

Year 13 A2 ICT Checklist

NAME _____ GROUP _____

MODULE 4 – “Information Systems Within Organisations”

CRITERIA for 13.1 Organisational Structure	
Understand the basic concepts of organisational structure.	

CRITERIA for 13.2		
Information Systems and Organisations	Understand the difference between an information system and a data processing system. Understand the role and relevance of an information system in aiding decision making.	
Definition of a Management Information System	Recall that an MIS is a system to convert data from internal and external sources into information. This is communicated in an appropriate form to managers at different levels to enable them to make effective decisions for planning, directing and controlling the activities for which they are responsible.	
The Development and Life Cycle of an Information System	Recognise the existence of formal methods, the need for clear time scales, deliverables and approval to proceed.	
Success or Failure of a Management Information System	Understand the factors influencing the success or failure of an information system: inadequate analysis, lack of management involvement in design, emphasis on computer system, concentration on low-level data processing, lack of management knowledge of ICT systems and their capabilities, inappropriate / excessive management demands, lack of teamwork, lack of professional standards.	

CRITERIA for 13.3		✓
Corporate Information Systems Strategy	Describe the factors influencing an information system within an organisation: management organisation and functions, planning and decision making methods, legal and audit requirement, general organisation structure, responsibility for the information system within an organisation, information flow, hardware and software, standard, behavioural factors e.g. personalities, motivation, ability to adapt to change.	
Information Flow	Describe the methods and mechanisms of information flow within an organisation both formal and informal and the constraints imposed upon this by organisational structures.	
Personnel	Understand the levels of task/personnel within an organisation: strategic, implementation, operational and relate the needs of these three levels to the information system.	

CRITERIA for 13.4		✓
Information and Data		
Information	Understand management information needs; the concept of relevance and methods of interpretation.	
	Understand that information has many characteristics and can be classified in many ways. Examples include: Source - internal, external, primary, secondary; Nature - quantitative, qualitative, formal, informal; Level - strategic, tactical, operational; Time - historical, current, future; Frequency - real-time, hourly, daily, monthly; Use - planning, control, decision; Form - written, visual, aural, sensory; Type - disaggregated, aggregated sampled;	
	Discuss the value of information in aiding the decision making process.	
	Understand the difference between internal and external information requirements.	
	Describe the characteristics of good information and delivery: relevant, accurate, complete, user confidence, to right person, at right time, in right detail, via correct channel of communication, understandable.	
	Describe the advantages and characteristics of good information within an applications context.	
Effective Presentation	Understand the effect that the method and style of presentation has upon the message – design in relation to the intended audience.	
Data	Understand that data may require translation or transcription prior to entry into the system. This can affect the accuracy of the data.	
	Discuss the impact of quantity and quality of data on the method of data capture and the control and audit mechanisms required to manage the data capture.	

CRITERIA for 13.5 The Management of Change		✓
Understand that the introduction or development of an information system will result in change; this must be managed. Factors could include re-skilling, attitude, organisational structure, employment pattern and conditions, internal procedures.		

CRITERIA for 13.6		✓
Legal Aspects	Understand the need for a corporate information technology security policy and its role within an organisation. Factors could include prevention of misuse, detection, investigation, procedures, staff responsibilities, disciplinary procedures.	
	Describe the content of a corporate information technology security policy.	
	Describe methods of improving awareness of security policy within an organisation. cross referencing to training and standards.	
Audit Requirements	Understand that many information technology applications are subject to audit.	
	Understand the impact of audit on data and information control.	
	Describe the need for audit and the role of audit management / software tools software.	
	Understand the function of audit trails and describe applications of their use; e.g. ordering systems, student tracking, police vehicle enquiries.	
Disaster Recovery and Management	Describe the various potential threats to information systems. Factors could include; physical security, document security, personnel security, hardware security, communications security, software security.	
	Understand the concept of risk analysis.	
	Understand the commercial need to ensure that an information system is protected from threat.	
	Describe a range of contingency plans to recover from disasters and relate these to identified threats.	
	Describe the criteria used to select a contingency plan appropriate to the scale of an organisation and installation.	
Legislation	Understand that the implementation of legislation will impact on the procedures within an organisation.	
	Describe the methods of enforcing and controlling data protection legislation within an organisation.	
	Describe the methods of enforcing and controlling software misuse legislation within an organisation.	
	Describe the methods of enforcing and controlling health and safety legislation within an organisation.	
	Discuss the implications of the various types of legislation.	

CRITERIA for 13.7		✓
User Support	Describe the ways in which software houses provide user support; relate these to cost and package credibility.	
	Describe the range of user support options available when using industry standard packages. These could include: existing user base, support articles, utilities, specialist bulletin boards, communications systems eg Internet, e-mail.	
	Select and justify an appropriate user support system for a particular context.	
	Explain the need for different levels of documentation related to user and task.	
Training	Explain the need for different levels of training related to user and task.	
	Understand the need for continual skill updating and refreshing.	
	Describe the methods by which users can gain expertise in software use and discuss their relative merits.	
	Understand the need to develop training strategies to respond to growing user awareness.	

CRITERIA for 13.8		✓
Project Management and Effective ICT Teams		
Understand why projects are often sub-divided into tasks and allocated to teams.		
Describe the characteristics of a good team; leadership, appropriate allocation of tasks, adherence to standards, monitoring, costing, controlling.		

CRITERIA for 13.9		✓
Information and the Professional	Discuss the social, moral and ethical issues associated with the introduction and use of information and communication technology systems as they affect a professional working within the industry.	
	Understand that 'codes of practice' exist separate from any legal requirements with which professional organisations are expected to comply.	
	Understand the need for a code of practice for ICT users in an organisation.	
Employee Code of Conduct	Understand what is meant by an employee code of conduct; responsibilities, authorisation, security, penalties for misuse.	
	Describe the contents of such a code of practice.	