

Construction

Unit code: M/600/0444

QCF Level 3: BTEC Nationals

Credit value: 10
Guided learning hours: 60

Aim and purpose

The aim of this unit is to enable learners to develop an understanding of the nature of the property market, the factors that affect property values, how to obtain a mortgage and determine mortgage repayments. Learners will also develop the skills needed to value properties.

Unit introduction

Property plays a key part in the economics of government, business and people's lives. Property values influence the wealth of countries, companies and pensions. Property is at the centre of economic success at a personal, national level and global level.

An understanding of the value of property is essential when working in construction. Construction is the process of creating the built assets that people, businesses and governments need to achieve their plans for the future, whether these are homes to live in, pension plans for retirement, business plans or the provision of public services like schools and hospitals. Property has a role to play in many aspects of life.

A major requirement when dealing with property, at any time, is to be able to value the investments being built. This unit looks at the various methods used by valuers in everyday practice.

Learners will develop an understanding of the economics of the property market, including the effect of supply and demand on value. The reasons for valuing property and the correlation with the property owner's aspirations will be explored.

Learners will gain a practical understanding of how mortgages are obtained and the interest rates that are applied to the monies loaned. They will perform calculations to determine the value of property, mortgage repayments and the changes in these that are caused by fluctuations in rates of interest.

Knowledge, skills and understanding will be developed so that learners can prepare a valuation and prepare and present appraisal and valuation reports in a practical, vocational context. Learners will have the opportunity to value local residential and business properties. The unit will enable them to realise investment opportunities and determine the value of rent by calculations using valuation tables and software tools.



Learning outcomes

On completion of this unit a learner should:

- Understand the economics of the property market and the factors that affect the value of property
- 2 Know the reasons for valuing property and the methods used to perform such valuations
- 3 Be able to produce valuations
- 4 Understand how to obtain a mortgage and determine the associated mortgage payments.

Unit content

1 Understand the economics of the property market and the factors that affect the value of property

Economics of the property market: property as an investment; types of investment; effect of changes in supply and demand on the value of property; elasticity in the market; effect of different tenures; retail 'shell and core'

Sources of finance: eg banks, building societies, private finance; pensions with property invested eg Self Invested Pension Plans (SIPPs)

Factors that affect value: government initiatives; role of Bank of England in controlling inflation and deflation; property value control; social issues concerning housing; value of planning permission and the concepts and applications of planning gain; laws and regulations influencing the value of property

2 Know the reasons for valuing property and the methods used to perform such valuations

Valuing property: general valuations, statutory valuations, professional valuers

General valuation methods: depreciated replacement cost (DRC) for financial business reporting and taxation purposes; market value; reinstatement cost for insurance purposes; outgoings; service charges; residual method of valuation; inducements, eg rent-free periods

Statutory valuation methods: council tax; business rates; landlord and tenant valuations; residential tenancy valuations under Rent Acts

Professional valuers: roles and responsibilities in both private and public sectors; the roles of the Valuation Office Agency (VOA); training and professional qualifications; duties of care

3 Be able to produce valuations

Standards used to produce valuations: International Valuation Standards; Public Sector Accounting Standards; RICS Valuation Standards (Red Book)

Methods used to produce valuations: value for sale and/or rent (all types of residential dwellings and simple commercial properties); effects of various factors eg location, age and style on value of properties; Land Registry data; rateable values for business rates using VOA rating lists

Mathematics of valuation: valuation tables and associated formulae (amount of £1, present value of £1, amount of £1 per annum, sinking funds); years' purchase; yield; retail property value zones 'in terms of zone A' (ITZA); business use classifications

4 Understand how to obtain a mortgage and determine the associated mortgage payments

Obtaining a mortgage: sources eg bank, building society, housing associations; conditions; mortgage repayments; depreciation

Mortgage repayment calculations: interest rates (simple and compound); savings; loans; bank rates

Assessment and grading criteria

In order to pass this unit, the evidence that the learner presents for assessment needs to demonstrate that they can meet all the learning outcomes for the unit. The assessment criteria for a pass grade describe the level of achievement required to pass this unit.

