


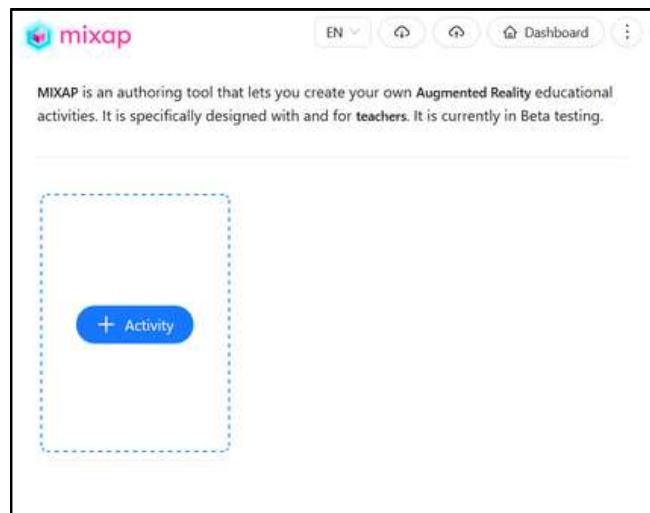
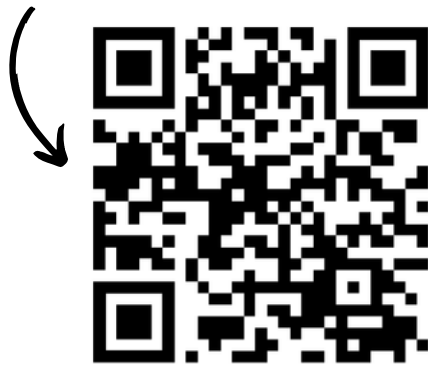


MIXAP TUTORIAL

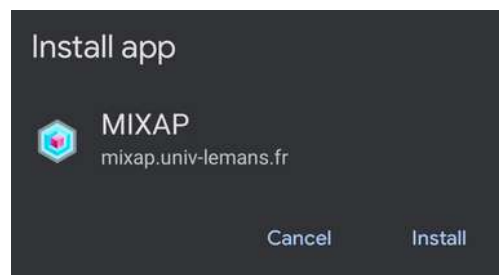
This tutorial is designed to help you understand how MIXAP works and discover its features. Feel free to improvise once you feel comfortable.

On a computer, smartphone or tablet, open your Chrome browser  and enter the following address in the navigation bar : <https://mixap.univ-lemans.fr/>

or scan this **QR CODE**



If a pop-up asks you to download the application, please accept. This will add a launch icon directly on your smartphone or tablet that will provide you with a faster access to the application.



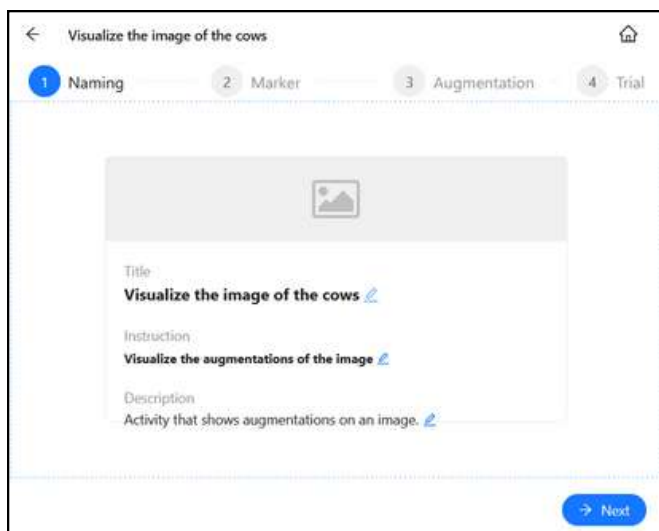
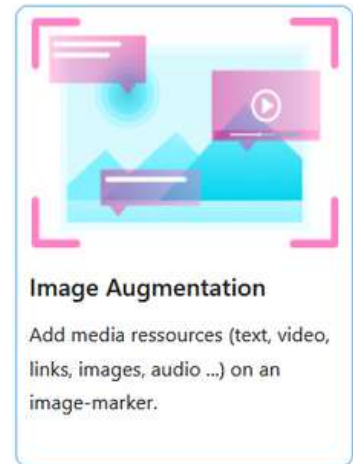
Activity 1 - Augment a book

1 - Click on the button 

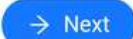
2 - Select “Image Augmentation”

