

# **Course Specification**

Published Date:	05-Oct-2020
Produced By:	Oliver Jones
Status:	Validated

# **Core Information**

Awarding Body / Institution:	University of Wolverhampton		
School / Institute:	School of Architecture and Built Environment		
Course Code(s):	AT001T01UV Full-time 4 Years AT001T31UV Part-time 8 Years		
UCAS Code:	K190		
Course Title:	BSc (Hons) Architectura	l Design Technology with Found	ation Year
Hierarchy of Awards:	Bachelor of Science with Honours Architectural Design Technology Bachelor of Science Architectural Design Technology Diploma of Higher Education Architectural Design Technology Certificate of Higher Education Architectural Design Technology Foundation and Preparatory Studies Architectural Design Technology University Statement of Credit University Statement of Credit		
Language of Study:	English		
Date of DAG approval:	01/Sep/2017		
Last Review:	2015/6		
Course Specification valid from:	: 2009/0		
Course Specification valid to:	2021/2		

# **Academic Staff**

Course Leader:	Dr David Heesom
Head of Department:	Mr Colin Orr

# **Course Information**

Location of Delivery:	University of Wolverhampton
Category of Partnership:	Not delivered in partnership
Teaching Institution:	University of Wolverhampton
Open / Closed Course:	This course is open to all suitably qualified candidates.

## **Entry Requirements:**

Entry requirements are subject to regular review. The entry requirements applicable to a particular academic year will be published on the University website (and externally as appropriate e.g. UCAS

#### 2017 Entry

- DD from A level
- BTEC QCF Extended Diploma grade PPP, BTEC QCF Diploma grade MP
- Pass Access to HE Diploma (Full Award)
- If you've got other qualifications or relevant experience, please contact <u>The Gateway</u> for further advice before applying.
- International entry requirements and application guidance can be found here

### Other Requirements

Students must have studied a minimum of two years post GCSE level. However, it is expected that some applicants will be mature students with work experience, who wish to further their career development. These applicants will be processed through standard procedures, which may involve an interview as part of the process. Please see <a href="http://wlv.ac.uk/mature">http://wlv.ac.uk/mature</a> for further information.

Applicants who do not meet the entry requirements may be offered an alternative course.

### Distinctive Features of the Course:

This course brings together a range of skills and subjects including design, new technology, sustainability and construction methods that can lead you into a professional career within the construction industry.

The course is taught by staff with industry experience using a combination of methods that match professional practice including studio and drawing office sessions and using the latest Computer Aided Design (CAD) to develop your design work.

The course is developed with input from industry professionals to ensure that it is up to date and meets the needs of the industry. Due to this industry relevance, the course is accredited by the Chartered Institute of Architectural Technologies (CIAT).

You can develop the skills and knowledge that you need to study at undergraduate level, building on your strengths and working on your weaknesses, so that you can feel confident that by the end you are ready to commence a degree course, and to apply the skills to undertake the directed and independent learning which will help you to achieve your potential. This will allow you to embark on Level 4 study in an appropriate undergraduate discipline or combined award, confident that you have developed the skills and chosen the most relevant subject area(s) to specialise in, which will allow you to perform strongly at degree level and enhance your career aims.

#### Educational Aims of the Course:

The aim of this course is to develop students with sound knowledge of the architectural design process providing them with all of the skills required to become an architectural technologist.

Throughout the programme, students will develop specialist skills in the areas of the science of architecture, building design and construction, giving them the ability to understand and form the link between concept, design and construction. The course provides students with the ability to negotiate and manage the design process whilst also understanding how to implement technical knowledge to develop innovative solutions within the framework of current working practices and legislation. Students will acquire and implement the skills required to fully understand the construction project whilst gaining knowledge of how to negotiate and manage all aspects of architectural and construction contracts.

In	+	2	Ն	Δ	٥.
111	L	а	ĸ	u	S.

