

Coding Summer School (9th Edition)



Instructed Flight demo by a future female pilot



Engaging class on drone components

OVERVIEW	
Flying Labs	Kenya
Location	Nairobi, Kenya
Date	21st-22nd and 27th-28th, November 2020
Length (number of days)	4 Days
Sector program (optional)	YouthRobotics
Format	In-Person
Co-organizer if applicable	Think Young Africa
SDGs	GOAL 4: Quality Education

SCOPE & OUTCOMES	
Type of training	<ol style="list-style-type: none"> 1. Introduction training to drones 2. Youth/STEM training

Goal of the training	<ol style="list-style-type: none"> 1. Create drone awareness 2. Train and empower youth and the workforce of the future 3. Introduce youth to STEM, Robotics and Coding
Expected outcome for participants	<p>Participants expected to:</p> <ol style="list-style-type: none"> 1. Understand how drones work 2. What the drones can do in various sectors 3. How drones are made 4. Types of drones and robots
Confirmed outcome after training	<ol style="list-style-type: none"> 1. Participants gained basic coding skills and basic robotics knowledge, they also learnt about how drones function and how to use them in various sectors. 2. They plan to continue taking these lessons through our weekend programs in 2021. 3. They learnt about STEM careers in Unmanned Systems
Eventual next steps	<p>This is an annual event, it will happen again in 2021 at the same time. In the meantime we are looking at starting weekend programs for kids so that they can continue building skills.</p>

PARTICIPANTS	
Profiles and number of participants	<ol style="list-style-type: none"> 1. Staff from Government (ministries, government service, etc.) 1 2. Professionals (individual consultants, researchers, experts, teachers, etc.) 4 3. Local community members. 4 4. University students. 2 5. School children. 60
Name of participants' organizations	<p>Ministry of ICT and Innovation, Jomo Kenyatta University Of Agriculture And Technology.</p>
Gender ratio	<p>40% male : 60% female</p>
Who paid for the training?	<p>The training was supported by Think Young and her partners.</p>

CONTENT	
Training components	<p>Coding for kids</p> <p>Introduction to robotics (Focus on drones)</p> <p>Basic drone flying skills</p>
Training resources used	<ul style="list-style-type: none"> ● Slides, drones(DJI Mavic 2 Pro,DJI Mavic pro) and computers. ● Resource used: https://docs.google.com/presentation/d/1a8ySabfIPdjXHtCyywOCzQdEx5fKcA87g39kfIP1Q8/edit?usp=sharing
Approaches and methods used	<ul style="list-style-type: none"> ● We engaged with the kids in discussions through asking questions on their experiences and interaction with robots and drones. We also let the kids describe robots, drones and their applications before we trained them on the specific topics. Finally, we gave each individual an opportunity to speak out their aspirations. ● Participants performed simple flight maneuvers to put their theoretical knowledge into practice.