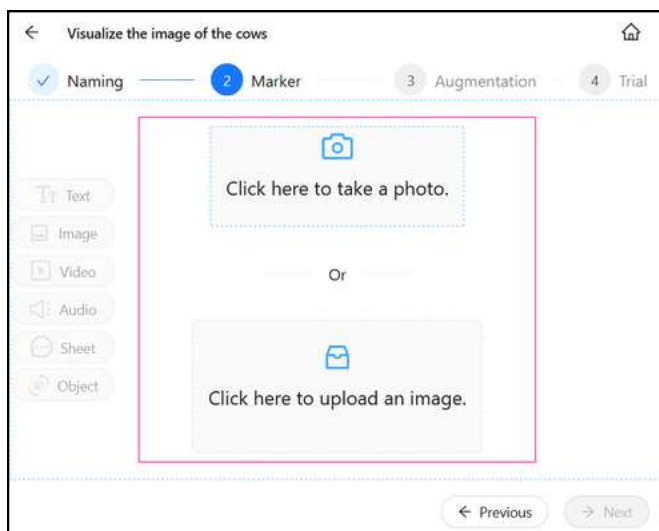
This type of activity lets you add multimodal augmentations, such as text, video, audio recordings, 3D objects or information sheets to an image (book, map, poster, worksheet, etc.).

To test the offered functionalities, in this tutorial, we suggest you augment a page of a book.



Step 1. **Maming**



- Give your activity a meaningful title to find it later.
- Change the instructions that will be provided to the student (optional).
- Change the description that can be useful if you want to share your activity with other teachers (optional).
- Click on 




Step 2. **Marker**

- Choose the camera to take a photo of the image you wish to enhance. This image will be used as an **marker** to display the augmentations (in Augmented Reality).



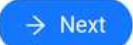
Read the page “[How to choose and take a photo of an image-marker for Augmented Reality](#)” at the end of this document.

- If necessary, crop the photo by clicking on  and keep only the part of the photo that interests you. Save by clicking on the floppy disk icon 

- Proceed to the next step by clicking on 

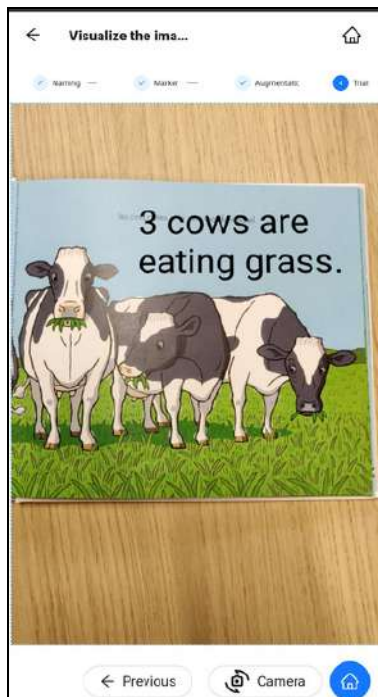



Step 3. **Augmentation**

- Add a text augmentation by clicking on 
- Add an image augmentation by clicking on  then take a photo or select an image file (optional).
- Proceed to the next step by clicking on 

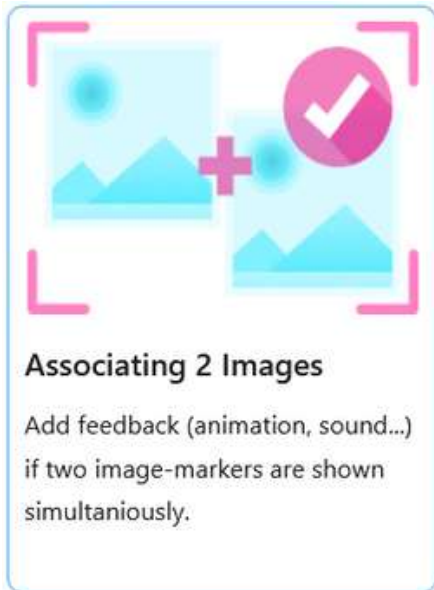
Step 4. **Trial**


- Place the image-marker in the camera field to see the augmentations. You can go back to the previous steps, by clicking on the icons at the top of the page, if something needs to be improved.



- Click on  to come back to the home page.

