

## RECEIVE FILES AND PRINT THE SMART WAY

### What does this mean?

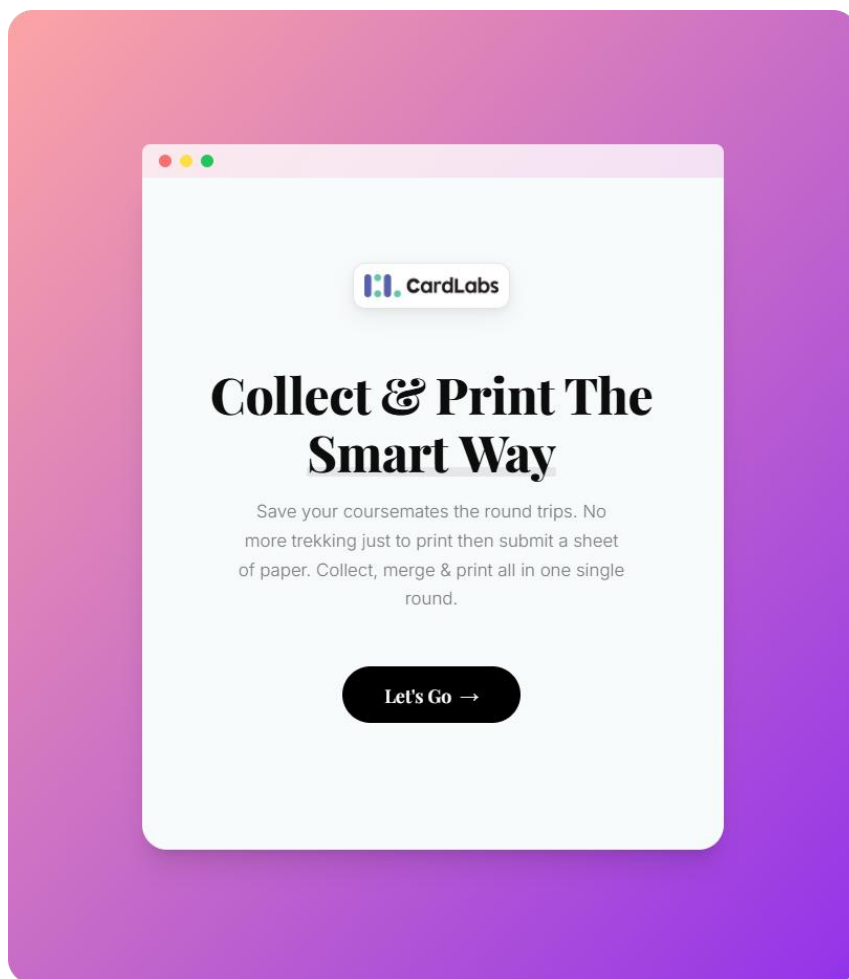
cardlabs is a simple cloud-native tool that helps students collect, organize, and print exam cards efficiently – without the confusion, delays or back-and-forth of manual coordination.

