E) = Elective

### Master of Science in Cloud Technologies Research What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Virtual Server Administration (E)	10	Machine Learning (E)	10	Dissertation (M)	30
Private Cloud Technologies (E)	10	Security & Legal Issues (E)	10		
Enterprise & Data Centre Networking (E)	10	Storage Technologies (E)	10		

(M) = Mandatory, (E) = Elective

Pick three elective and undertake a Dissertation that is relevant to the overall learning outcomes of the course.

Not all modules will be offered in a given year. LYIT reserves the right to select which electives will run depending on demand and availability of resources.

LYIT reserves the right to resequence which modules appear in which semester.

### Master of Science in Computing in Enterprise Applications Development

National Framework: Level 9
LYIT Internal Code: LY\_KEADE\_M

**Duration:** 

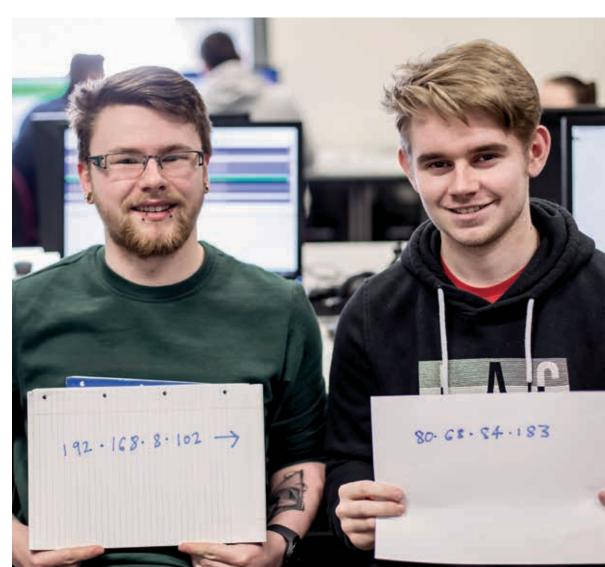
1 year, full-time 2 years, part-time

### **Key features**

- Developed in partnership with the IT industry in the North-West
- Ensures a supply of highly-skilled and experienced graduates for key employers locally and throughout Ireland

### What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Client Side Scripting (M)	15	Programme Architecture & Design Principles (M)	15	Dissertation (M)	30
Enterprise Programming (M)	15	Database Management Systems (M)	15		



### Master of Science in Computing in DevOps Master of Science in Computing in DevOps Research

#### National Framework: Level 9

**LYIT Internal Code:** 

LY\_KDVOP\_M (Masters)

LY\_KDVPR\_M (Structured Research Masters)

### Duration:

1 year, full-time 2 years, part-time

### **Key features**

- Flexible part-time and full-time options
- Industry input into course design
- A rapidly growing sector with a shortage of DevOps graduates
- In 2019, 50% of enterprise businesses actively use internal or external DevOps Services. DevOps is an in demand skill among Irish employers.

### Master of Science in Computing in DevOps What will I study?

		Credits
Semester 1	DevOps, Software Engineering (M)	10
Semester i	OO Programming for Server Administration (M)	10
Semester 2	Placement (M)	10
Semester 3	Scripting the Deployment Pipeline (M)	15
	DevOps Project Management (M)	15
Semester 4	Dissertation (M)	30

(M) = Mandatory

### Master of Science in Computing in DevOps Research What will I study?

		Credits
Semester 1	DevOps Software Engineering (M)	10
Compates	OO Programming for Server Administration (M)	10
Semester 2	DevOps Project Management (M)	10
Semester 3	Research Dissertation (M)	60



### Master of Science in Computing in Cybersecurity

With degree award options in Cybersecurity or Information Security Management or Software Compliance or Threat Management

### Master of Science in Computing in Cybersecurity Research

#### National Framework: Level 9

#### LYIT Internal Code:

LY\_KCYBS\_M (Masters)

