

**Guidelines for teachers** 

# Lesson 12. What will our planet Earth be like in 100 years?

In this lesson pupils will be introduced to the work of the future profession – climatologist – and find out what we can do all together to conserve our planet Earth. The activities included in the lesson will help pupils strengthen their knowledge about the effects of climate change on Earth, as well as inspire them to take practical actions that save the environment. At the end of the lesson pupils will have the opportunity to receive the certificate of the young climatologist.

#### Lesson duration:

depending on the duration of discussions, eco workshop and additional activities, the lesson takes approximately 60-100 minutes.

#### Before the lesson:

get to know the methodological recommendations for the lesson and prepare materials to successfully plan and conduct the lesson for your pupils.

#### Terms:

climatologist – a scientist who studies climate, its changes, why the temperature rises or drops, why the number of storms has increased; climatologists make scientifically based predictions about future climate change and how it could be prevented,

certificate – a document certifying important knowledge and skills.

#### Hand-outs (for printing):

The certificate of the young climatologist;

(aat)

#### The lesson

At the beginning of the lesson introduce pupils to the behavioural rules, emphasizing that they should listen carefully because the board does not repeat information several times. In the lesson you will need to cooperate, express your opinion and be able to catch what others say. For younger pupils or pupils who find it challenging to stay focused on work for longer periods of time, dynamic breaks can be included between tasks.

Tablets can also be used for the interactive tasks.

#### 1. Climate scientists.

Pupils listen to information about the future profession – climatologist.

#### Additional activity.

You can ask pupils: "Would you like to become a climate scientist in the future and help our planet?"

#### 3. Become the young climatologist!

Pupils listen to the information that at the end of the lesson they will have the opportunity to get the certificate of the young climatologist. Praise pupils for the work in the previous lesson and engagement that will help to receive a formal certification of knowledge, skills and attitudes today.

#### 5. A habitable planet.

Pupils discuss how people will live in 100 years. Pupils can first think individually, recall what they have learned in previous lesson, then discuss in pairs or small groups. When the discussion is over, pupils choose one of the three options where they would like to live in the future. For everyone to participate, pupils can vote on each of the given options (there is no correct answer here). Invite pupils to express their opinion about each of the options. At the end of the activity pupils listen to information about why the Earth is our only home and why it is important to take care of it..

#### 2. Work of a climatologist.

Strengthening the knowledge of what they heard in the previous activity, pupils touch the pictures showing the work of a climatologist. In order for everyone to be able to participate, pupils can first vote on each of the pictures, whether it shows the work of a climatologist or a representative of some other profession. Invite pupils to name what is also seen in the rest of the pictures.

#### 4. Climate predictions.

Pupils listen to information about how climate change has always happened, but now, due to human activity, it is happening especially fast.

#### 6. Repetition: the key to mastery.

Pupils recall the topics of the previous lessons by listening to brief information about them.

#### Additional activity.

You can encourage pupils to share what they remember the most from each lesson (what terms, activities, insights).

#### 7. Test – everything you have learned so far!

With the help of the interactive test pupils have the opportunity to check the knowledge they have acquired in this lesson and all the previous ones. The test can be taken by everyone together or individually – using tablets. You can also divide pupils into small groups and invite them to discuss each question and agree on the correct answer. The test includes 25 interactive tasks, some of them have multiple questions, and therefore this task is time-consuming. The teacher, taking the age of the pupils and their ability to maintain attention in account, can divide this task into several parts, scheduling dynamic breaks in between. To motivate pupils, for each correctly completed task one green tree is received to make this world greener.

## 9. Preparation of the certificate of the young climatologist.

Pupils listen to congratulations for a job well done. The teacher must prepare and print the certificate of the young climatologist beforehand. During this activity it can be handed out to pupils or put in a prominent place in the classroom to praise pupils for their accomplished work.

#### 8. Eco workshop.

Together with the teacher pupils choose one of the proposed practical works for climate conservation, such as planting trees, a waste sorting campaign in their class or school, a parents' meeting about climate change organized by pupils, a poster exhibition or making a video about climate change. With the teacher's support pupils participate in the planning of practical work, dividing responsibilities, planning the final result, the people involved. The aim of this activity is to create pupils' confidence that they too can be the reason of change and inspire others for good, educational and environmentally friendly work.

#### 10. Farewell.

Pupils listen to the closing information and say goodbye to the "Digi4Clima" cloud.

#### At the end of the lesson ask pupils:

What did you like the most? What new did you learn? What will you tell your parents? What else would you like to know?

### Images from the lesson process

Pupils are taking an interactive quiz to check their knowledge on the previous lessons.