Assessment and grading criteria					
To achieve a pass grade the evidence must show that the learner is able to:		To achieve a merit grade the evidence must show that, in addition to the pass criteria, the learner is able to:		To achieve a distinction grade the evidence must show that, in addition to the pass and merit criteria, the learner is able to:	
P1	explain the economics of the property market [IE1, IE2, IE4]	M1	government initiatives on investments and how they	D1	evaluate the factors that affect the value of a specified domestic property
P2	examine the common sources of finance for property investment [IE1, IE2, IE4]	affect property values			
Р3	explain the factors that affect property values [IE1, IE2, IE4]				
P4	identify the reasons why individuals, businesses and the government need to know the value of property [IE1, IE2, IE4 CT1, RL4]	M2	assess methods used to perform property valuations		
P5	describe the methods used to perform property valuations [IE1, IE2, IE4]				
P6	describe the roles and responsibilities of professionals involved in property valuation [IE1, IE2, IE4]	M3	describe the training and qualifications of professionals involved in the process of obtaining a mortgage		
P7	create valuation reports [IE1, IE2, IE4 CT1, RL4, TW1, TW4, SM2, EP1, EP2]	M4	analyse how changes in interest rates affect valuations, investments and mortgages.	D2	evaluate market forces to determine the rental valuation of a commercial property for investment purposes.

Asse	Assessment and grading criteria		
To achieve a pass grade the evidence must show that the learner is able to:		To achieve a merit grade the evidence must show that, in addition to the pass criteria, the learner is able to:	To achieve a distinction grade the evidence must show that, in addition to the pass and merit criteria, the learner is able to:
P8	carry out comparative valuations of residential property [IE1, IE2, IE4 CT1, RL4, TW1, TW4, SM2, EP1, EP2]		
P9	explain the procedures used to obtain a mortgage [IE1, IE2, IE4 CT1, RL4]		
P10	perform simple and compound interest mortgage repayment calculations. [IE1, IE2, IE4 CT1, RL4, TW1, TW4, SM2, EP1, EP2]		

PLTS: This summary references where applicable, in the square brackets, the elements of the personal, learning and thinking skills applicable in the pass criteria. It identifies opportunities for learners to demonstrate effective application of the referenced elements of the skills.

Key	IE – independent enquirers	RL – reflective learners	SM – self-managers
	CT – creative thinkers	TW – team workers	EP – effective participators

Essential guidance for tutors

Delivery

The purpose of this unit is to develop understanding of the underlying concepts involved in property valuation and for learners to apply this understanding to applications in the property market. Delivery strategies should reflect the nature of work within the property market by using an assignment and/or portfolio building approach where learners take ownership of their own learning.

This is a specialised unit and should be delivered at a later stage within the programme.

For delivery, it is important to use up-to-date information from estate agents and property management companies, as well as obtaining information from the internet or from the learner's place of work. Current interest rates will need to be obtained from local building societies/banks or from online sources.

Although the mathematics of valuations and the use of valuation tables are based on variations of the compound interest formula, it is worth spending time ensuring that learners are happy with formula transformations, indices and the use of a scientific calculator. There is an obvious link with *Unit 3: Mathematics in Construction and the Built Environment*. This can be achieved through the use of worked examples covering different stages of property development.

Finally, a valuation should be integrated into a case study concerning a real property (the learner's own home or one they are familiar with, preferably close to the centre where they are studying) and it may be linked closely with the delivery of *Unit 25: Property Law in Construction*, especially where it is being studied alongside this unit.

Visiting speakers from the property professions or visits/placements to professional offices would be useful to place concepts in a vocational setting.

Group activities are permissible, but tutors will need to ensure that individual learners have equal experiential and assessment opportunities.

Health, safety and welfare issues are paramount and should be reinforced through close supervision of all workshops and activity areas, and risk assessments must be undertaken before practical activities are taken. Centres are advised to read the *Delivery approach* section in the specification, and *Annexe H: Provision and Use of Work Equipment Regulations 1998 (PUWER)*.

Outline learning plan

The outline learning plan has been included in this unit as guidance and can be used in conjunction with the programme of suggested assignments.

The outline learning plan demonstrates one way in planning the delivery and assessment of this unit.