September

# Major Source of Funding:

Office for Students (OFS)

#### **Tuition Fees:**

Tuition fees are reviewed on an annual basis. The fees applicable to a particular academic year will be published on the University website.

Year	Status	Mode	Amount
2020/1	Н	Full Time / Sandwich	£9250.00
2020/1	Overseas	Full Time / Sandwich	£12250.00
2020/1	Н	Part Time	£3050.00
2020/1	Overseas	Part Time	£6125.00

## PSRB:

None

Course Structure:

# September (Full-time)

Part time students study alongside full time students. However, they do not study more than 80 credits in each academic calendar year.

## Year 1

Module	Title	Credits	Period	Type
3CC004	Problem Solving in Science and Technology	20	SEM1	Core
3PY002	Communication and study skills	20	SEM1	Core
3MM003	Foundation Mathematics I	20	SEM1	Core
3CS001	Fundamentals of Computing	20	SEM2	Core
3CN005	Orientation to Infrastructure and the Built Environment	20	SEM2	Core
3MM004	Foundation Mathematics II	20	SEM2	Core

# September (Full-time)

Part time students study alongside full time students. However, they do not study more than 80 credits in each academic calendar year.

## Year 2

Module	Title	Credits	Period	Type
4AT003	Achitectural Detailing-Services, Fittings and Furnishings	20	SEM2	Core
4AT005	Applied Design Studio	20	SEM2	Core
4AT018	Materials, Construction and Structure	20	SEM1	Core
4AT004	Design Studio (Art, Drawing, Process and Models)	20	SEM1	Core
4AT009	Professional and Environmental Studies	20	SEM1	Core
4AT019	Digital Design	20	SEM2	Core

# September (Full-time)

Part time students study alongside full time students. However, they do not study more than 80 credits in each academic calendar year.

## Year 3

Module	Title	Credits	Period	Type
5AT019	Advanced Construction, Structure and Service	20	SEM1	Core
5AT018	BIM Integrated Design	20	SEM2	Core
5CN018	Conservation and Preservation of Buildings	20	SEM1	Core
5AT013	Production Information and Specification	20	SEM1	Core
5AT002	Property Re-Use	20	SEM2	Core
5AT014	Built Environment Legislation	20	SEM2	Core

# September (Full-time)

Part time students study alongside full time students. However, they do not study more than 80 credits in each academic calendar year.

# Year 4

Module	Title	Credits	Period	Type
6AT015	Major Project and Exhibition	40	SEM2	Core
6AT016	Building Information Modelling Technologies	20	SEM1	Core
6AT009	Special Studies Dissertation	20	SEM1	Core
6CN007	Building Pathology	20	SEM2	Core
6AT001	Contract Administration	20	SEM1	Core

Please note: Optional modules might not run every year, the course team will decide on an annual basis which options will be running, based on student demand and academic factors, to create the best learning experience.

# Learning, Teaching and Assessment

# Academic Regulations Exemption:

None

#### Reference Points:

QAA subject benchmark - Architectural Technology (including CIAT threshold requirements) (2014)

Construction Industry Council – Higher Education Graduate Common Learning Outcomes (2008)

QAA/QCA/School Key Skills Descriptors.

University of Wolverhampton Equality and Diversity Policy (2007).

School Intellectual Skills Descriptors

School undergraduate Assessment Tariff

School briefing paper 'Equality and Diversity in the Curriculum' (2008)

School ethics guidelines (2007).

## Equality Act (2010)

# Learning Outcomes:

Foundation Year Course Learning Outcome 1 (UCCLO1)

Solve real world problems using mathematical and statistical techniques.

Foundation Year Course Learning Outcome 2 (UCCLO2)

Communicate scientifically using oral and written skills to provide information to a variety of audiences.

Foundation Year Course Learning Outcome 3 (UCCLO3)

Demonstrate and apply problem solving skills to a range of scientific and technological scenarios.

Foundation Year Course Learning Outcome 4 (UCCLO4)

Demonstrate and apply knowledge of a range of scientific and technological subjects.