Activity 2 - Associating objects

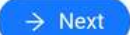


1 - Click on the button 

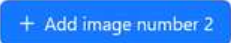

2 - Select "Associating 2 images"

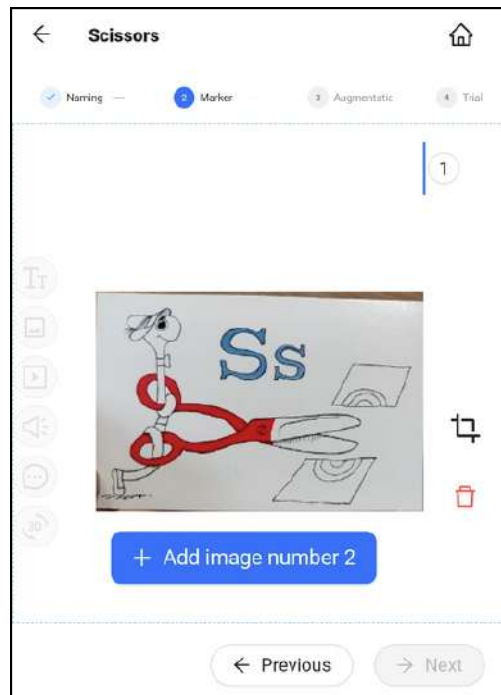
This type of activity reveals information when two images are placed side by side. With it, you can create automatic corrections for your association activities (associating an image with a word, associating of a word in English with a word in another language...). In this tutorial, we will show you how to associate a card with a magnet letter that can be found in preschool.

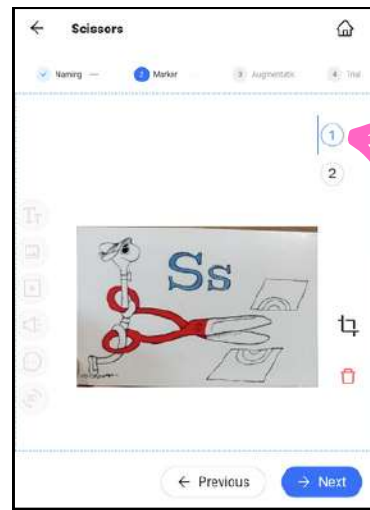
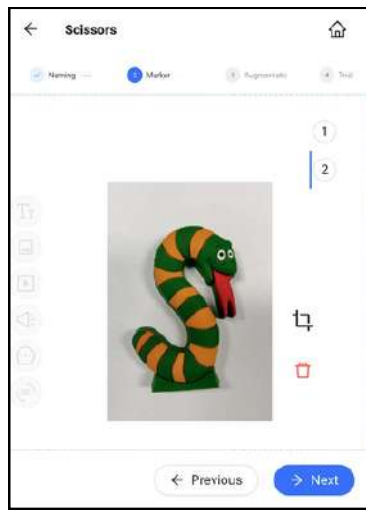
Step 1. **Naming**

- Give your activity a meaningful title so you can find it later.
- Change the instruction with directions to associate the card with the right letter (e.g. "Find the first letter of the object drawn on the card").
- Change the description (optional).
- Click on 

Step 2. **Marker**


- Choose the camera to take a photo of the card.
- Click on  to take the photo of the letter (or another card).
- Proceed to the next step by clicking on 

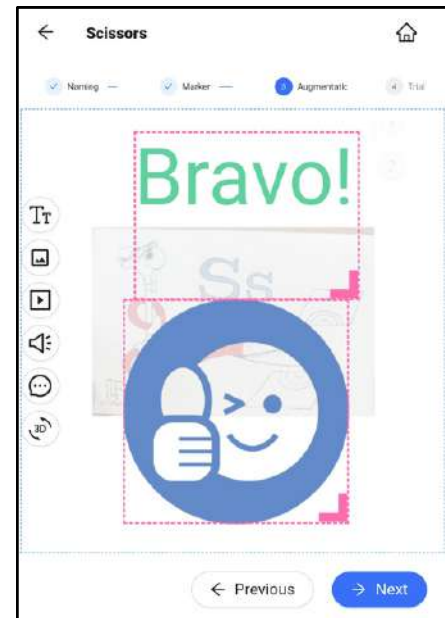





You can go back to the first image-marker by clicking on 1.

Step 3. **Augmentation**

- Add an augmentation that will appear on the card if the student has placed the card and the correct letter in the camera's field of view.
- Change the default text “Well done! The two images are associated”.
- Add a congratuation image with a transparent backgroup by clicking on  (optional).



Step 4. **Trial**

- Place the card and the letter in the camera field to test the activity.
- Click on  to go back to the home page.

