Building Science Concepts book ‘Ice Melting and Freezing’ Book 58

An interactive and academic resource I found online that can help children with their understanding of water and the changing in state is http://www.physics-chemistry-interactive-flash-animation.com/matter_interactive.htm.
On this resource children are able to play games and partake in activities that teach them about what happens to ice when the temperature is increased. Another activity on this resource teaches the children about what the particles are like in water when they are at different states. Children will be able to see that it is the same particle in water and ice they are just moving at different speeds therefore are different states. Children also can investigate what happens when water is mixed with different substances and then frozen.

I could use an animation to reinforce my ideas to the students. An animation I would consider using to go alongside this is: http://www.crickweb.co.uk/ks2science.html . I feel this would be useful as it visually shows ice melting (and freezing) again. Questions are asked throughout the animation to check the children’s understanding of the knowledge which has been taught. This animation will be especially beneficial for those students who are visual learners. The book provides very clear instructions, along with a list of all the required resources. This exercise could be done as a class activity, or in small groups, although I would personally use small groups as the students will then be more actively contributing.

The animation
http://www.brainpop.com/science/matterandchemistry/matterchangingstates/preview.weml offers children an aid for identifying the different elements and states when constructing ice and co-insides with the teaching within the Building Concepts book.

Animation – Retrieved 28/5/13
http://www.brainpop.com/science/matterandchemistry/matterchangingstates/preview.weml

An online animation I found that I feel relates to my topic well is:
http://www.brainpop.com/science/matterandchemistry/statesofmatter/
This animation explains all of the states of matter. Including solid, liquid and gas. This would help children understand the movement of the particles in both solids and liquids and how the particles movement changes when melting and freezing occurs. For example, a solid’s particles move a lot less as they have less energy compared to a liquid particle that moves a lot more due to them having a lot of energy.

Science: *States of Matter*. Retrieved from:
http://www.brainpop.com/science/matterandchemistry/statesofmatter/
(May 1st,
2013).

Salt on ice animation. From General Chemistry Online: http://antoine.frostburg.edu/chem/senese/101/solutions/faq/why-salt-melts-ice.shtml
Science Learning Hub. (2007-2013). The University of Waikato: http://www.sciencelearn.org.nz/Nature-of-Science/Reasons-for-teaching-the-nature-of- science