



Waste Wizards – Lesson overviews

Lesson Focus	Key Question(s)	Activities	Skills	Where do we need to go next? Learning detours?
<p>Lesson 1 Investigating the Global Food Waste Crisis</p>	<p><i>Authentic Hook: Pupils receive letter from Bwyd i Bawb' community shop asking them for help with their surplus bananas. How much food is wasted in the UK? How can we help combat this?</i></p> 	<p>Activity 1 Using the PowerPoint resource, pupils learn facts about food waste across the globe. Bananas and bread being the worst culprits. Pupils read letter from the community food shop which asks them for help with what to do with their surplus bananas. Pupils investigate how to combat food waste in different ways: Turning into recipes, freezing, buying less at the supermarket, keeping products over 'best before' date.</p> <p>Activity 2 Pupils calculate the cost of food waste in the UK over different periods of time using an Excel Template. Pupils learn to recognise up to 9-digit numbers.</p> <p>Activity 3 Pupils learn to cook a banana muffin recipe, using surplus bananas from Bwyd i Bawb.</p>	<p>Digital Competence I can adjust keywords and search techniques to find relevant information. I can begin to reference sources used in my work, and consider if content is reliable. I can store search results for future use, e.g. bookmark, add to favourites.</p> <p>Humanities I can describe and give simple explanations about the impact of human actions on the natural world in the past and present.</p> <p>Health & Wellbeing I can plan and prepare basic, nutritious meals.</p>	<p>Where would be the best place to sell our muffins?</p>
<p>Lesson 2 Investigating Food Miles</p>	<p><i>How far has the contents of our fridge travelled? Why is it eating in season better for our planet?</i></p>	<p>Activity 1 Discussion: Why do we need to rely on other countries to obtain some foods all through the year, what are the downsides of this? Introduce pupils to the idea of 'seasonality'. Pupils are given a range of fresh foods, including pineapple, grapes, blueberries etc. Pupils use the labels to identify the origin of the product and then using Google Earth to calculate exact food miles to Ammanford.</p> <p>Activity 2 Pupils plot on a digital map the origin of each of the fresh foods.</p> <p>Activity 3 Pupils create an 'infographic' using Adobe Creative cloud showing how we can all reduce our food miles (Visiting the 'in season' section of supermarket, growing our own etc)</p>	<p>Digital Competence I can construct, refine and interrogate data sets within tables, charts, spreadsheets and databases to test or support an investigation. I can use a range of spreadsheet formulae, e.g. + - / x, sum, average, max, min.</p> <p>Humanities I can describe some of the relationships, links and connections between a range of societies.</p> <p>Science & Technology I can use design communication methods to develop and present ideas, and respond to feedback.</p> <p>Language, Literacy & Communication I can select appropriate language for different audiences and purposes.</p>	<p>Can we visit our local supermarket to identify the 'in season' area? Do all supermarkets have this? Are there businesses that just sell in season? Is it possible to create an environment in our country where any produce can be grown throughout the year?</p>
<p>Lesson 3 Preparing our Stall and selling our products</p>	<p><i>How can we encourage others to waste less?</i></p>	<p>Activity 1 (Rich Community Experience) Pupils recreate their banana muffin recipe and sell to parents and other members of the community at the end of the school day. Pupils give away recipes to encourage others to use up bruised bananas rather than through them away. Key: 1.4 bananas are thrown away in the UK each day.</p>	<p>Humanities I have planned and taken an active role in response to challenges and opportunities in my local community, or in Wales or the wider world, and I have done so individually or as part of a team.</p> <p>Health & Wellbeing I can plan and prepare basic, nutritious meals.</p>	<p>As our stall was such a success, how can we take this further? How can we sell to more people in our community?</p>

<p>Lesson 4 Evaluating the success of our stall</p>	<p><i>How successful was our Waste Wizards stall?</i></p>	<p>Activity 1 Pupils evaluate success of their stall and look how to take things further. Pupils create a digital survey to find out what others thought of their banana muffins and what else they would like to see available at the 'Waste Wizards' stall.</p>	<p>Digital Competence I can invite feedback/responses from others Language, Literacy and Communication I can select appropriate language for different audiences and purposes.</p>	<p>What other recipes could we make from surplus foods?</p>
<p>Lesson 5 Designing our Café</p>	<p><i>Can we design our own Waste Wizards café?</i></p>	<p>Activity 1 Pupils write an email to their headteacher to ask for permission to set up a café on the school yard. Email to include reasons as to why they feel it would be a success and important facts about how it could help combat food waste in the UK. Pupils also learn how to embed a photo of themselves selling the muffins to parents. Activity 2 Pupils are given planning sheets to sketch a rough design and brainstorm ideas. Using their design sheets, pupils build their café to a given scale on Minecraft to support their email. Once pupils have built their café, they screen cast their designs and add to an iMovie. Pupils add extra information to their designs by adding in audio recordings of their voice and text.</p>	<p>Digital Competence I can exchange online communications, making use of a growing range of available features I can demonstrate appropriate online behaviour Language, Literacy and Communication I can select appropriate language for different audiences and purposes.</p>	<p>What if it rains on our launch day? Can we set up a dedicated area inside? What else could we do if Mr Evans says no? What about children who have allergies?</p>
<p>Lesson 6 Opening our café</p>	<p><i>Can we successfully launch 'The No Waste Space' for other pupils at Bro Banw?</i></p>	<p>Activity 1 Pupils bake a range of banana-based recipes using ingredients donated from our community shop. (Bonny Banana muffins, Coco-Banana Cookies) Activity 2 Pupils decide which roles they will take on during the opening. As a class discussion, brainstorm which roles are required and why. It may include:</p> <ul style="list-style-type: none"> • Front of house • Servers • Cleaners • Till operator • Take-away servers • Food preparation <p>Activity 3 Pupils launch café on yard 2, using a range of equipment such as tables, chairs, menus, order books etc.</p>	<p>Science & Technology I can use design communication methods to develop and present ideas, and respond to feedback. Health & Wellbeing I can plan and prepare basic, nutritious meals. Humanities I have planned and taken an active role in response to challenges and opportunities in my local community, or in Wales or the wider world, and I have done so individually or as part of a team. Science & Technology I can select and safely use appropriate tools, materials and equipment to construct purposeful outcomes.</p>	<p>How can we do this on a weekly basis? How can we get other classes involved?</p>
<p>Lesson 7 Evaluating Success of Cafe</p>	<p><i>How successful was our Café Launch – 'The No Waste Space'?</i></p>	<p>Activity 1 Pupils complete collaborative thinking activity asking a range of questions related to their opening. <i>Key questions to include, what went well, what would we change next time, what was the response of the other pupils, how do we know this?</i> Activity 2 Pupils design second digital survey to obtain further information about their café launch from other pupils who visited cafe. Survey to collate both qualitative and quantitative data.</p>	<p>Digital Competence I can demonstrate appropriate online behaviour I can invite feedback/responses from others Science & Technology I can use design communication methods to develop and present ideas, and respond to feedback.</p>	<p>How can we make more profit? Could we publish a recipe book showing all the recipes we have made?</p>