



<b>Science and DT topic:</b> Materials	Year: Reception Age 4-5	Title: Incy Spider shelter test
<b>Enquiry Focus</b> Explore and perform simple tests		<b>Concept context</b> Properties of materials
<p><b>Assessment Focus</b></p> <ul style="list-style-type: none"> <li>• Can children test different materials to sort by waterproofness?</li> <li>• Can children use and test a chosen material to build a shelter?</li> </ul>		
<p><b>Activity</b> <i>Today we will be engineers.</i> Read Incy Wincy rhyme or mock up a letter from Incy asking for a shelter so that he doesn't keep getting 'washed out' in the rain. Children explore materials (e.g. range of fabrics, shower cap, old mac etc) looking closely with magnifying glasses and testing with droppers/syringes. Collect children's ideas about the materials on post-its or in a floorbook. Ask them to select a material which they think would keep Incy dry. Make a shelter structure for children to test their chosen material e.g. using lego or a box. Discuss their choice of material and how suitable it is for protecting Incy.</p> <p><b>Adapting the activity</b> <b>Support:</b> work with the child to explore and describe one material at a time. Photo prompts of possible designs. <b>Extension:</b> Compare different shelters in terms of how wet or dry Incy is. <b>Other ideas:</b> Retell Incy's shelter tests through oral story/role play. Test different ways to make paper waterproof e.g. wax crayon.</p> <p><b>Questions to support discussion</b></p> <ul style="list-style-type: none"> <li>• How do people stay dry in the rain?</li> <li>• What does 'waterproof' mean?</li> <li>• What does the material look like close up?</li> <li>• What happens when this material gets wet?</li> <li>• Would this be a good material for Incy's shelter? Why?</li> <li>• Which do you think would be the best material? Why?</li> <li>• Did the shelter work? Did Incy stay dry?</li> <li>• Is material X better than material Y at keeping Incy Wincy dry? Why?</li> </ul>		
<p><b>Assessment Indicators</b> <b>Not yet met:</b> Cannot yet sort waterproof/non-waterproof materials independently. Needs support to identify a suitable material for the design. <b>Meeting:</b> Able to independently choose suitable material(s) for the design and with adult support can design and make a simple waterproof shelter. <b>Possible ways of going further:</b> Able to compare materials for water proofing. With minimal adult support can design and make a simple waterproof shelter. With adult support is beginning to test and refine design.</p>		