Foundation Year Course Learning Outcome 5 (UCCLO5)

Demonstrate personal development in terms of career choice.

CertHE Course Learning Outcome 1 (CHECLO1)

"Demonstrate knowledge of the underlying concepts and principles associated with your area(s) of study, and an ability to evaluate and interpret these within the context of that area of study."

CertHE Course Learning Outcome 2 (CHECLO2)

"Demonstrate an ability to present, evaluate and interpret qualitative and quantitative data, in order to develop lines of argument and make sound judgements in accordance with basic theories and concepts of your subject(s) of study."

CertHE Course Learning Outcome 3 (CHECLO3)

Evaluate the appropriateness of different approaches to solving problems related to your area(s) of study and/or work.

CertHE Course Learning Outcome 4 (CHECLO4)

"Communicate the results of your study/work accurately and reliably, and with structured and coherent arguments."

CertHE Course Learning Outcome 5 (CHECLO5)

Demonstrate the qualities and transferable skills necessary for employment requiring the exercise of some personal responsibility.

DipHE Course Learning Outcome 1 (DHECLO1)

"Demonstrate knowledge and critical understanding of the well-established principles of your area(s) of study, and of the way in which those principles have developed with an understanding of the limits of your knowledge, and how this influences analyses and interpretations based on that knowledge."

DipHE Course Learning Outcome 2 (DHECLO2)

"Demonstrate the ability to apply underlying concepts and principles outside the context in which they were first studied, including, where appropriate, the application of those principles in an employment context"

DipHE Course Learning Outcome 3 (DHECLO3)

"Demonstrate knowledge of the main methods of enquiry in the subject(s) relevant to the named award, and ability to evaluate critically the appropriateness of different approaches to solving problems in the field of study."

DipHE Course Learning Outcome 4 (DHECLO4)

"Use a range of established techniques to initiate and undertake critical analysis of information, and to propose solutions to problems arising from that analysis."

DipHE Course Learning Outcome 5 (DHECLO5)

"Effectively communicate information, arguments and analysis in a variety of forms to specialist and non-specialist audiences, and deploy key techniques of the discipline effectively."

DipHE Course Learning Outcome 6 (DHECLO6)

"Demonstrate the qualities and transferable skills necessary for employment, requiring the exercise of personal responsibility and decision-making and undertake further training, developing existing skills and acquire new competences that will enable them to assume significant responsibility within organisations."

Ordinary Degree Course Learning Outcome 1 (ORDCLO1)

"Become fully conversant with the four main aspects of the discipline, namely Design Procedures, Technology, Procurement and Contracts and Professional Practice."

Ordinary Degree Course Learning Outcome 2 (ORDCLO2)

"Demonstrate informed design and understand the ways that needs analysis, marketing, aesthetics, development and preparation of a design brief/specification lead to an appropriate design solution and drawing preparation."

Ordinary Degree Course Learning Outcome 3 (ORDCLO3)

"Demonstrate the ability to recognise novel problems, evaluate, interpret and synthesise technological data and apply this knowledge in the development of creative, innovative and inclusive solutions within the wider community"

Ordinary Degree Course Learning Outcome 4 (ORDCLO4)

Develop design schemes using appropriate methods and materials and communicate design and technology information through a range of visual and verbal techniques including the use of ICT.

Ordinary Degree Course Learning Outcome 5 (ORDCLO5)

"Demonstrate an awareness of management, enterprise and organisational issues within the appropriate design environment including project management, time / cost factors and ethical and legal responsibilities."

Ordinary Degree Course Learning Outcome 6 (ORDCLO6)

"Demonstrate a range of key skills required in practice namely communication, numeracy, IT, working with others, improving own learning and performance, and problem solving."

Honours Degree Course Learning Outcome 1 (DEGCLO1)

"Become fully conversant with the four main aspects of the discipline, namely Design Procedures, Technology, Procurement and Contracts and Professional Practice."