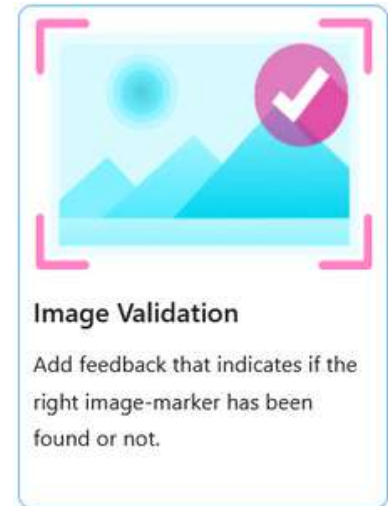
Activity 3 - Find a poster

1 - Click on the button



2 - Select "Image Validation"

This type of activity validates the fact that a student has found the image that answers a question (e.g., find the earth on the poster, find the card representing "un gato", find the button that turns the machine on...). It is also possible to display information, on the image, once it has been found. In this tutorial, we suggest you create a little game to find the right poster among those hanging on the walls.



Step 1. **Naming**

- Give your activity a meaningful title so you can find it later.
- Change the instructions with a prompt to find one of the posters in the room (e.g. "Find the solar system poster" or "Find Pegasus").

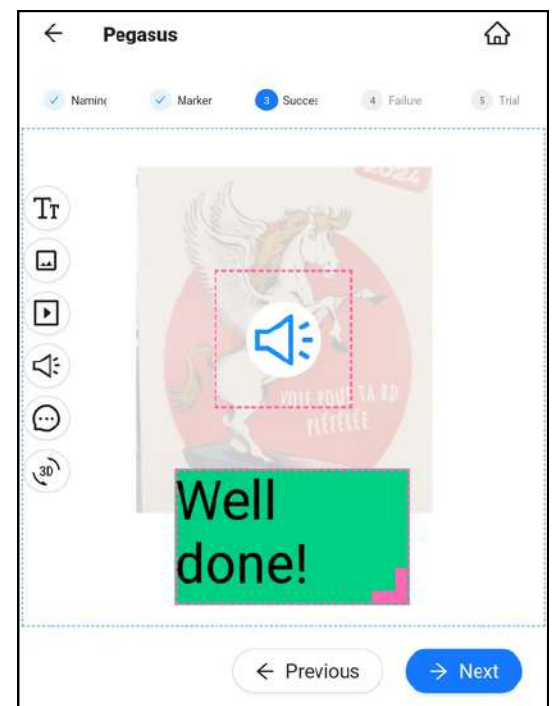
- Click on Next





Step 2. **Marker**

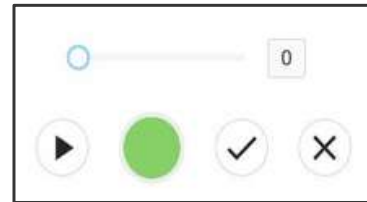
- Choose the camera to take a photo of the poster you want the students to find.
- If necessary, crop the photo.
- Click on Next

Step 3. **Success**

- Add an augmentation that will appear on the poster if the students find it.
- Change the text "Well done!"
- Add an audio recording by clicking on




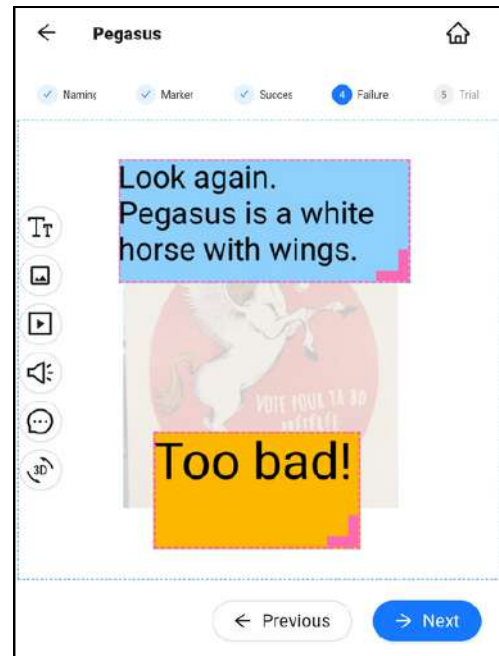
- Record your voice by clicking on the green button 
- Stop recording by clicking on 
- Validate by clicking on the 
- Click on 



Step 4. **Failure**

Add a text, image, audio or video augmentation that will appear if the students do not find the marker after 15 seconds.


- Change the text "Too bad!" and add other augmentations. For example, you can add a hint to help students find the right poster.
- Click on 




Step 5. **Trial**

- Place the poster in camera field to test the activity.