Topic and suggested assignments/activities and/assessment

Introduction to unit content

Whole-group teaching – concept of property valuation, principles of valuation, property market, roles of government, tenures, retail 'shell and core', sources of finance for property investment, factors affecting property values, report writing; professional standards, setting out and coverage, sources of information for the valuer, Land Registry, journals, on the web presentation techniques relevant to assignment tasks, importance of sound communication of results of property valuations

Group practise researching in textbooks, journals and websites

Group work investigating government initiatives and their effects on property values

Group work investigating local factors

Learners practise report writing, preparation and delivery of presentations

Assignment 1: Economics of the Property Market

Whole-group teaching – reasons for and uses of valuations (statutory and non-statutory), legal and regulatory factors influencing the valuation, effects of changes in interest rates, types of investment, sources of finance

Group work investigating availability of finance for various, typical types of property

Learner activity identifying and exploring the legal and regulatory factors that influence valuations

Further learner practice in preparing reports and presentations

Whole-group teaching – methods of valuation – the 'five methods' (investment method, comparative method, contractor's method ie cost based, profits method, residual valuation), rental valuation methods, DRC; market value; reinstatement cost valuations, inducements, service charges, role of professionals, their training and qualifications, local situations that affect valuations

Visit to a professional office/guest speaker for an insight into professional practice and the roles of valuers in construction

Group work investigating local situations

Learner activity investigating roles, training and qualifications of professionals

Learners practise carrying out rent valuations of a commercial property for investment purposes and report writing

Assignment 2: Valuing Property

Whole-group teaching – calculations to give valuations in practical situations to actual properties, residential properties, business properties, compile property details to accompany reports, professional standards of valuation, use of the Red Book

Group work investigating actual properties

Group work using standards, including the Red Book

Learner activity in presenting a valuation to an imagined client which complies with legal requirements and commercial best practice

Learners practise compiling property details from practice properties, involving property viewings and measurements/records taken 'on site'

Learners practise desk-top calculations

Topic and suggested assignments/activities and/assessment

Whole-group teaching – methods of comparison (for existing residential property, for new residential property, comparison techniques for both rental and capital valuations), analysis of transactions in the market, discovery of relevant data and subsequent analysis, adjustment of data to fit the property being valued

Group work investigating sources of data

Group work investigating actual properties

Learners practise obtaining data, making comparisons and reporting findings

Learners practise adjusting data for local factors and creating valuations

Whole-group teaching – mortgage application and granting processes, jobs in the mortgage industry and professional duties, practice of mortgage repayment calculations, simple interest calculations, compound interest calculations, applications in practical situations, conditions attached to mortgages, business mortgages in personal pensions (SIPPs)

Visits to properties of various kinds – onsite calculations of floor areas and taking notes of property particulars relevant to various types of valuations

Group work investigating practical solutions to problems in valuations

Learner activity investigating professional standards and resolution of problems

Learners practise carrying out calculations and report writing with appropriate caveats

Assignment 3: Carrying Out Valuations, Applying for Mortgages and Assessing Mortgage Repayments

Review of unit and assignment feedback

Assessment

The assessment strategies used in this unit need to reflect the evidence required to meet the grading criteria. Evidence may be gathered through well-planned investigative assignments, case studies, simulated valuation exercises and calculations of property values using a range of methods and techniques.

The assessment strategies used in learning outcomes 1 and 2 address the need for learners to develop practical and enquiry skills and use reference resources to explain the theory of property valuation.

The processes and applications of valuation methods need to be considered, wherever possible, throughout the unit and are focused on learning outcomes 2 and 3.

Pass grade learners may require significant tutor assistance to achieve all the unit outcomes. Evidence of achievement will need to include descriptions of the different types of investment available and the sources of finance. This could be provided, for example, in the form of a presentation, a report or through oral questioning based on a tutor-provided case study.

Learner calculations must be carried out using standard methods of calculation and evidence should include all working out. Answers must be substantially correct, but the odd mistake is acceptable if corrected after feedback from the tutor.

Learners must be able to use valuation tables and software to determine the basic components of a valuation (amount of £1, present value of £1, amount of £1 per annum, sinking funds and years' purchase). The evidence should include all working out, and annotated tables and/or computer printouts as appropriate, and answers must be substantially correct, although the odd mistake is acceptable if corrected after feedback from the tutor.