### How It Works

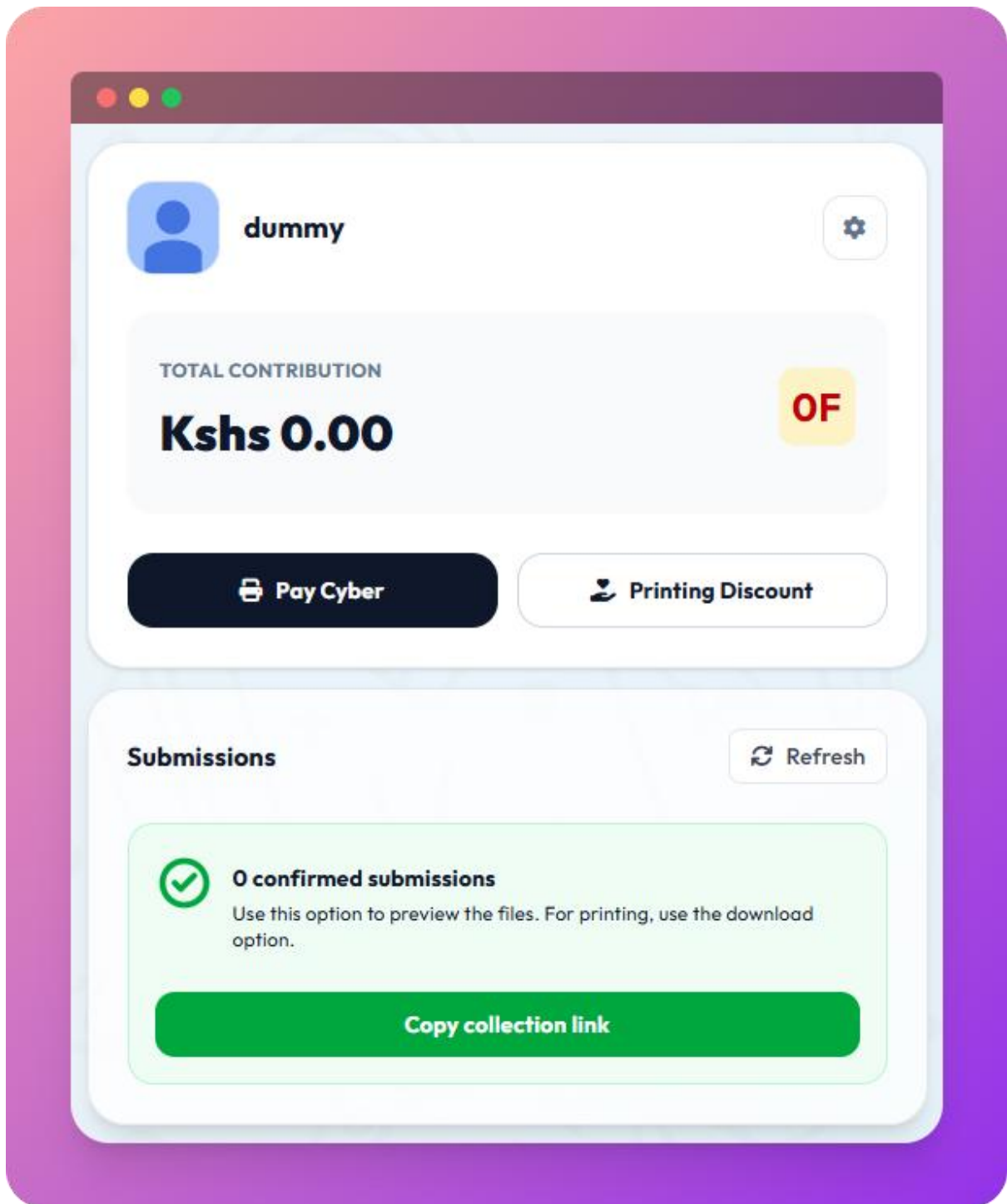
A group (“class”) appoints one trusted person (“class representative”) who is tasked to receive and print electronic documents (“PDF”) at discounted printing rates in the most efficient way possible.

### Steps

The (“class representative” known as Coordinator) visits <https://cardlabs.cloud>. Only trusted coordinators will be allowed to operate.



Sign up & Log in. The process has been designed to be extremely easy to go through. Once you have been logged in, you will be welcomed by the screen below:



### **Step One: Link Sharing over WhatsApp Group**

Copy the “collection link”. This link contains text and a personalized URL pointing to your upload page. Click the copy button. The link looks like this:

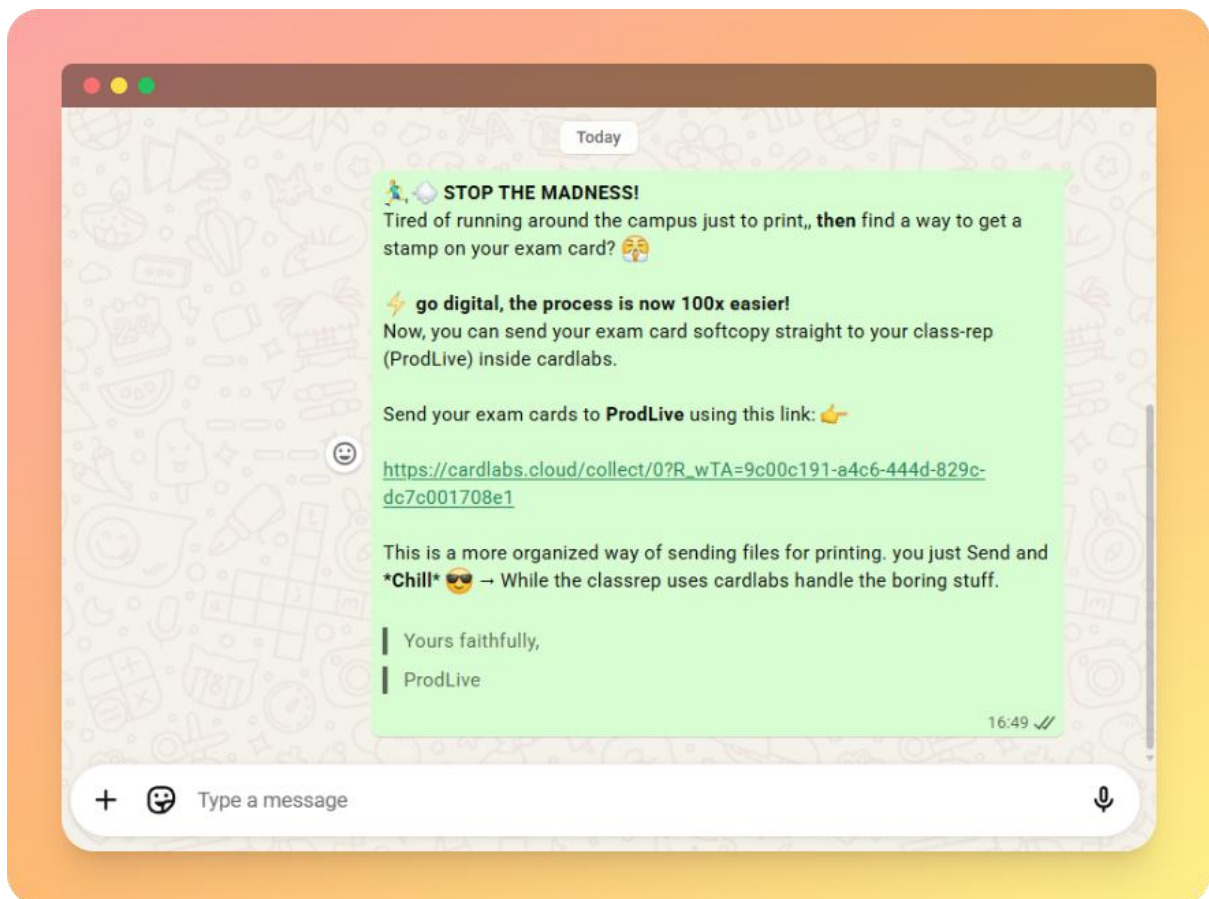


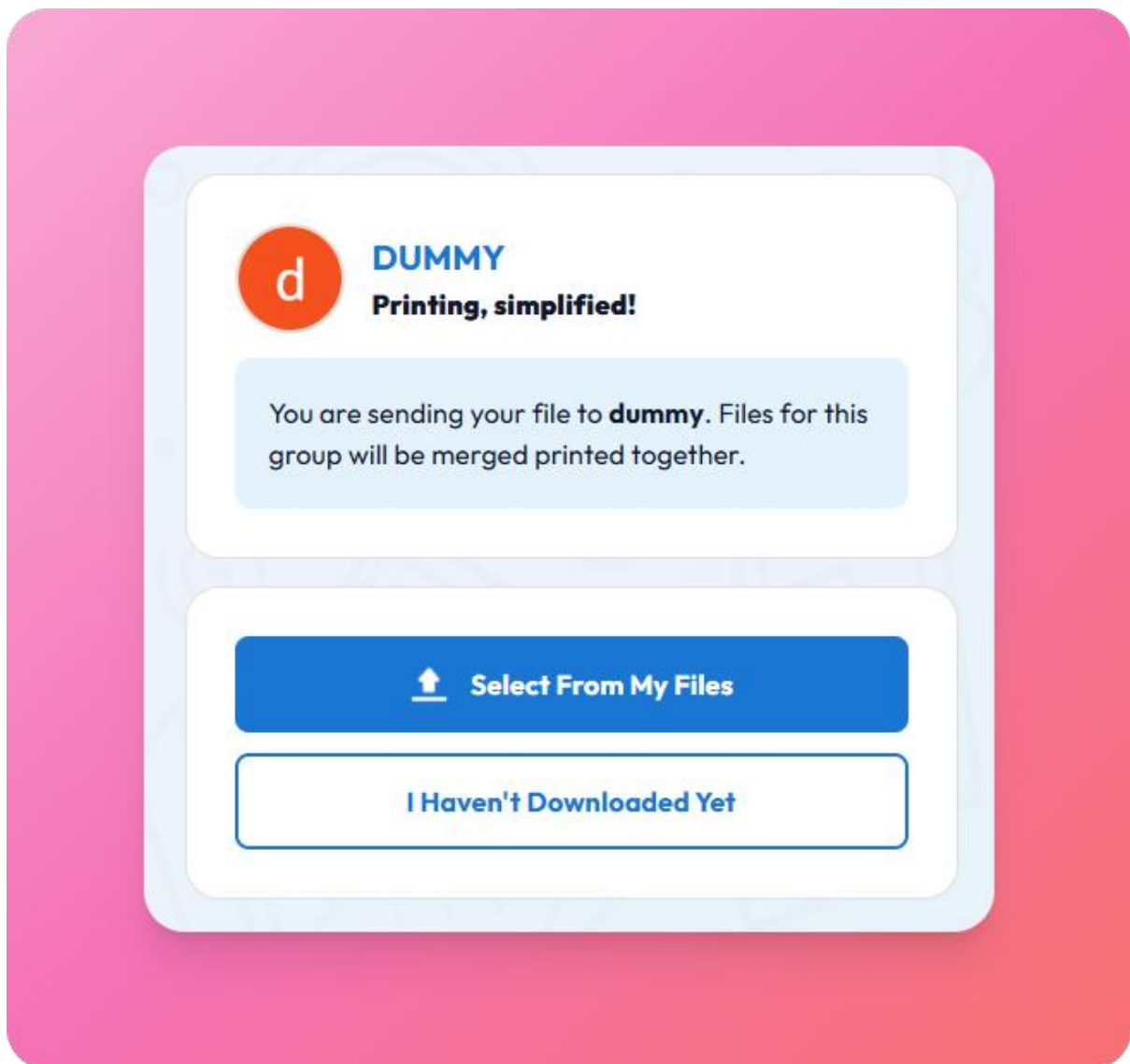
Figure 1 Share Link To WhatsApp Group

For this case, “ProdLive” will be your name as the class representative. **Paste** the message and send to your class WhatsApp group.

## Step Two: File Sending

Anyone who clicks that link will be sent to your page, where they can upload their file with one click of a button.

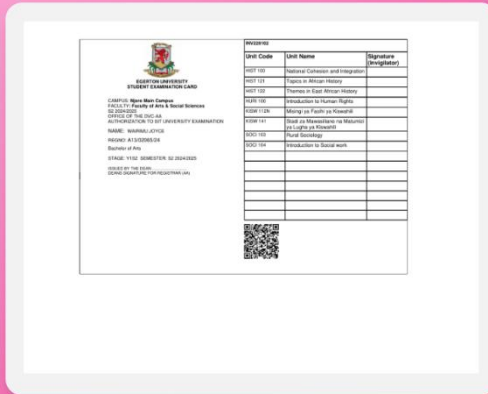
The page is designed carefully to be extremely simple to work with. You won’t even need to think. See below:



Note there are two options. Direct file picker and download option. Any file uploaded through this page will be visible to you in real time.

### Step Three: Printing Charges

After the file has been uploaded, the user will be redirected to a page where they will be prompted to **send you** the printing and handling fees. Here is how it works:



File Saved Just now | ProdLive

## Hello, Student!

Your file has been submitted to **ProdLive**. To include it in the print list, **printing payment is required**.

## Kshs20

▼ View breakdown

Default Printing Fee	Kshs 10
Cloud Storage & Compute	Kshs 6
Coordinator Logistics	Kshs 4