- Click on  to go back to the home page

Activity 4 - Combine activities

1 - Click on the button  Activity

2 - Select “Activity Group” or “Activity Path”

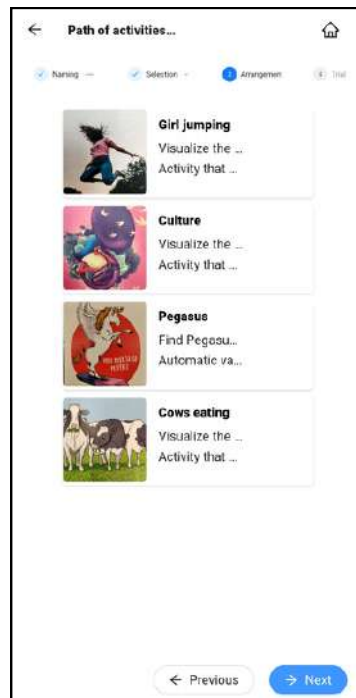
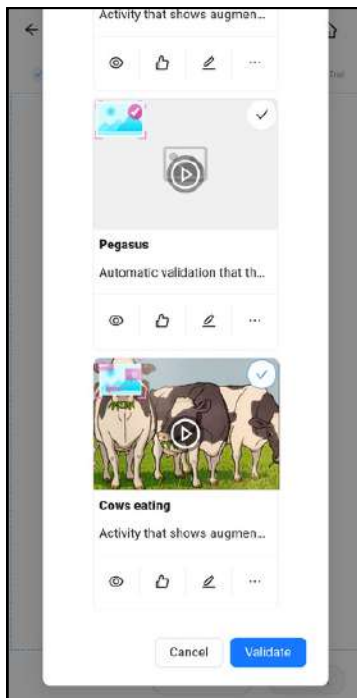
These types of activities make it possible to combine a coherent set of activities for an exercise session. For this tutorial, simply group the activities you have just created.




Activity Group
The learners choose the order in which they want to complete the





Activity Path
The learners complete the activities in a specific order.



Step 1. **Naming**


- Give your activity group a meaningful title so you can find it later.
- Change the instruction to a general instruction for the activities group (e.g., "Complete all the activities").
- Change the description (optional).
- Click on 


Step 2. **Selection**

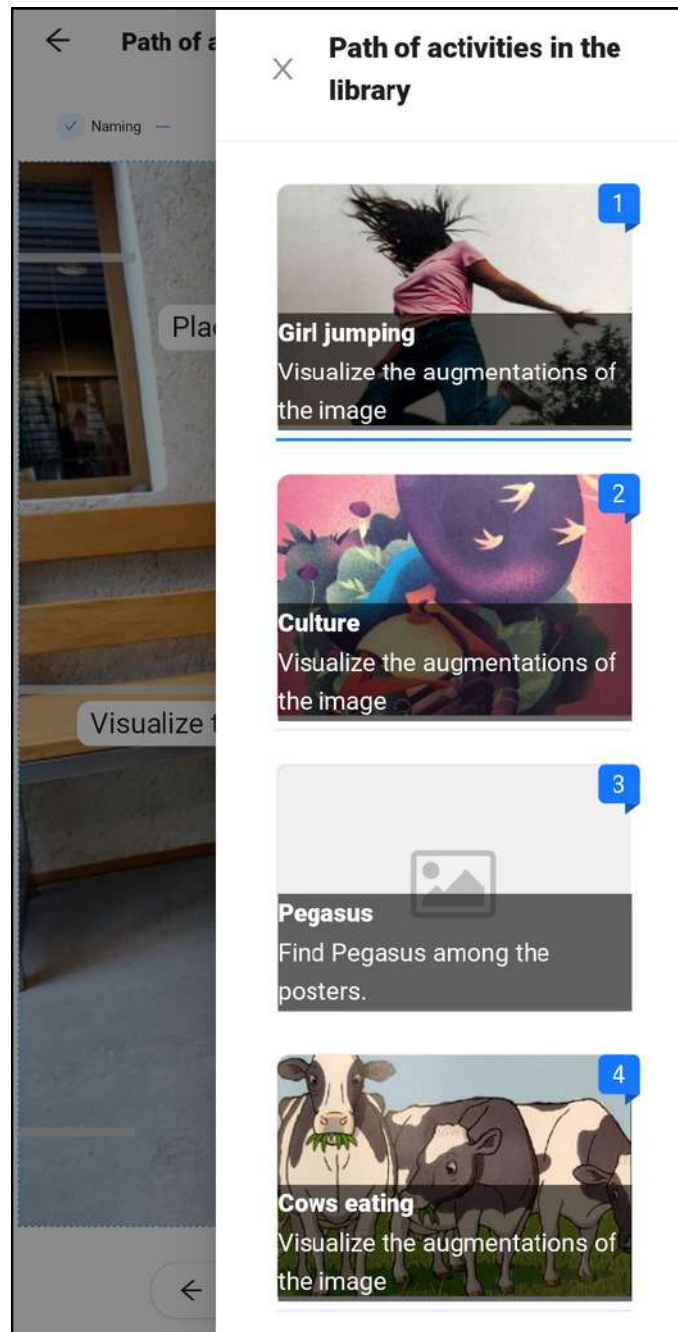
- Click on  Activity and select the activities you want to add to the group.
- Scroll to the bottom of the window and click on 
- If you have chosen an Activity Path, place the activities in the right order.


