Activity sheet

Competition for fresh water

What you will need:
• Water
• 4 large buckets
• 3 cups
• 1 bigger cup (optional)

Setup:
1. Two students are located at the water source (i.e. a large bucket containing water). These students are responsible for replenishing the bucket. Access to water nearby will be required (i.e. a tap).
2. Remaining students will be divided up into three equal teams, named: homes, agriculture, and industry/mining.
3. All teams to be lined up in a single file and spaced the same distance away from the water source.
4. Each team will need one large bucket and one cup.
5. The aim of this exercise is to see which team can completely fill their large bucket first.
6. The first student (see diagram below) runs with their empty cup down to the water source B (i.e. the large bucket containing water), fills their cup up with water from the source, runs back to the team C and passes it to the student at the end of the line. Each student in the line then passes the cup (filled with water) along the line ensuring they don’t spill any water until it reaches the student nearest to the team’s bucket.
7. The student (who is at the front of the line nearest the bucket) then pours the water from the cup into the team’s bucket. They then run down to the water source with the empty cup and follow the same sequence that the previous student did.
8. Each team continues until they have completely filled their bucket.

Once you have completed the competition, try changing the rules:
• Slow or stop the rate at which the water source is refilled (demonstrating that fresh water is a limited resource).
• Give one group a bigger cup (demonstrating the greater use of water by a growing population, the agriculture sector or the industry/mining sector).