

All apps were made in MIT App Inventor 2.0 (beta)

Code used for each app:

Calculator:

The screenshot displays the MIT App Inventor 2.0 (beta) interface for a calculator application. The browser address bar shows the URL ai2.appinventor.mit.edu/?locale=en#6203010179661824. The application title is "Calculator".

The interface is divided into several sections:

- Blocks:** A sidebar on the left lists built-in blocks categorized by type: Control, Logic, Math, Text, Lists, Colors, Variables, and Procedures. Under the "Screen1" category, the following blocks are visible: cmdminus, cmdplus, cmdmult, cmddiv, txt2, txtval, cmdeq, and txt1. There are "Rename" and "Delete" buttons at the bottom of this list.
- Viewer:** The main workspace shows four event-driven code blocks for button clicks:
 - cmdplus .Click:** A "do" block containing "set txtval . Text to" followed by a math block $\text{txt1} \text{ . Text } + \text{txt2} \text{ . Text}$.
 - cmdminus .Click:** A "do" block containing "set txtval . Text to" followed by a math block $\text{txt1} \text{ . Text } - \text{txt2} \text{ . Text}$.
 - cmdmult .Click:** A "do" block containing "set txtval . Text to" followed by a math block $\text{txt1} \text{ . Text } \times \text{txt2} \text{ . Text}$.
 - cmddiv .Click:** A "do" block containing an "if" block. The condition is "not" followed by $\text{txt2} \text{ . Text } = 0$. The "then" block contains "set txtval . Text to" followed by a math block $\text{txt1} \text{ . Text } / \text{txt2} \text{ . Text}$.
- Media:** A section at the bottom left shows "unnamed.png" with an "Upload File ..." button.
- Warnings:** At the bottom center, there are two warning icons (yellow and red triangles) with a "0" next to each, and a "Show Warnings" button.
- Trash:** A trash can icon is located at the bottom right.

Dice:

The screenshot shows the MIT App Inventor 2 Beta web interface. The browser address bar displays `ai2.appinventor.mit.edu/?locale=en#6729404278112256`. The interface is divided into several sections:

- Top Bar:** MIT App Inventor 2 Beta, navigation links (Projects, Connect, Build, Help, My Projects, Gallery, Guide, Report an Issue), language (English), and user profile (pyrowx@gmail.com).
- Project Bar:** Project name "Zaria", screen management (Screen1, Add Screen..., Remove Screen), and view toggles (Designer, Blocks).
- Blocks Panel:** A sidebar with categories: Built-in (Control, Logic, Math, Text, Lists, Colors, Variables, Procedures), Screen1, ThrowButton, DiceArea (Dice1image, Dice2image), VerticalArrangement1 (Label1, Label2), ThrowSound, and AccelerometerSensor1. Buttons for "Rename" and "Delete" are visible.
- Media Panel:** Lists image files (1.png to 6.png), sound files (DingSoun...Sins).mp3, RollDiceSound.mp3, and e.jpg, with an "Upload File..." button.
- Viewer Panel:** Displays two event-driven code blocks:
 - when ThrowButton .Click:** A "do" block containing:
 - set Dice1image . Picture to join random integer from 1 to 6 and ".png"
 - set Dice2image . Picture to join random integer from 1 to 6 and ".png"
 - call ThrowSound .Play
 - if Dice1image . Picture = Dice2image . Picture then:
 - set Label2 . Text to Label2 . Text + 1
 - call yay .Play
 - when AccelerometerSensor1 .Shaking:** A "do" block containing:
 - set Dice1image . Picture to join random integer from 1 to 6 and ".png"
 - set Dice2image . Picture to join random integer from 1 to 6 and ".png"
 - call ThrowSound .Play
 - if Dice1image . Picture = Dice2image . Picture then:
 - set Label2 . Text to Label2 . Text + 1
 - call yay .Play
- Bottom Panel:** Warning indicators (0 yellow, 0 red) and a "Show Warnings" button.

Arkas:

The screenshot displays the MIT App Inventor 2 Beta web interface. The browser address bar shows the URL `ai2.appinventor.mit.edu/?locale=en#4922893885243392`. The application is titled "Arkas" and is currently in the "Designer" view. The interface is divided into several sections:

- Blocks:** A sidebar on the left lists various block categories: Built-in (Control, Logic, Math, Text, Lists, Colors, Variables, Procedures), Screen1 (HorizontalArrangement1, Button1, Sound1), and Any component.
- Viewer:** The main workspace shows a Scratch-style block-based program. The code is as follows:

```
initialize global m1 to 0

when Button1 . Click
do
  set global m1 to (get global m1 + 1)
  set Button1 . Image to (join "arkas" (join (get global m1) ".gif"))
  if (get global m1 = 5)
  then
    set global m1 to 0
  call Sound1 . Play
```
- Media:** A sidebar at the bottom left lists media files: PageFlip...ffect.mp3, arkas1.gif, arkas2.gif, arkas3.gif, arkas4.gif, arkas5.gif, and ews.jpg. There is an "Upload File ..." button.
- Warnings:** At the bottom center, there are two warning icons (yellow and red triangles) with a "Show Warnings" button.

Happy Christmas:

The screenshot displays the MIT App Inventor 2 Beta web interface. The browser address bar shows `ai2.appinventor.mit.edu/?locale=en#5648761435717632`. The page title is "OH_CHRISTMAS_TREE". The interface is divided into several sections:

- Blocks:** A sidebar on the left lists various block categories: Built-in (Control, Logic, Math, Text, Lists, Colors, Variables, Procedures), Screen1, TableArrangement1, Canvas1, and ImageSprite1. Under Canvas1, there are 11 ball objects (Ball8 to Ball11). Under ImageSprite1, there are 4 ball objects (Ball7 to Ball11). Buttons for "Rename" and "Delete" are visible at the bottom of the list.
- Media:** A section below the blocks sidebar shows a list of media files: "JingleBe...ntal).mp3", "das.jpg", and "fuuuuuuuuuuuuu.jpeg", with an "Upload File ..." button.
- Viewer:** The main workspace shows the visual representation of the app. It features a green header bar with "OH_CHRISTMAS_TREE", "Screen1", "Add Screen ...", "Remove Screen", "Designer", and "Blocks" buttons. The app's visual elements include a blue backpack icon in the top right and a green trash can icon in the bottom right. The logic bricks are as follows:
 - when Screen1.Initialize** do: call Player1.Start
 - when Clock1.Timer** do:
 - set Ball1.Visible to true
 - set Ball2.Visible to false
 - set Ball3.Visible to true
 - set Ball4.Visible to false
 - set Ball5.Visible to true
 - set Ball6.Visible to false
 - set Ball7.Visible to true
 - set Ball8.Visible to false
 - set Ball9.Visible to true
 - set Ball10.Visible to false
 - set Ball11.Visible to true
 - when Clock2.Timer** do:
 - set Ball1.Visible to false
 - set Ball2.Visible to true
 - set Ball3.Visible to false
 - set Ball4.Visible to true
 - set Ball5.Visible to false
 - set Ball6.Visible to true
 - set Ball7.Visible to false
 - set Ball8.Visible to true
 - set Ball9.Visible to false
 - set Ball10.Visible to true
 - set Ball11.Visible to false
- Warnings:** At the bottom left, there are two warning icons (yellow triangle and red triangle) with a "0" next to each, and a "Show Warnings" button.

Catch_me:

