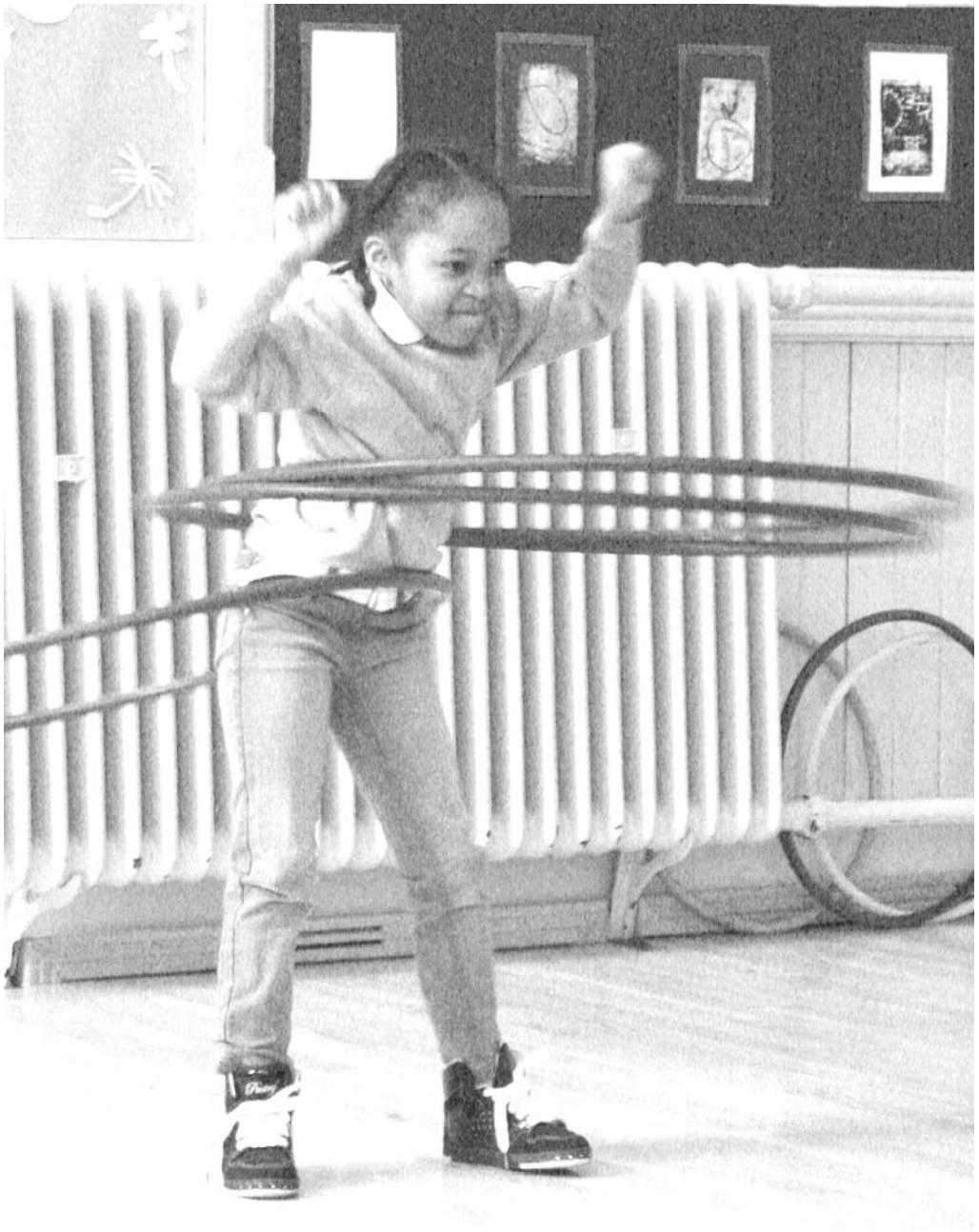

Creative Learning

at Springfield

Design & Technology

Subject Leader's check lists

Breadth of Study Checklist — Design & Technology

Key Stage 1	Key Stage 2
Investigating and evaluating a range of familiar products (Eg talking about how they work, and whether they do what they are supposed to do) **Focused Practical Tasks that develop a range of techniques, skills, processes and knowledge** **Designing and making assignments using a range of materials, including** food, items that can be put together to make products, and textiles.	**Investigating and evaluating a range of familiar products, thinking about how they work, how they are used and the views of people who use them** **Focused Practical Tasks that develop a range of techniques, skills, processes and knowledge** **Designing and making assignments using a range of materials, including** electrical and mechanical components, food, mouldable materials, stiff and flexible sheet materials, and textiles.

Skills Development Design & Technology

Key Stage 1

Developing, Planning and Communicating Ideas:

Generate ideas from experience and by experimenting with materials
Talk about ideas
Plan by suggesting what to do next as ideas develop
Communicate ideas using a variety of methods, including drawing and models

Working with tools, equipment, materials and components to make quality products:

Select tools, techniques and materials from a range selected by the teacher
Explore the sensory qualities of materials
Assemble, join and combine materials
Use simple finishing techniques
Follow safe procedures for food safety and hygiene

Evaluating:

Talk about ideas, saying what they like and dislike
Identify what they could have done differently or how they could improve work in the future

Knowledge and understanding of materials and components:

Learn about the working characteristics of materials (eg folding paper, plaiting yarn to make it stronger)
How mechanisms can be used in different ways (eg wheels and axels that allow movement)

Key Stage 2

Developing, Planning and Communicating Ideas:

Generate ideas after thinking about who will use them and what they will be used for, using information from a number of sources, including ICT
Develop and explain ideas clearly with design objectives
Plan, suggesting a sequence of actions or alternatives if needed
