

### Introduction

The connection between the Layouts, Widgets, and Activities is important within the Android scope. Having a view that has an event that sends information to other activity is one of the most used characteristics of Android. Every day, either on Instagram, WhatsApp, Telegram, etc, you are doing this simple but powerful task. Thus, the purpose of this Challenge is for you to have views in one activity that change a view in other activity.

All the resources that you need are available at Inforestudante but feel free to use the resources/images. For any questions or doubts, you can send an e-mail to [joaonf@dei.uc.pt](mailto:joaonf@dei.uc.pt).

### Milestone 1

This first milestone is to be done in **groups**. The objectives are:

- Have an application that contains 2 activities:
  - **Activity 1**
    - Has a spinner that allows you to select an animal.
    - Can display the image of the selected animal.
    - Has three texts showing who is the owner, the name, and the age of the animal.
    - Has button to change to Activity 2 but Activity 1 does not send any information to Activity 2 (except the selected position of the spinner which you need to know which animal was selected).
  - **Activity 2**
    - Has two views that allow to enter a text and one view that allows to enter the age (hint: it is not a string value) of the animal.
    - Has a button to return to Activity 1.
- **Every change made in Activity 2 must be passed to Activity 1's views** (e.g., if you change the name of the animal in Activity 2, this must be reflected when you press the button to return to the Activity 1). However, you do not need to have all three values (owner, name, and age) fulfilled in Activity 2 (you can have only the name, for example).

### Milestone 2

This second milestone is to be done **individually** and has the same objectives of Challenge 1.1. However, instead of Activities, you must do the same application with **Dynamic Fragments** and **ViewModel**. Fragments must be instantiated in the Activity.

### Deadlines and Evaluation

#### Milestone 1 (0.6pts)

- The deadline is on October 15<sup>th</sup>.
- There will be an evaluation of this challenge during the PL classes, on October 19<sup>th</sup>.

#### Milestone 2 (1.4pt)

- The deadline is on October 29<sup>th</sup>.
- There will not be any evaluation on the classes. The evaluation will be based on the code that you submit to Inforestudante.