

## **Extra Materials**

Giuseppe Daidone – Alessandro Germanò – Valerio Liberati – Davood Sheibani

## A tale on Successful Innovation

Once upon a time, there was a visual artist publishing online. If they needed to protect their intellectual property against generative AI, they would take part into artists rights association and apply the copyright regulation. One day, they discovered that new version of Midjourney learned to replicate their unique drawing style. Because of that, the artist realized that joining artists rights association wasn't the best choice for protecting their work from AI plagiarism because the law was not effective. This realization pushed the artist to search for a better solution and consider other alternatives. Until finally they found a service that helped them to protect their work against generative Al.

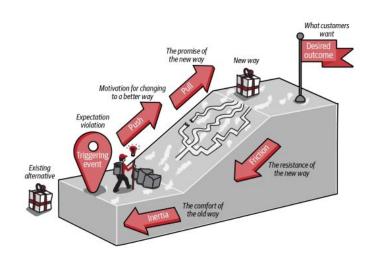
## Push, Pull, Inertia, Friction

**Push**: Visual art is largely collected by companies to train their own generative Al model. Artists take part into associations to defend their intellectual property, but it's not effective.

**Pull**: Making visual content useless for training a generative AI.

**Inertia**: Trust in a regulamentary system that slowly seems to be aligning with technology advancements.

**Friction**: Will my art be altered? Will this really protect my work?



Problem	Solution	Unique Value Proposition		Unfair Advantage	Customer Segments
<ul> <li>Web scrapers steal the visual artistic content from legit/illegal online platforms, selling it to generative AI companies.</li> <li>Stolen artworks are used for training generative AI models to emulate the artists' style and characters without their consent.</li> <li>Artists feel powerless when trying to protect their intellectual property against AI emulation, because laws and regulations are always late wrt the technology advancements.</li> <li>Existing Alternative</li> <li>Enforcement national and EU regulations</li> <li>Artists rights associations</li> </ul>	Adversarial watermark perturbation service against artistic AI generative models to protect the intellectual property of the artists.	Protect vi from bein exploited generativ	sual art g by	Ü	Target customers Visual artists and editors publishing online
	Key Metrics - Number of subscriptions/ppu - Average number of watermarks per user monthly	High-level Concept Drawing a trojan horse, but Troy is OpenAl.		Channels - Social media - Comics and art events - Partnerships with publishers	Early Adopters Visual artists with prominent online presence concern about Al plagiarism
Cost Structure Cloud infrastructure and storage, Development of MVP, Token system management, Marketing (events, adv, social media)			Revenue Streams  Monthly subscription plan: \$17 for 100 tokens Pay-per-use plan: \$10 for 50 extra tokens		

# Unfair advantage

We currently don't have one, but we are working on an algorithm that breaks state-of-the-art current solutions (the research area is at early stage, it was born in 2023) to be patented.

We plan to develop it for the second phase of our MVP.

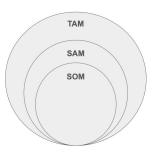
## TAM - SAM - SOM

#### TAM:

#### Type Insights

Non-digital comic books accounted for a revenue share of 74.7% in 2024. The physical comic book market has gained traction among collectors and investors, with rare issues, first editions, and variant covers commanding significant value. The rise of professional grading systems (e.g., CGC and CBCS) has further reinforced the investment potential of hard-copy comics, driving demand for exclusive and limited-edition prints. Print comic books offer a sensory and immersive reading experience that digital formats cannot replicate.

Demand for digital comic books is expected to grow at a CAGR of 14.3% from 2025 to 2030, driven by the rise of smartphones, tablets, and digital platforms. One of the primary factors fueling this demand is convenience. Digital comics allow readers to access vast libraries instantly without the need for physical storage space. This on-demand access is especially appealing to readers who may not have easy access to comic book stores or prefer digital device portability.