To meet the pass grade, learners must be able to carry out a comparative valuation for a residential property. Evidence should take the form of a report that includes details of comparable properties and a rationale underpinning the final valuation of the property in question.

Merit grade learners will work with more independence. Learners will carry out research with little guidance and will be able to plan and carry out practical work to solve complex problems, or use a range of practical techniques. Distinction grade learners will be able to make accurate calculations or give reasons for any inaccuracies.

For PI, learners must explain the economies of the property market. They must demonstrate an understanding of property as an important investment as well as a place to live or do business.

For P2, learners must describe the common sources of finance for property investment including banks, building societies and private finance. The sources should be clearly differentiated, but there is no requirement for a detailed understanding of each at this level.

For P3, learners must explain the factors that affect property values. This should include factors such as supply and demand, location and the availability of finance.

For P4, learners must identify the reasons why individuals, businesses and the government need to know the value of property. This should include establishing market value, council tax and general taxation, insurance purposes, to use as collateral against borrowing and so on. The reasons should be clearly differentiated, but there is no requirement for a detailed understanding at this level.

For P5, learners must describe the methods used to perform property valuations. This should cover each of the methods detailed in the unit content of learning outcome 2. Each method must be described in sufficient detail for the procedures involved to be clear to a previously uninformed audience.

For P6, learners must describe the roles and responsibilities of professionals involved in property valuation. This should include the duty of care involved.

For P7, learners must create valuation reports. The methods used to compile the reports should be restricted to those mentioned in learning outcome 3.

For P8, learners must be able to carry out a comparative valuation for a residential property. Evidence should take the form of a report including details of comparable properties, the value of those comparable properties and a rationale underpinning the final valuation of the property in question.

For P9, learners must explain the procedures used to obtain a mortgage. This could be supported by documentation obtained from a prominent provider of mortgage funding, such as a bank or a building society.

For P10, learners must perform simple and compound mortgage repayment calculations. The difference between simple and compound interest must be clear and learners must be able to calculate simple and compound interest mortgage payments. These calculations must be carried out using standard formats. Evidence should include all working and the answers must be substantially correct. The odd mistake is acceptable if corrected after feedback from the tutor.

For MI, learners must be able to analyse the effect of government initiatives on investments and how they affect property values. This should include the effects of government control and inflation with special regard to house and property prices. Evidence could take the form of a report supported by articles from the quality press and trade magazines, and any relevant calculations.

For M2, learners must assess methods of property valuation.

For M3, learners must describe the training and qualifications of the professionals involved in the process of obtaining a mortgage. This could take the form of a flow diagram. In-depth detail is not required but it should be clear what is involved at each stage of the training and development.

For M4, learners must must analyse how changes in interest rates affect mortgages, valuations and investments and apply their knowledge in a practical situation. Examples of suitable evidencing approaches are as for M1.

For DI, learners must evaluate the factors that affect the value of a specified domestic property. The evidence should take the form of a report.

For D2, learners must evaluate market forces to determine the rental valuation of a commercial property for investment purposes. Evidence should take the form of a report with supporting tables and calculations.

Programme of suggested assignments

The following table shows a programme of suggested assignments that cover the pass, merit and distinction criteria in the grading grid. This is for guidance and it is recommended that centres either write their own assignments or adapt any Edexcel assignments to meet local needs and resources.

Criteria covered	Assignment title	Scenario	Assessment method
PI, P2, P3, MI, DI	Economics of the Property Market	The directors of a development company have decided to enter the property market and employ you as a consultant to deliver a presentation on the value of property and investments to the economy.	A report and a presentation to the directors.
P4, P5, P6, M2, M3	Valuing Property	A firm of surveyors wants you to induct their student recruits into the firm. They need you to explain why property is valued, how valuations are carried out and what qualifications and training are needed to perform valuations.	An information booklet and presentation to be delivered to the inductees.
P7, P8, P9, P10, M4, D2	Carrying Out Valuations, Applying for Mortgages and Assessing Mortgage Repayments	You have been instructed by a client to give valuations for particular properties and provide written advice on mortgages for buyers, vendors and landlords, as required.	A report, supported by appropriate calculations, and a presentation to imagined clients.