Step 3. *Trial*

- Test the activity group.

- You can change activities by clicking on the button  and selecting another one.

if you have created an Activity Path, you can go to the next activity by clicking on the forward arrow 



- Click on  to go back to the home page



Activity 5 - Sharing activities

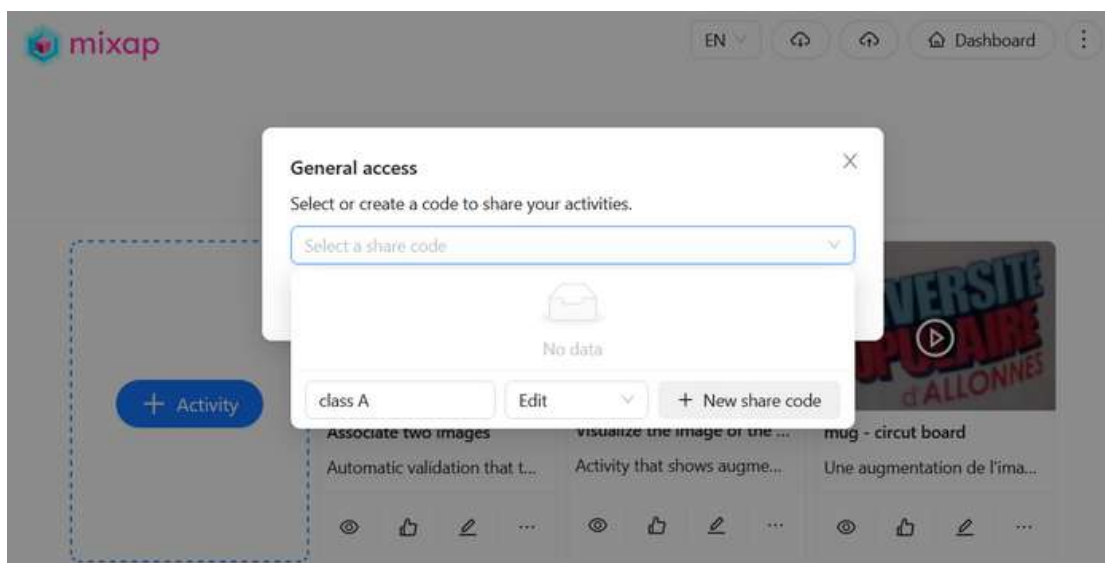
Prerequisite: Internet

MIXAP works without Internet. However, a connection is required the first time you use the application and when you want to synchronize your activities with other devices (tablet, computer, smartphone).

How do I synchronize (share) activities?

