



Northampton International Academy

Design & Technology Curriculum Overview



Why Teach Design and Technology?

We believe that Design and Technology is at its core all about creativity and imagination. Students learn to design and make products taking into account the modern world and needs of others, allowing them to access a plethora of careers in the growing area of the creative industries and engineering.

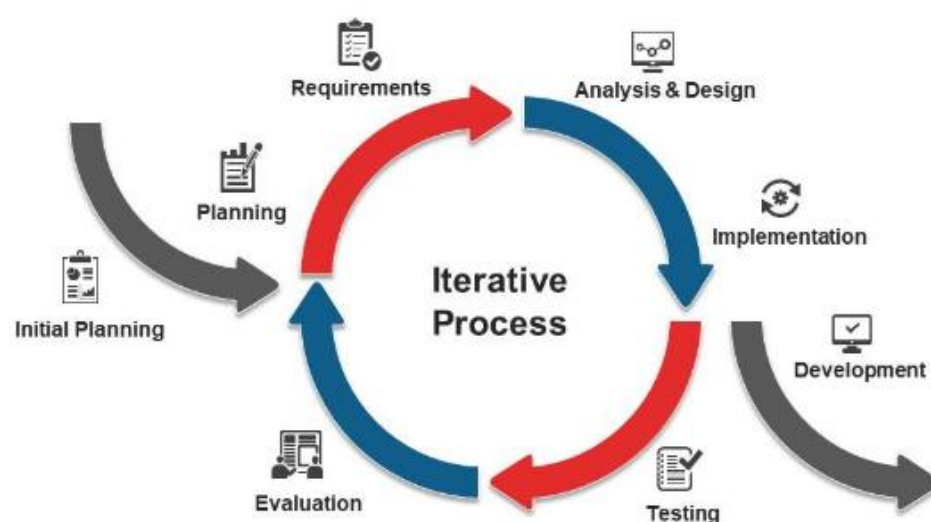
Students have to consider others and understand their view points, think in creative ways to solve problems, learning practical skills an variety of media techniques and process in order to achieve an effective end result.

Design and technology require a combination of divergent and creative thinking blended with theoretical understanding and practical skills.

From designing objects for a commercial market through to clothing, furniture and Food, Design and technology equips students for their future by encompassing practical life skills and encourages students to be make appropriate decisions and solve problems – essential skills for the modern world.

We want our students to be able to think like designers, make decisions and find solutions and use practical skills to support their lives in the future.

Iterative Process Model



Substantive Knowledge

KS1 Only	KS1 and KS2			KS2 only		KS3			KS4 (GCSE)	
Mechanisms 	Food 	Textiles 	Structures 	Mechanical Systems 	Electrical Systems 	Food and Nutrition 	Art Textiles 	Product Design 	Product Design 	Food

Design and Technology Teaching Approaches

Following the D&T Association's 'Projects on a Page' we use the following approaches to teaching topics.

Investigative and Evaluative Activities	(IEAs) where children learn from a range of existing products and find out about D&T in the wider world.
Focused Tasks	(FTs) where they are taught specific technical knowledge, designing skills and making skills.
Design, Make and Evaluate Assignment	(DMEA) where children create functional products with users and purposes in mind.

Disciplinary Knowledge

	Designing	Understanding contexts, user and purposes
		Generating, developing, modelling, and communicating ideas
	Making	Planning
		Practical skills and techniques
	Evaluating	Own ideas and products
		Existing products
		Key events and individuals