Links to National Occupational Standards, other BTEC units, other BTEC qualifications and other relevant units and qualifications

This unit forms part of the BTEC Construction and the Built Environment sector suite. This unit has particular links with the following unit titles in the Construction and the Built Environment suite:

Level 1	Level 2	Level 3
	Structure of the Construction Industry	Mathematics in Construction and the Built Environment
		Economics and Finance in Construction and Civil Engineering
		Planning Procedures in Construction
		Property Law in Construction

This unit links to the Level 3 National Occupational Standards in Surveying, Property and Maintenance.

Essential resources

Learners can find information using local and national newspapers, estate agent websites, banks and building societies and journals. Newspapers contain useful weekly property supplements.

Employer engagement and vocational contexts

Visits to companies and from employees are useful to the delivery of this unit. The use of vocational contexts is essential in delivery and assessment. Many property sector businesses apply the concepts covered in this unit to the valuation, sale and renting of property.

Visiting speakers from the property professions and/or visits/placements to professional offices would be useful to place concepts in a vocational setting.

Support to enable centres to initiate and establish links to industry, and to networks arranging visits to industry and from property practitioners is given below:

- Learning and Skills Network www.vocationallearning.org.uk
- National Education and Business Partnership Network www.nebpn.org
- The Royal Institution of Chartered Surveyors www.rics.org
- Work Experience/Workplace learning frameworks Centre for Education and Industry (CEI University of Warwick) – www.warwick.ac.uk/wie/cei/

Indicative reading for learners

Textbooks

Baum A and Crosby N – Property Investment Appraisal (Blackwell Publishing, 2008) ISBN 9781405135559

Cherry A – A Valuer's Guide to the RICS Red Book, 6th Edition (RICS Books, 2008) ISBN 9781842193532

Davidson A W – Parry's Valuation and Investment Tables, 12th Edition (EG Books, 2002) ISBN 9780728203686

Hayward R – Valuation: Principles into Practice, 6th Edition (EG Books, 2008) ISBN 0728205246

International Valuation Standards Committee – *International Valuation Standards* (RICS Books, 2007) ISBN 9780922154944

Isaac D – Property Valuation Principles (Palgrave Macmillan, 2002) ISBN 0333693337

Johnson T, Davies K and Shapiro E – Modern Methods of Valuation, 9th Edition (EG Books, 2000) ISBN 0728203464

Millington A F – An Introduction to Property valuation, 5th Edition (EG Books, 2001) ISBN 0728203501

Myers D – Economics and Property, 2nd Edition (EG Books, 2006) ISBN 9780728204874

RICS Valuation Faculty – The Red Book – RICS Valuation Standards (RICS Books, 2008) ISBN 9781842193426

Scarrett D – Property Valuation: the Five Methods, 2nd Edition (Spon Press, 2008) ISBN 9780415423267

Journals

Business – the magazine of the Royal Institution of Chartered Surveyors (RICS)

Estates Gazette – Estates Gazette Group

Property Week - CMP

RICS Commercial Property – RICS

RICS Residential Property - RICS

The Economist – The Economist

Websites

www.egi.co.uk A subscription service of Estates Gazette

www.home.co.uk House prices, mortgage calculator and useful links

www.landregistry.gov.uk Land Registry House Price Index (HPI), price paid data

www.propertymall.co.uk A site with useful links to matters of property interest

www.propertyweek.com Online edition of Property Week

www.rics.org RICS property profession resource, including podcasts

www.rightmove.co.uk The Rightmove House Price Index, links to estate agent sales particulars

www.voa.gov.uk The VOA resource for Council Tax and Business Rates (rating lists)

Delivery of personal, learning and thinking skills (PLTS)

The following table identifies the PLTS opportunities that have been included within the assessment criteria of this unit:

Skill	When learners are
Independent enquirers	identifying questions to answer and problems to resolve in the consideration of particular properties for valuation
Creative thinkers	creating ideas and exploring possibilities that arise for the valuation of property
Reflective learners	inviting feedback and dealing positively with praise, setbacks and criticism in the assessment of their work
Team workers	working together carrying out practical work in group assignments and showing fairness and consideration to others when reporting their property valuations to others in a professional manner
Self-managers	taking personal responsibility, and showing initiative, creativity and enterprise in professionally approaching the work of valuing property
Effective participators	playing a full part in the preparation and delivery of group presentations, proposing practical approaches to the valuation of property and communicating with integrity.