Honours Degree Course Learning Outcome 2 (DEGCLO2)

"Demonstrate informed design and understand the ways that needs analysis, marketing, aesthetics, development and preparation of a design brief/specification lead to an appropriate design solution and drawing preparation."

Honours Degree Course Learning Outcome 3 (DEGCLO3)

"Demonstrate the ability to recognise novel problems, evaluate, interpret and synthesise technological data and apply this knowledge in the development of creative, innovative and inclusive solutions within the wider

community."

Honours Degree Course Learning Outcome 4 (DEGCLO4)

Develop design schemes using appropriate methods and materials and communicate design and technology information through a range of visual and verbal techniques including the use of ICT.

Honours Degree Course Learning Outcome 5 (DEGCLO5)

"Demonstrate an awareness of management, enterprise and organisational issues within the appropriate design environment including project management, time / cost factors and ethical and legal responsibilities."

Honours Degree Course Learning Outcome 6 (DEGCLO6)

"Demonstrate a range of key skills required in practice namely communication, numeracy, IT, working with others, improving own learning and performance, and problem solving."

Overview of Assessment:

Module	Title	Course Learning Outcomes
3CC004	Problem Solving in Science and Technology	UCCLO1, UCCLO2
3CN005	Orientation to Infrastructure and the Built Environment	UCCLO2, UCCLO4, UCCLO5
3CS001	Fundamentals of Computing	UCCLO2, UCCLO4, UCCLO5
3MM003	Foundation Mathematics I	UCCLO1, UCCLO3, UCCLO4, UCCLO5
3MM004	Foundation Mathematics II	UCCLO1, UCCLO3, UCCLO4, UCCLO5
3PY002	Communication and study skills	UCCLO2, UCCLO4, UCCLO5
4AT003	Achitectural Detailing-Services, Fittings and Furnishings	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
4AT004	Design Studio (Art, Drawing, Process and Models)	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
4AT005	Applied Design Studio	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
4AT009	Professional and Environmental Studies	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
4AT018	Materials, Construction and Structure	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
4AT019	Digital Design	CHECLO1, CHECLO2, CHECLO3, CHECLO4, CHECLO5
5AT002	Property Re-Use	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
5AT013	Production Information and Specification	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
5AT014	Built Environment Legislation	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
5AT018	BIM Integrated Design	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
5AT019	Advanced Construction, Structure and Service	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
5CN018	Conservation and Preservation of Buildings	DHECLO1, DHECLO2, DHECLO3, DHECLO4, DHECLO5, DHECLO6
6AT001	Contract Administration	DEGCLO1, DEGCLO5, ORDCLO1, ORDCLO5
6AT009	Special Studies Dissertation	DEGCLO1, DEGCLO2, DEGCLO3, DEGCLO4, DEGCLO6, ORDCLO1, ORDCLO2, ORDCLO3, ORDCLO4, ORDCLO6
6AT015	Major Project and Exhibition	DEGCLO1, DEGCLO2, DEGCLO3, DEGCLO4, DEGCLO6, ORDCLO1, ORDCLO2, ORDCLO3, ORDCLO4, ORDCLO6
6AT016	Building Information Modelling Technologies	DEGCLO3, DEGCLO4, DEGCLO6, ORDCLO3, ORDCLO4, ORDCLO6
6CN007	Building Pathology	DEGCLO1, DEGCLO2, DEGCLO3, DEGCLO4, DEGCLO6, ORDCLO1, ORDCLO2, ORDCLO3, ORDCLO4, ORDCLO6

# Teaching, Learning and Assessment:

Ultimately the learning that you undertake throughout this course will lead you on the path to become a professional designer. The ability to create successful designs underpins all learning activities within the course. Throughout the modules you will develop a range of theoretical and practical skills that you will put into practice through completing various projects. Evaluation of previous designs is also one of the core competencies you will learn to develop and apply. Realisation of sound designs, based on past experiences and through a range of techniques, is vital to achieving success as a professional.