LY\_KCYBR\_M (Structured Research

#### Masters)

#### **Duration:**

1 year, full-time 2 years, part-time

#### Key features

- Flexible part-time and full-time options
- Industry input into course design
- Excellent career opportunities for graduates
- An area of high skills demand

### What will I study?

#### Cybersecurity Semester 1 Modules (Common to all degree award options)

		Credits
Semester 1	Secure Infrastructure (M)	10
	Cryptography and Forensic Analysis (M)	10

(M) = Mandatory

### Degree Award Option: Cybersecurity

		Credits
	Threat Management 1 (E1)	10
Semester 2	Information Security Management 1 (E2)	10
	Software Compliance (E3)	10
	Threat Management 2 (E1)	10
Semester 3	Information Security Management 2 (E2)	10
	Web Application Security and Software Standards (E3)	10
Semester 4	Dissertation (M)	30

(M) = Mandatory, (E) = Elective

Pick two elective pairs from E1, E2 OR E3 and do a Dissertation that is relevant to cybersecurity. Alternatively students may do both semester 1 modules, all three semester 2 modules and one semester 3 module.

### Degree Award Option: Information Security Management

		Credits
	Threat Management 1 (E1)	10
Semester 2	Information Security Management 1 (M)	10
	Software Compliance (E2)	10
	Threat Management 2 (E1)	10
Semester 3	Information Security Management 2 (M)	10
	Web Application Security and Software Standards (E2)	10
Semester 4	Dissertation (M)	30

(M) = Mandatory, (E) = Elective

Pick one elective pairs from E1 or E2 and do a Dissertation that is relevant to Information Security Management.

### Degree Award Option: Software Compliance

		Credits
	Threat Management 1 (E1)	10
Semester 2	Information Security Management 1 (E2)	10
	Software Compliance (M)	10
	Threat Management 2 (E1)	10
Semester 3	Information Security Management 2 (E2)	10
	Web Application Security and Software Standards (M)	10
Semester 4	Dissertation (M)	30

(M) = Mandatory, (E) = Elective

Pick one elective pairs from E1 or E2 and do a Dissertation that is relevant to Software Compliance.

### Degree Award Option: Threat Management

		Credits
	Threat Management 1 (M)	10
Semester 2	Information Security Management 1 (E1)	10
	Software Compliance (E2)	10
	Threat Management 2 (M)	10
Semester 3	Information Security Management 2 (E1)	10
	Web Application Security and Software Standards (E2)	10
Semester 4	Dissertation (M)	30

(M) = Mandatory, (E) = Elective

Pick one elective pairs from E1 or E2 and do a Dissertation that is relevant to Threat Management.

### Master of Science in Computing in Cybersecurity Research What will I study?

		Credits
Compotent	Secure Infrastructure (M)	10
Semester 1	Cryptography and Forensic Analysis (M)	10
	Threat Management 1 (E)	10
Semester 2	Information Security Management 1 (E)	10
	Software Compliance (E)	10
Semester 3	Research Dissertation (M)	60

(M) = Mandatory, (E) = Elective

Pick one elective and do a Dissertation that is relevant to the overall learning outcomes of the course.

Elective modules will be offered subject to demand.