Communicate design ideas in different ways

Working with tools, equipment, materials and components to make quality products:

Select tools, techniques and materials
Suggest alternative ways of making a product if the first attempt fails
Measure, mark out, cut and shape materials accurately
Use finishing techniques to strengthen and improve the appearance of the product, following safe procedures for food safety and hygiene

Evaluating:

Reflect on work in relation to intended use (and users) and identify improvements needed, carrying out appropriate tests first

Knowledge and understanding of materials and components:

Learn how the working characteristics of materials affect the way they are used
Learn how materials can be combined and mixed to create more useful properties
Learn how mechanisms can be used to make things move in different ways, using a range of equipment, including ICT control programs
Learn how electrical circuits, including those with switches, can be used

Level 1 Design & Technology

Communication Skills	Application Of Mathematics	Information Technology	Working With Others	Improving Own Learning and Performance	Problem Solving
I can talk about how moving objects work (eg slides or levers) I draw pictures with labels to tell others about my designs I can make a model and talk about how it is useful for someone I can talk about my work, telling others why I did it the way I did I can tell someone what I am making and which tools I am using	I can compare objects using 'biggest' and 'smallest' I know what half is and use this as a measurement I know about turns and can see a full turn and half a turn I use a balance to weigh things	I use the computer to plan my ideas I use the computer to write about my design and how I can improve it.	I discuss with others how fruit and vegetables keep me healthy	I can practise skills the teacher has shown me, and use them to think of my own ideas I can use a construction kit and other materials to make models I know about food hygiene I can make models that look like real things I have studied I can talk about my ideas, saying what I like and dislike	I can work out how something works by looking at it (sometimes taking it apart) I can mix the right ingredients to make something that can be eaten I know how to use tools safely I can work out how to make models stronger