Solving real world problems will underpin all of your learning on this course. Having the ability to specifically identify the clients' needs and provide a design will ensure your solutions are fit for purpose. Inclusivity will also feature heavily in all of your learning to realise solutions that are fit for all aspects of society. The combination of the above will provide you with the skills required as your start your careers as a professional designer.

There is a range of specific learning activities that you will engage with during the course of your study.

You will take part in lectures and seminars. Some of these will be more traditional whereas others will require you to undertake research before coming together to discuss design issues with a range of students and academic staff and put these into the wider global context including such topical problems as sustainability and inclusivity. You will have seminars from industry practitioners and have the opportunity to discuss your projects with them to gain real world insight into the problems you are trying to solve. You will work in a dedicated design studio to create physical models of your designs. Throughout the classes you will obtain skills required to create models using traditional manual techniques and you will also learn how to create models using the latest techniques such as rapid prototyping and 3D printing.

Based on problems that are provided, you will create your design drawings in the dedicated 'drawing office' using traditional drawing methods. You will develop your *digital literacy* through a range of skills and make use of web based information to inform design, for example deriving design standards from online BS documents, researching design concepts from the World Wide Web. Design schemes are produced using a range of tools and techniques from word processing, spreadsheet calculations to 3D computer modelling and using 2D graphics packages to create scheme presentation boards.

Teaching of design draws on international cultures and this is used to underpin module content. The ethics of design is a key element to all courses and this concept features heavily in modules, with students studying topics such as secure design and inclusivity. Your position as a *global citizen* will be developed through your learning as the department has a range of international collaborations that enables various cultures to be embedded into the teaching of design. Previously, students have underpinned their global design knowledge with field trips abroad to analyse international architecture.

Working in multidisciplinary teams, you will mirror real world practice to develop sustainable and inclusive design schemes. Often working on design briefs specified by industry practitioners, you will work as if in the real world and develop skills required of them in the work environment. As *enterprising* designers you will develop solutions that seek out the most appropriate and cost effective solution for the client. Additionally, you will take part external design competitions where you can compete with other students from around the country.

#### Assessment Methods:

At the University of Wolverhampton, a variety of modes of assessment will be used to support and test your learning and progress and to help you develop capabilities that are valued beyond your University studies and into your working life. Your course may include a variety of assessment activities:

Written examinations (including online examinations, open and closed book examinations and quizzes)
Coursework (for example, essays, reports, portfolios, project proposals and briefs, CVs, poster presentation)
Practical (for example, oral and video presentations, laboratory work, performances, practical skills assessment)

In the final year of your undergraduate degree, and at the end of your postgraduate degree, you are likely to be expected to write an extended piece of work or research, such as a dissertation or a practice-based piece of research.

#### Student Support:

Within each of the modules you will develop academic study skills through completion of weekly tasks that will help you to develop your design abilities, understand how to research particular topics through the web and more traditional means and how to write in an academic and industry relevant style.

The University complements this by supporting your learning through the provision of generic study skills including communication and how to write academic assignments.

In addition, there will be opportunities to develop your information seeking and information management skills. These may be in the form of seminars or workshops delivered by LIS staff and embedded into the curriculum or by following the programme of "Infobite" workshops available in the Learning Centres.

From the very start of your course you will work with staff within the department and with your personal tutorial to develop a Personal Development Plan (PDP) and this will provide you with a record and action plan of where you need to develop your skills in particular areas.

## Employability in the Curriculum:

Successful completion of this course will give you an internationally accredited and recognised qualification and will form the basis for excellent career prospects as an architectural technologist throughout the world. The architectural technologist works closely with architects and other building professionals in both the public and private sectors.

Some of our graduates are now working for some of the most well respected practices in the world including Skidmore Owens and Merrill, Kingspan, Carillion, Tweedale and several local authorities. In addition, some of our graduates have chosen to further their knowledge by undertaking postgraduate studies.