### Master of Science in Computer Science Education Research

National Framework: Level 9
LYIT Internal Code: LY\_KEDRS\_M

**Duration:** 

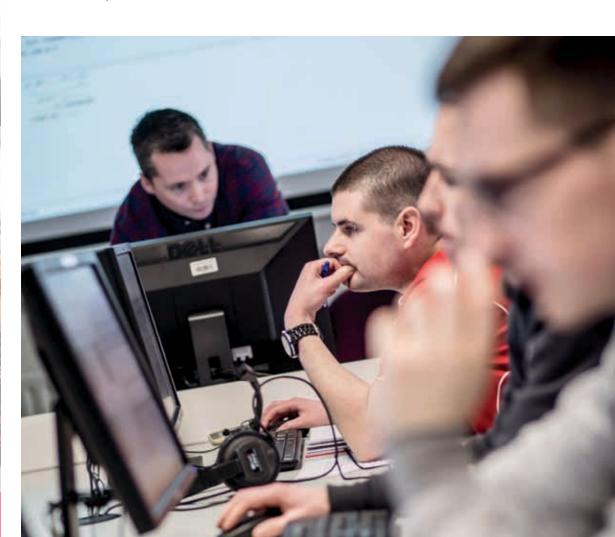
2 years, part-time

### **Key features**

- Flexible part-time and full-time options
- Blended learning with material available on the Virtual Learning Environment supplemented with face to face teaching on campus.
- This course gives the student a background in the field of computer science education
- An opportunity to develop in-depth skills through a major piece of research

### What will I study?

	Semester 1	Credits	Semester 2	Credits
Year 1	Computational Thinking for Problem Solving (M)	10	Computer Ethics and Law in Education (M)	10
Year 2	Teaching and Learning for Computer Science (M)	10	Research Dissertation (M)	60



### Master of Science in Digital Healthcare Master of Science in Digital Healthcare Research

National Framework: Level 9

**LYIT Internal Code:** 

LY\_KHLTH\_M (Masters)

LY\_KHLTR\_M

(Structured Research Masters)

**Duration:** 

1 year, full-time 2 years, part-time

#### Key features

- Flexible part-time and full-time options
- Excellent employment opportunities for graduates
- Demand for digital healthcare is growing
- Industry input into course design

### Master of Science in Digital Healthcare What will I study?

		Credits
	IT Systems for Delivery of Healthcare (M)	5
	Data Operations (M)	5
Semester 1	Systems Engineering for ICT in Healthcare (M)	5
	Assessing Wearable Sensing Systems (M)	5
	Data Analytics and Statistical Analysis (M)	10
	Ethics in Healthcare Research (M)	10
	Research and Development for Healthcare Innovation (M)	10
Semester 2	Choose one of the following Electives:	
	Wearable Sensor Technologies (E) Work Placement (E)	10
Semester 3	Dissertation (M)	30

(M) = Mandatory, (E) = Elective

### Master of Science in Digital Healthcare Research What will I study?

		Credits
	IT Systems for Delivery of Healthcare (E)	5
	Data Operations (E)	5
Semester 1	Systems Engineering for ICT in Healthcare (E)	5
	Assessing Wearable Sensing Systems (E)	5
	Data Analytics and Statistical Analysis (E)	10
	Ethics in Healthcare Research (M)	10
Semester 2	Wearable Sensor Technologies (E)	10
	Research and Development for Healthcare Innovation (E)	10
Semester 3	Dissertation (M)	60

(M) = Mandatory, (E) = Elective

Students must complete the mandatory module and choose 20 credits worth of modules from semesters 1 and 2.

The Dissertation topic must be relevant to Digital Healthcare.

### Master of Science in Advancing Health & Social Care

Postgraduate Diploma in Science in Advancing Health & Social Care

National Framework: Level 9

LYIT Internal Code: LY\_NHLSC\_M (Masters) LY\_NHLSC\_G (Postgrad Dip)

**Duration:** 

MSc: 2 years, part-time

PGDip: 1 year, full-time or 2 years,

part-time

### Key features

- Critically explore, assess, evaluate and enhance your professional expertise and interest
- Dissertation allows students to complete research in an area relevant to their work

### What will I study?

	Semester 1	Credits	Semester 2	Credits
	Advanced Research Methods (M)	10	Behaviours of Concern (M)	10
Year 1	Advanced Professional Leadership & Management (M)	10	Contemporary Legal & Professional Issues (M)	10
	Cognitive Behavioural Therapy & Mindfulness (M)	10	Research Dissertation (M)*	30
Year 2	Choose one of the following Electives (E): Teaching & Learning eHealth Sustainability in Healthcare Creativity in Relation to Therapeutic Settings	10 10 10 10		

(M) = Mandatory, (E) = Elective

<sup>\*</sup>Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits) Elective modules will only run if there is sufficient uptake.