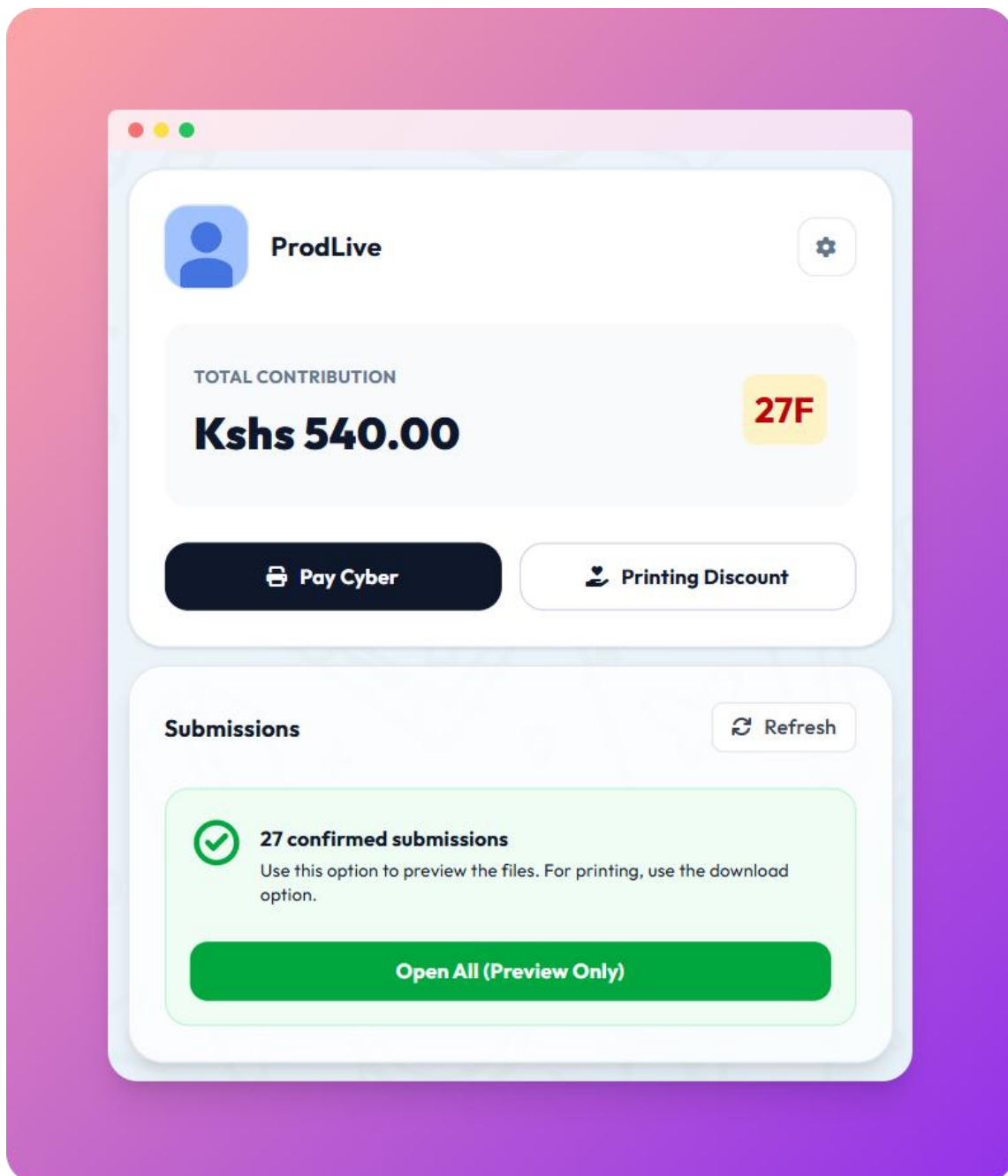
LIPA NA  pesa

## How Payment Works

For those who used WhatsApp before, the logic was direct. Send your exam card, and printing payment along with it.

With cardlabs, the logic is the same, with an added flavor of automation. Payment is 10x times simpler.

Instead of relying on M-PESA SMS to track those who paid, users will send printing money directly using **Sim Toolkit Prompt**. All the funds sent will be visible in one place,



ready for accommodating printing. Payments are tracked in real time, and you, as the class representative have full control of the files and funds submitted to your account. See below:

## What about the Files, where are They?

Files are submitted individually. But when they reach your account, they are **merged into one piece**. What does this mean?

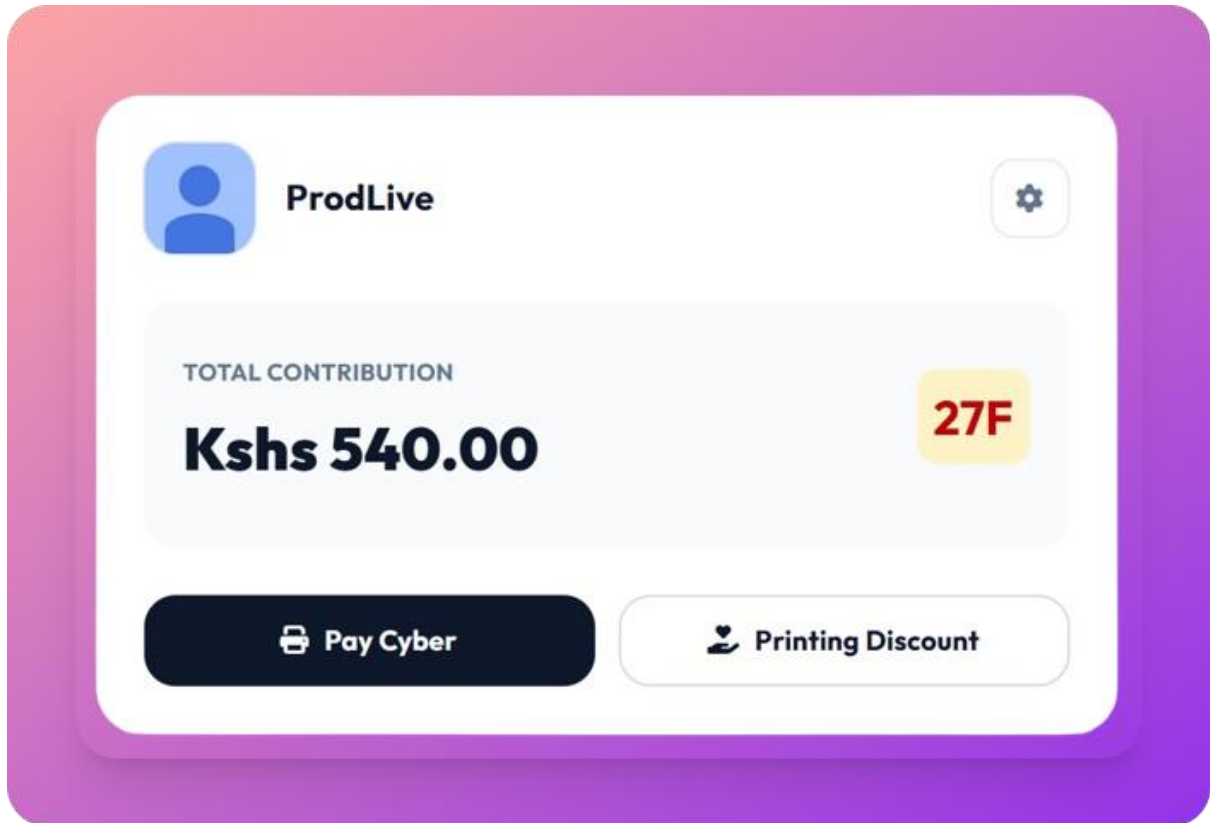


Unlike WhatsApp, where you have to sift through multiple chats to locate files, cardlabs organizes all the files into one place. A multi-page document containing the files is available for printing. See below:

You can print all files in one round any time you want.

## Printing Payment

This is the **easiest** part. See below:



**“Pay Cyber”** – This option allows you to make payments for all the printed documents – in a smart way. The following payment options are supported:

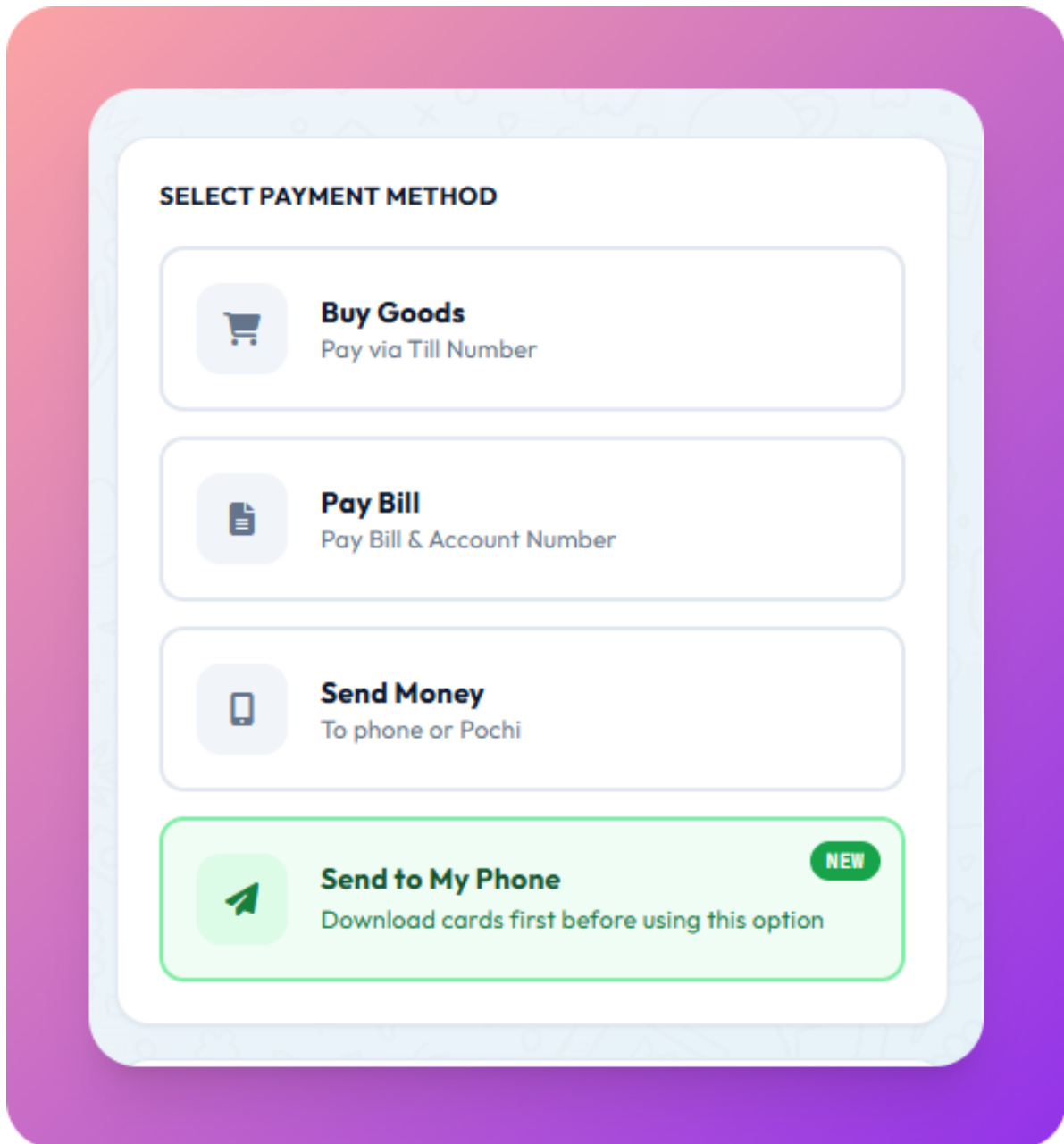


Figure 2 Payment Options: To Print Vendor

Pick a payment method, enter amount to send and confirm. See example:

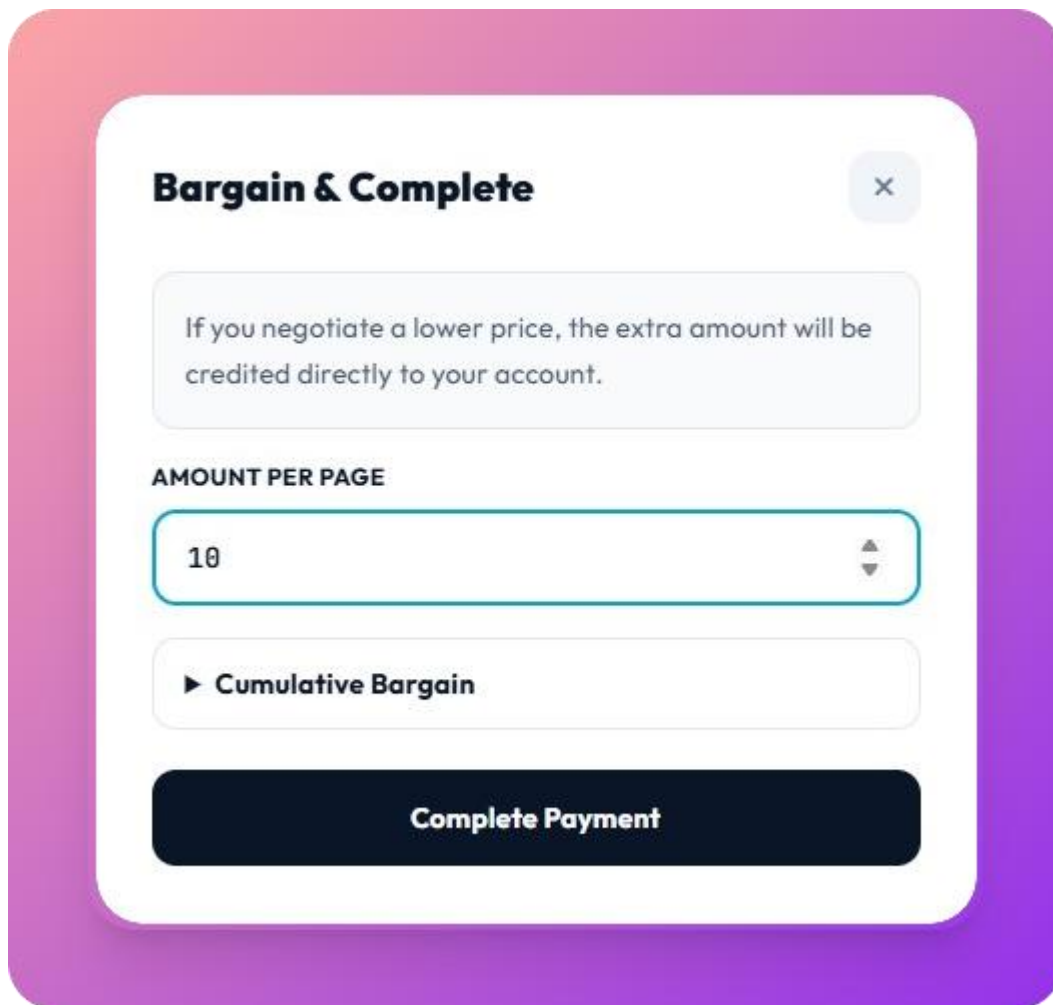


Figure 3 Enter Discounted amount

Hit “**Complete Payment & Confirm**”. That’s it – you are done! The amount is sent instantly to the print vendor, and the confirmation message is pushed to your dashboard. Refresh the page and you will be able to see.

## Printing Discount

Notice the upload amount was KES20 for this case, but we printed with KES10 per page. This leaves you with a **margin** of **KES10**. These amounts are relative to the upload amount vs printing amounts.

This margin amount will be available for you to deposit into your M-PESA.

## Cloud Storage & Compute

The files are uploaded and stored in the cloud (AWS) for the duration necessary. Authentication, account management, and file processing are all done in a dedicated environment that runs on a pay-as-you-go service. The cloud application burns exactly **Kshs30.2376** per hour.

The developers and maintainers are forced to deduct 60% of the profit margin to keep the services running. It is a small amount, and basically the whole application is running at a loss on the management side.

We welcome donors and well-wishers to donate to this project and keep it running. If you feel touched, you are more than welcome to send your donation via the system till:

Till Number: **4858770**

Till Name: **CARDLABS KE**

## **So, what is cardlabs, really?**

cardlabs is a modern, independent, general-purpose, cloud-native, student-developed application designed to simplify logistical and printing coordination among students.

### **Origin**

When I joined campus, I was completely new to how everything worked. First exam season was especially confusing.

A week before exams, every student has to download their exam card, print it, and get it stamped at the department office. That's the process. Without a stamped exam card, you don't sit the exam.

You have two options: take it to the office yourself, or hand it to your class representative, who collects from everyone in the class and goes for stamping as a group.

For students who lived far from campus, physically delivering a printed card to the class rep wasn't easy. Some classes figured out a workaround — send the exam card PDF over WhatsApp. The rep prints it on your behalf, combines it with the rest, and takes the batch for stamping. It was a real improvement over everyone trekking in individually.

I watched this happen and thought: this actually works. People are solving a real problem with their phones and a WhatsApp group. But it doesn't scale. When your class has 60 people all sending files through the same chat, the rep is printing one-by-one, trying to remember who sent 10 shillings for printing and who didn't, losing track of submissions, spending an entire evening on what should be a simple task.

That's where the idea came from. What if there was a dedicated system for exactly this? Students send their files through a proper interface. The system merges everything into one PDF. The class rep prints a single document, goes to the office once, and everyone gets their exam card at the venue ready for the exam.

That's when CARDLABS was born.

This tool was developed out of necessity, curiosity and student goodwill. We really hope you will find it useful. This way, you will be supporting student – led innovations to make printing and coordination easier. One step at a time.

 **CardLabs**

<https://cardlabs.cloud>



[cardlabskenya@gmail.com](mailto:cardlabskenya@gmail.com)



<https://www.tiktok.com/@quantumsoft.net>



<https://x.com/devilmusk>