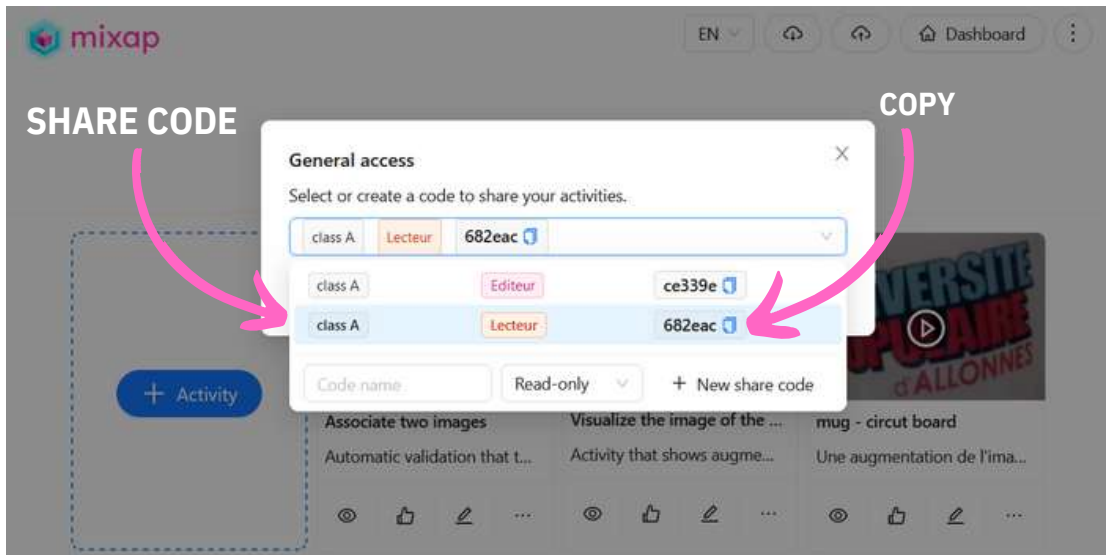
Step 1 : **Synchronization**

- Click on the synchronization symbol 
- Create a share code by giving it a name (e.g., class A)
- Choose a sharing mode :
 - In **read-only mode**, users cannot modify activities. You can therefore use this mode when sharing activities with your students.
 - In **editor mode**, users can edit activities (change image-markers and augmentations). This mode is perfect if you want to share your activities with other teachers. You can also use it if you want to continue editing your activities on another device.
- Click on 




Step 2 : **Select the share code you wish to use**

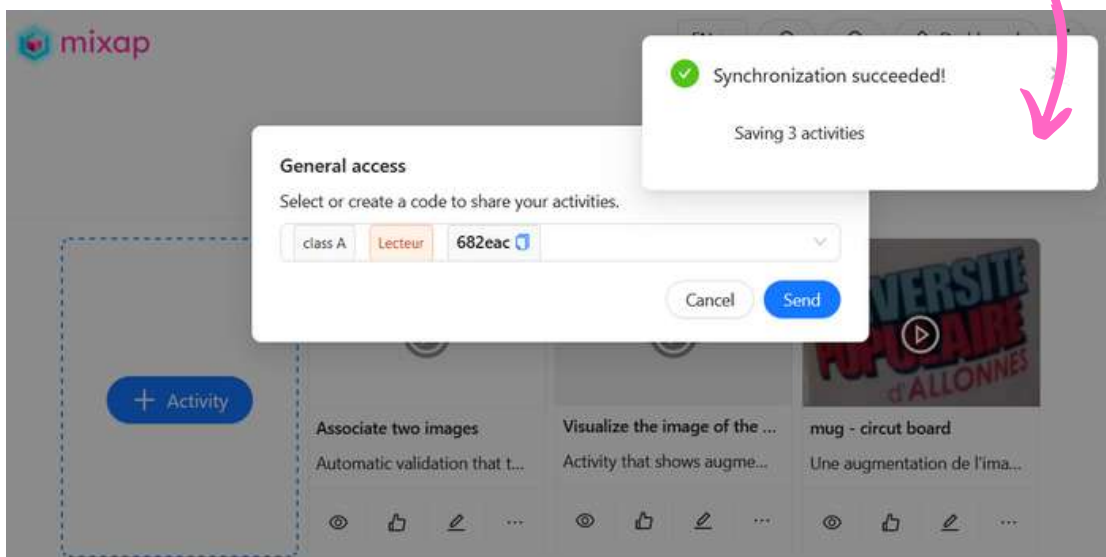
- Click on the line of the share code you wish to use.
- Copy the sharing code to send it to your students, colleagues or yourself.