### Master of Science in Therapeutic Interventions for Alcohol & Other Drugs

Postgraduate Diploma in Science in Therapeutic Interventions for Alcohol & Other Drugs

National Framework: Level 9

LYIT Internal Code: LY\_NTIAD\_M (Masters) LY\_NTIAD\_G (Postgrad Dip)

**Duration:** 

MSc: 2 years, part-time

PGDip: 1 year, full-time or 2 years,

part-time

### Key features

- Aims to harness students' ability to effectively deal with alcohol and other drugs issues
- Recognise that learners will come from a variety of practice/professional backgrounds, (i.e. multidisciplinary learner cohort)

### What will I study?

	Semester 1	Credits	Semester 2	Credits
Year 1	Advanced Research Methods (M)	10	Alcohol and Other Drug Use: Interventions Practice & Skills 1 (M)	10
	Theoretical Foundations in Alcohol & Other Drugs (M)	10	Children and Families: Hidden Harm (M)	10
Year 2	Alcohol, Drugs & Mental Health: Recovery Approaches (M)	10	Research Dissertation (M)*	30
	Alcohol and Other Drugs Use: Interventions Practice & Skills 2 (M)	10		

<sup>\*</sup>Not required for Postgraduate Diploma (Postgraduate Diploma = 60 ECTS Credits)

### **POSTGRADUATE SCHOLARSHIPS**

PUSHING BOUNDARIES: FULL-TIME POSTGRADUATE TAUGHT & STUCTURED RESEARCH MASTERS PROGRAMMES



Are any of our outlined full-time taught or full-time structured research Masters appealing to you? If so, then we could have a scholarship which is of interest to you. We offer up to 100 Masters Scholarships to the value of €2,750 for the following programmes:

- MA in Accounting (LY\_BACCT\_M)
- MSc in Management Practice (LY\_ BMANG\_M)
- MSc in Marketing Practice (LY\_BMARK\_M)
- MA in Governance, Compliance & Data Protection in Financial Services (LY\_ HGOVE\_M)
- MSc in Sports Performance Practice
- MA in UX Design & Applied Innovation (LY\_DUEAI\_M)
- MA in UX Design & Applied Innovation Research (LY\_DUEAI\_M)
- MSc in Big Data Analytics (LY\_KDATA\_M)
- MSc in Big Data Analytics and Artificial Intelligence (LY\_KDAAI\_M)
- MSc in Artificial Intelligence Research (LY\_KAFIR\_M)
- MSc in Applied Computing Research
- MSc in Computing in Cloud Technologies (LY\_KCLGT\_M)
- MSc in Computing in Cloud Technologies Research (LY\_KCLOR\_M)
- MSc in Computing in Enterprise Applications Development (LY\_KEADE\_M)
- MSc in Computing in DevOps (LY\_ KDVOP M)
- MSc in Computing in Cybersecurity (LY\_ KCYBS M)
- MSc in Computing in Cybersecurity Research (LY\_KCYBR\_M)
- MSc in Digital Healthcare (LY\_KHLTH\_M)
- MSc in Digital Healthcare Research (LY\_KHLTR\_M)

### Agreement:

Scholarship for a full-time Masters
programme worth €2,750 to a student,
who meets the pre-determined criteria,
which will be allocated towards course
fees.

- The scholarship will be in the form of a €1,000 reduction in the fees in each of the two semesters.
- Scholarships will only be available to those students not in receipt of another form of financial assistance from any grant awarding bodies to study.
- Scholarships are only available to EU students.
- The scholarship can be allocated towards any of the previously mentioned full-time taught postgraduate programmes.
- A Postgraduate Programmes Application
  Form can be found online at
  www.lyit.ie. Section Eight of the
  Postgraduate Application Form has to be
  completed for a student to be considered
  for the scholarship.

