



making physics matter



Age
7-11
years

Scientific ideas over time

Timeline card sort game - light sources

Introduction

A simple game for KS2 children who are learning about light, this game provides the opportunity to explore natural and artificial light sources. In playing the game, children will develop a historical awareness of when different sources of light first existed. Children will also develop their mathematical skills in sequencing dates. The aim of the game is for the children to correctly sequence the cards chronologically and to get rid of all the cards in their hand.

Material per pair

- One set of 24 laminated cards for each group of children. The cards are available to download from <https://www.ogdentrust.com/resources>
- A timer of some kind – egg timer or stopwatch



Instructions

1. The cards are shuffled in a pile, ensuring that the date side is downwards and hidden. The cards feature a variety of light sources, some natural and some artificial. The cards are dealt so that each child has four cards which they place date side down on the table in front of them.
2. The remaining card pile is placed date side down in the middle of the table. The top card is turned and placed in front of the pile, revealing a light source and the date it was formed or the date it was first used or observed by humans. The timeline will form around this card. (Earliest to most recent, left to right).
3. Players take it in turns to place cards from their set of four in the timeline. Without revealing the date, they slide the card into the position they think it belongs.
4. The card is then turned over. If it has been placed in the correct position the player has managed to get rid of a card from their hand. If it is in the wrong position, then the card is returned to the bottom of the pile and the player takes a new card.
5. Play continues until a child manages to successfully place all of their cards in the timeline. Each go must be taken within an allocated time limit, we suggest one minute.

Taking it further

This resource can stimulate a wide range of cross-curricular learning opportunities that will support thematic learning in the classroom, here are a few suggestions to get you started:

- **Maths and science** – with the date side turned down, the cards could be used by children to help them sort and classify light sources. The children could think of their own ways to group the light sources as well as being directed to group them as natural and artificial. The children could then use a Venn diagram to record their groupings, perhaps they will place some light sources in the overlap where they could be both natural and artificial?
- **Art** – Light sources are a wonderful stimulus for art projects. Children could create a collage of light sources or paintings inspired by the Sun or neon lights in iconic locations. The Aurora Borealis is a fantastic inspiration for work using pastels that can form the background of a silhouette project inspired by Nordic landscapes.
- **Religious education** – Children could explore the importance of light in different faiths and religions. For example, learning about how candles are used to mark key events and celebrations such as advent and Christingle in Christianity, Hanukkah in Judaism or Diwali in Hinduism. Children could even design and make their own clay Diwali lamps to take home.