Step 3 : **Send activities to server**



- Click on the button 

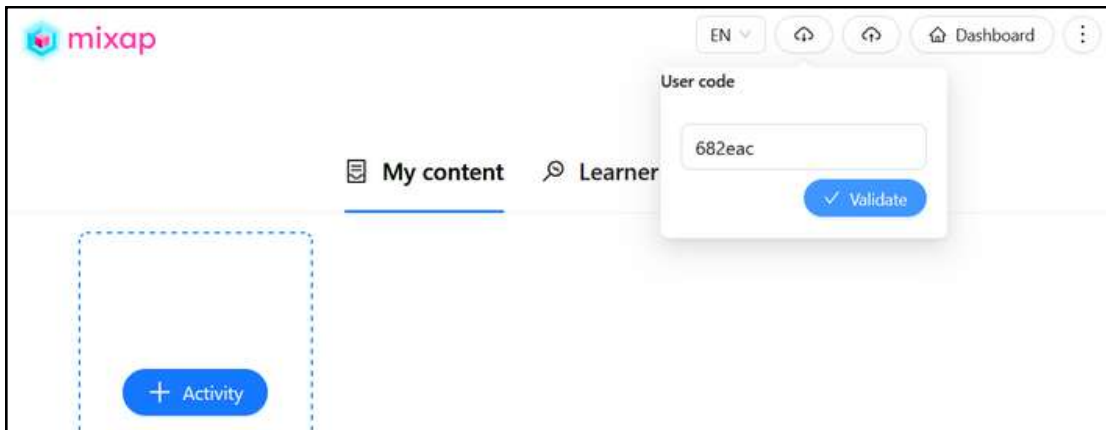
A notification confirms that the activities have been sent to the server



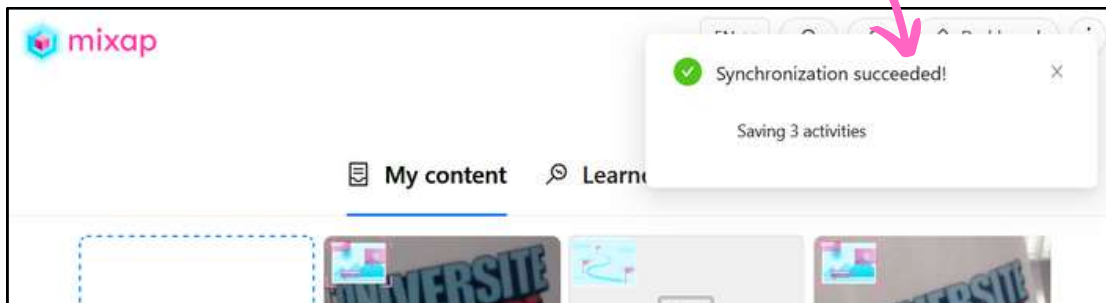
How do I retrieve synchronized activities?

Step 1 : **Enter the share code**

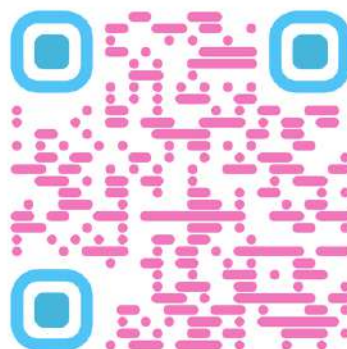
- Click on the button 
- Enter the share code.
- Click on 



A notification confirms the activities were fetched from the server and they appear underneath



Go to the MIXAP website to learn more about the project



How to choose and take a photo of an **image-marker** for Augmented Reality

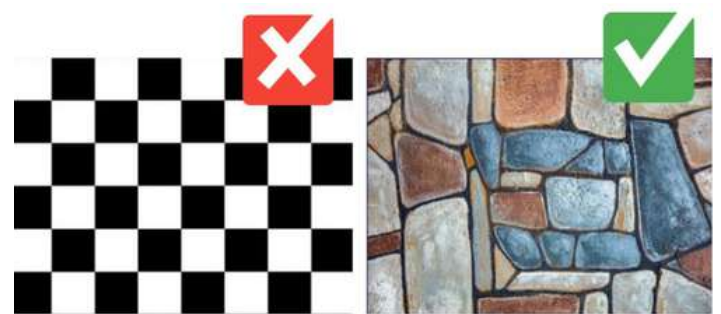
Augmented Reality technology is based on image recognition algorithms that do not work like our eyes and brain. Here are a few tips for choosing and taking of photo of the image that will serve as a marker for you Augmented Reality activities.

The image should have **details** and **contrasts**



The tablet analyzes the grayscale image and identifies points of variations. The more points there are, the easier it is to recognize the marker. In addition, the image must not change, so you cannot use living objects (plants, animals) or objects that change over time.

The image should have a **variety of shapes**



If the image has very repetitive and similar shapes, the tablet will have difficulties recognizing it. It is therefore advisable to choose images with a variety of shapes.

The image should be **in focus**, **flat** and **well-lit**



It is essential to take a clear photo that is in-focus with optimum lighting. Avoid reflections since these will be considered as part of the marker. You can scan the image for best results.

The image should be **framed** as **closely as possible**



Take the photo so that you cannot see the table or fingers or they will become part of the marker. Frame the image or crop it as closely as possible.