### Conditions of Scholarship:

- The student needs to be registered as a student at LYIT on the programme in respect of which the Scholarship is being awarded by the due registration date.
- Failure to complete the registration requirements by the due date will render the student ineligible for the award without further notice.
- The individual in receipt of the Scholarship must be attending the programme on a full-time basis.
- If the holder withdraws from the programme for which she/he has registered or fails to continue throughout the semester to meet the requirements, she/he will forfeit the Scholarship and will be required to repay to the Institute the whole or any part of the Scholarship as may be decided. In addition, the scholarship is subject to satisfactory performance in examinations.
- The Scholarship is only available in the year in which it is offered. It may not be deferred.
- The Scholarship will be awarded on academic merit. Minimum honours 2.2 is required in the undergraduate degree.

### Higher Diplomas

Higher Diploma in Business in Finance & Technology (Fintech)

Higher Diploma in Science in Computing

Higher Diploma in Science in Computing for Educators

Higher Diploma in Arts in Mainframe Business Information Systems & Infrastructure

Higher Diploma in Science in Counselling Studies

Higher Diploma in Arts in Food Product Development

Higher Diploma in Arts in Tourism Destination Marketing



### Higher Diploma in Business in Finance & Technology (Fintech) (conversion course into Financial Services Industry)

National Framework: Level 8
LYIT Internal Code: LY\_BFINT\_G

**Duration:** 

1 year, full-time 2 years, part-time



### **Key features**

• Strongly aligned with industry job requirements regionally and nationally

- Skill set transferable to the wider financial technology and general financial services sectors regionally and nationally
- Blended/flexible mode of delivery
- Personal and supportive approach to teaching and learning
- Work placement opportunities with local and national Financial Services organisations

### What will I study?

Semester 1	Credits	Semester 2	Credits
The Financial Services Industry (M)	10	Equity (M)	10
Debt (M)	10	Financial Systems Analysis (M)	5
Software Engineering for Fintech (M)	10	Project Management (M)	10
		Work Based Learning (E1)	5
		Applied Project (E2)	5

(M) = Mandatory, (E) = Elective



### Higher Diploma in Science in Computing (conversion course into Computing)

National Framework: Level 8

LYIT Internal Code: LY\_KCOMP\_G

**Duration:** 

1 year, full-time 2 years, part-time

#### **Key features**

- This course will guide graduates from non-computing fields and help augment your skills and knowledge in preparation for a career in the computing industry
- A strong emphasis on teamwork, the aim
  of the course is to empower you with
  the necessary theoretical and hands-on
  skills to allow you to work and participate
  effectively in a commercial IT environment

### What will I study?

Semester 1	Credits	Semester 2	Credits
Software Design (M)	10	Software Development & Testing (M)	10
Database Technology (M)	10	Software Engineering & Quality Assurance (M)	10
Computer Systems (M)	10	Internet Applications Development (M)	10

(M) = Mandatory

### Higher Diploma in Science in Computing for Educators

National Framework: Level 8

LYIT Internal Code: LY\_KEDUC\_G

**Duration:** 

1 year, full-time

2 - 3 years, part-time

### **Key features**

- Modules can be completed as Certificate courses
- Certificates can be combined towards final award
- Programme offered in various locations in Ireland
- Designed for flexible upskilling, in line with Teaching Council criteria

### What will I study?

		Credits
	Digital Citizenship (M)	10
	Computer Systems (M)	10
	Coding with Syntax (M)	10
	Coding Principles (M)	10
Year 1	Database Technology (E)	10
	Mobile Applications Development (E)	10
	Web Development & HCI (E)	10
	Robotics for the Classroom (E)	10
	Data Science (E)	10

(M) Mandatory, (E) = Elective

Choose two elective options.