Level 2 Design & Technology

Communication Skills	Application Of Mathematics	Information Technology	Working With Others	Improving Own Learning and Performance	Problem Solving
I can talk about how moving objects work (eg slides or levers) I draw pictures with labels to tell others about my designs I can make a model and talk about how it is useful for someone I can talk about my work, telling others why I did it the way I did I can tell someone what I am making and which tools I am using	I can compare objects using 'biggest' and 'smallest' I know what half is and use this as a measurement I know about turns and can see a full turn and half a turn I use a balance to weigh things	I use the computer to plan my ideas I use the computer to write about my design and how I can improve it.	I discuss with others how fruit and vegetables keep me healthy	I can practise skills the teacher has shown me, and use them to think of my own ideas I can use a construction kit and other materials to make models I know about food hygiene I can make models that look like real things I have studied I can talk about my ideas, saying what I like and dislike	I can work out how something works by looking at it (sometimes taking it apart) I can mix the right ingredients to make something that can be eaten I know how to use tools safely I can work out how to make models stronger

Level 3 Design & Technology

Communication Skills	Application Of Mathematics	Information Technology	Working With Others	Improving Own Learning and Performance	Problem Solving
I can talk about how moving objects work (eg slides or levers) I draw pictures with labels to tell others about my designs I can make a model and talk about how it is useful for someone I can talk about my work, telling others why I did it the way I did I can tell someone what I am making and which tools I am using	I can compare objects using 'biggest' and 'smallest' I know what half is and use this as a measurement I know about turns and can see a full turn and half a turn I use a balance to weigh things	I use the computer to plan my ideas I use the computer to write about my design and how I can improve it.	I discuss with others how fruit and vegetables keep me healthy	I can practise skills the teacher has shown me, and use them to think of my own ideas I can use a construction kit and other materials to make models I know about food hygiene I can make models that look like real things I have studied I can talk about my ideas, saying what I like and dislike	I can work out how something works by looking at it (sometimes taking it apart) I can mix the right ingredients to make something that can be eaten I know how to use tools safely I can work out how to make models stronger

Level 4 Design & Technology

Communication Skills	Application Of Mathematics	Information Technology	Working With Others	Improving Own Learning and Performance	Problem Solving
I can talk about how moving objects work (eg slides or levers) I draw pictures with labels to tell others about my designs I can make a model and talk about how it is useful for someone I can talk about my work, telling others why I did it the way I did I can tell someone what I am making and which tools I am using	I can compare objects using 'biggest' and 'smallest' I know what half is and use this as a measurement I know about turns and can see a full turn and half a turn I use a balance to weigh things	I use the computer to plan my ideas I use the computer to write about my design and how I can improve it.	I discuss with others how fruit and vegetables keep me healthy	I can practise skills the teacher has shown me, and use them to think of my own ideas I can use a construction kit and other materials to make models I know about food hygiene I can make models that look like real things I have studied I can talk about my ideas, saying what I like and dislike	I can work out how something works by looking at it (sometimes taking it apart) I can mix the right ingredients to make something that can be eaten I know how to use tools safely I can work out how to make models stronger

Level 5 Design & Technology

Communication Skills	Application Of Mathematics	Information Technology	Working With Others	Improving Own Learning and Performance	Problem Solving
I can talk about how moving objects work (eg slides or levers) I draw pictures with labels to tell others about my designs I can make a model and talk about how it is useful for someone I can talk about my work, telling others why I did it the way I did I can tell someone what I am making and which tools I am using	I can compare objects using 'biggest' and 'smallest' I know what half is and use this as a measurement I know about turns and can see a full turn and half a turn I use a balance to weigh things	I use the computer to plan my ideas I use the computer to write about my design and how I can improve it.	I discuss with others how fruit and vegetables keep me healthy	I can practise skills the teacher has shown me, and use them to think of my own ideas I can use a construction kit and other materials to make models I know about food hygiene I can make models that look like real things I have studied I can talk about my ideas, saying what I like and dislike	I can work out how something works by looking at it (sometimes taking it apart) I can mix the right ingredients to make something that can be eaten I know how to use tools safely I can work out how to make models stronger