Functional Skills – Level 2

Skill	When learners are
ICT – Use ICT systems	
Select, interact with and use ICT systems independently for a complex task to meet a variety of needs	using the internet to search for information and to use software applications
Use ICT to effectively plan work and evaluate the effectiveness of the ICT system they have used	using software applications to programme activities of work in undertaking assignments
Manage information storage to enable efficient retrieval	managing files and folders in assignment work to enable efficient information management
Follow and understand the need for safety and security practices	storing and backing up information in an orderly and safe manner
Troubleshoot	responding appropriately to systems errors and various problems when using word processing, web search and printing applications
ICT – Find and select information	
Select and use a variety of sources of information independently for a complex task	selecting and using information from the web and from software applications in research for assignment tasks
	recognising copyright and other constraints on the use of information, acknowledging sources and avoiding plagiarism
Access, search for, select and use ICT-	using internet sources of information purposefully and effectively
based information and evaluate its fitness for purpose	recognising the intention and authority of the provider, currency of the information, relevance and bias
ICT – Develop, present and communicate information	
Enter, develop and format information independently to suit its meaning and purpose including:	using ICT word-processing and presentation applications in compiling reports to satisfy assignment tasks
text and tables	
• images	
• numbers	
• records	
Bring together information to suit content and purpose	organising information of different forms, or from different sources, to achieve various purposes including presentations
Present information in ways that are fit for purpose and audience	working accurately and proofreading, using software facilities where appropriate, ensuring clear meaning
	seeking views of others, checking spelling and calculations, ensuring consistent layout and previewing printouts
	using appropriate conventions for letters, memoranda, reports etc in assignment tasks

Skill	When learners are
Evaluate the selection and use of ICT tools and facilities used to present information	reviewing and modifying work as it progresses to ensure the results are fit for purpose and audience, and in informing future judgements
	checking draft presentations, reports etc with intended professional audiences
Select and use ICT to communicate and exchange information safely, responsibly and	using email messaging in communicating internally and externally when carrying out study, research and assignment work
effectively including storage of messages and contact lists	adapting a vocational style to suit a professional audience
Mathematics	
Understand routine and non-routine problems in a wide range of familiar and unfamiliar contexts and situations	calculating areas of properties and monetary values in practical contexts and understanding valuation formulae in multiple step operations
Select and apply a range of skills to find solutions	using measurement skills including the taking of measurements from drawings and on site, applying formulae to these measurement to arrive at answers and recognising that the answers are appropriate
Use appropriate checking procedures and evaluate their effectiveness at each stage	verifying that answers are correct using staged checking techniques
Interpret and communicate solutions to practical problems in familiar and unfamiliar routine contexts and situations	using various means of communicating results of calculations with statistics in tables and diagrams, using ICT were appropriate
Draw conclusions and provide mathematical justifications	reporting the outcomes of valuations using reflective analysis
English	
Speaking and listening – make a range of contributions to discussions and make	presenting information and ideas clearly and persuasively to others
effective presentations in a wide range of contexts	adapting contributions in discussions to suit a professional audience, purpose and situation
	using a professional vocabulary in a responsible and ethical context
Reading – compare, select, read and understand texts and use them to gather	undertaking research activities by selecting and using different types of texts to obtain relevant information
information, ideas, arguments and opinions	reading and summarising succinctly information from different sources
	identifying the purpose of texts and commenting on how effectively meaning is conveyed
	detecting points of view, implicit meaning and bias

Skill	When learners are
Writing – write documents, including extended writing pieces, communicating information, ideas and opinions, effectively and persuasively	presenting information on complex matters such as property valuations concisely, clearly, logically and persuasively to a professional audience
	using a range of different styles of writing for different purposes
	using a range of sentence structures, including complex sentences, with accurate punctuation, grammar, spelling and meaning
	using a professional vocabulary in a responsible and ethical context.