### Higher Diploma in Arts in Mainframe Business Information Systems & Infrastructure

National Framework: Level 8

LYIT Internal Code: LY\_BMFBI\_G

Duration: 1 year Wi

#### **Key Features**

- Strongly aligned with industry job requirements regionally and nationally
- Blended / flexible mode of delivery
- Full access to IBM Mainframe services
- Personal and supportive approach to teaching and learning

#### What will I study?

Semester 1	Credits	Semester 2	Credits
Mainframe Application Development 1 (Cobol) (M)	10	SYSPROG 2 (z/OS Systems Programming Fundamentals) (M)	10
Mainframe Application Development 2 (Cobol/DB2/CICS) (M)	10	SYSPROG 3 (IBM MQ V8 System Administration for z/OS) (M)	5
SYSPROG 1 (z/OS Infrastructure) (M)	(M) 5	Mainframe Application Development 3 (PL/1) (M)	10
		The Mainframe IDE & Supporting Coding Languages (M)	5
		Work Based Learning (E1)	5
		Applied Project (E2)	5

(M) Mandatory, (E) = Elective

### Higher Diploma in Science in Counselling Studies

National Framework: Level 8

LYIT Internal Code: LY NCOUN G

**Duration:** 

1 year, full-time 2 years, part-time

### Key features

- Part-time delivery (full-time if demand)
- Allows for progression to a professional counselling qualification
- Delivered by fully qualified counsellors
- Personal and professional development to enable students realise their full potential
- Counselling skills to the fore in programme

### What will I study?

Semester 1	Credits	Semester 2	Credits	Semester 3	Credits
Counselling Skills & Theory (M)	10	Cognitive Behavioural Approaches: Concepts & Skills (M)	10	Supporting Clients through Change (M)	10
Body Centred Counselling (M)	10	Humanistic Approaches in Counselling (M)	10	Interpersonal & Intrapersonal Relationships (M)	10

### Higher Diploma in Arts in Food Product Development

National Framework: Level 8
LYIT Internal Code: LY\_TFPDV\_G
Duration: 1 year WP

#### Key features

 A conversion programme aimed at graduates to meet the needs of those progressing from undergraduate qualifications in science, the social sciences and humanities as well as from more applied and inter-disciplinary undergraduate programmes such as business and management

- This programme has been designed to promote and encourage the synthesis of advanced knowledge and skills in the area of food product innovation, planning, design and development
- The programme takes a broad entrepreneurial view of food product development, exploring issues and problems relevant to a wide range of situations and issues that managers and other professionals are likely to face

### What will I study?

Semester 1	Credits	Semester 2	Credits
Culinary Practice for Food Product Development (M)*	5	Food Products - Design & Development (M)	10
Consumer Behaviour In Food Marketing (M)	5	Strategic Marketing Management (M)	10
Food Product Innovation (M)	10		
Quality Assurance & Food Regulatory Affairs (M)	10	Work Placement (M)	10

(M) = Mandatory

### Higher Diploma in Arts in Tourism Destination Marketing

National Framework: Level 8
LYIT Internal Code: LY\_TTDMK\_G

Duration: 1 year WP

### Key features

- Industry placement
- Focus on digital marketing, distribution channels and social media
- Small class sizes, facilitating a learner centred approach
- Practical hands-on projects
- Industry expert seminars

### What will I study?

Semester 1	Credits	Semester 2	Credits
Tourism E-Business (M)	5	Financial Management & Entrepreneurship In Tourism (M)	10
Consumer Behaviour In Tourism (M)	5	Strategic Marketing Management (M)	10
European & International Tourism Policy (M)	10		
Tourism Management & Destination Development (M)	10	Work Placement (M)	10

<sup>\*</sup>Additional bridging, including four hours of Professional Kitchen Operations, for participants with no food industry experience may be made available as required.