- Graphic illustration artists are 2.2M worldwide, market size is estimated to be 2.2M \* 15 USD \* 12 = 396 million USD.
- Animated movies and series published each year are around 100 and 300 respectively. Animated movies duration is 90 minutes and composed by 24FPS on average, so their market size is 100 \* 90m \* 60s \* 24f \* (15 USD/100) = **1.95 million USD**. Animated tv series are composed by 16 episodes with a duration of 20 minutes at 24FPS on average, so their market size is 300 \* 16 \* 20m \* 60s \* 24f \* (15 USD/100) = **20 million USD**.
- Focusing only on illustrations and animation distributed also online, accounting for 70% and 85% respectively, estimating TAM = 396M USD \* 0.7 + (1.95M + 20M) USD \* 0.85 = 277M + 18.7M USD \* 300 million USD. (EUR 262M)

#### SAM:

- SPAICY will launch in Italy, focusing on comics and illustrations first.
- The online market size in Italy, that accounts for 5% of global, is 277M USD \* 0.05 = 14 million USD.
- Targeting artists with age range in 18-40 constituting 70% of artists because they are typically more present online, where 70% of them perceive the risk of AI plagiarism, estimating SAM = 14M USD \* 0.70 \* 0.70 = **6.8 million USD**. (EUR 5.9M)

#### SOM:

- In year 1, we plan to have a partnership with the top 5 major publishers in Italy (Disney Italy, Marvel, Panini, etc.) accounting for 70% of Italian market share, estimating to be = 6.8M USD \* 0.70 = **4.76 million USD**
- In the first year, we estimate to capture 10% of the artists, through artists association cooperation, estimating SOM = 4.76M USD \* 0.10 = 476k USD. (EUR 415K)
  - The illustration workforce comprises of 2.2 million people, growing by 3.58%.

## Revenue stream

Our revenue model is centered around a flexible token system, optimized for different user needs under two approaches: Pay-per-Use Token System and Subscription Plan.

## 🔄 1. Subscription Plan (70% of users)

- 100 tokens → \$17/month
- Designed for artists who regularly publish or share work
- Tokens roll over each month as long as the subscription is active

### = 2. Pay-per-Use Tokens (30% of users)

- 50 tokens → \$10
- Tokens are valid for 12 months
- Ideal for small projects or extending the subscription plan

🎁 New users get 10 free tokens at sign-up to try SPAICY

## Overview of revenue stream

#### Using a hybrid model:

- 70% of revenue comes from subscriptions
- 30% of revenue comes from pay-per-use (PPU)

#### Average Revenue Per User Per Month (ARPU):

- Subscription revenue = \$17 per user/month (EUR 15)
- Average PPU revenue = \$10 per user/month (EUR 9)

### So we compute the blended ARPU (average revenue per user per month):

• ARPU monthly =  $0.7 \times \$17 + 0.3 \times \$10 = \$12 + \$3 = \$15$  per user/month (EUR 13)

# Weakest Assumption

We nailed the amount of tokens required to the average customer in a month.

## OKR

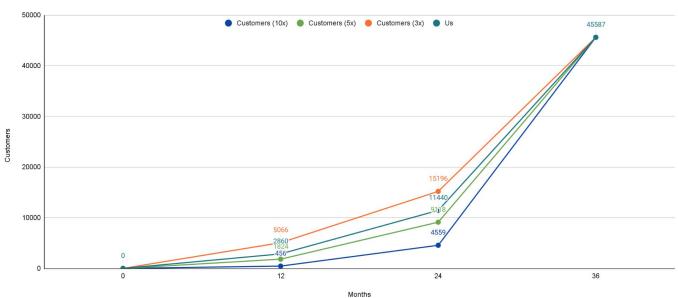
**Objective**: Artists will protect most of their images published online.

#### As measured by:

- KR1: at least 70% of available tokens are used by subscribers each month;
- KR2: 90% of tokens acquired from pay-per-use customers are spent within a month;
- KR3: 95% of the customers upload new images each month after they tried the service on other already uploaded images.

# Feasibility





# Key Milestones (Key metrics)

#### Year 1

- Reach ~2,800 users
- Generate ~\$400,000 revenue
- Build functioning MVP and test it with early users
- Start partnerships with top publishers
- Patent the protection system

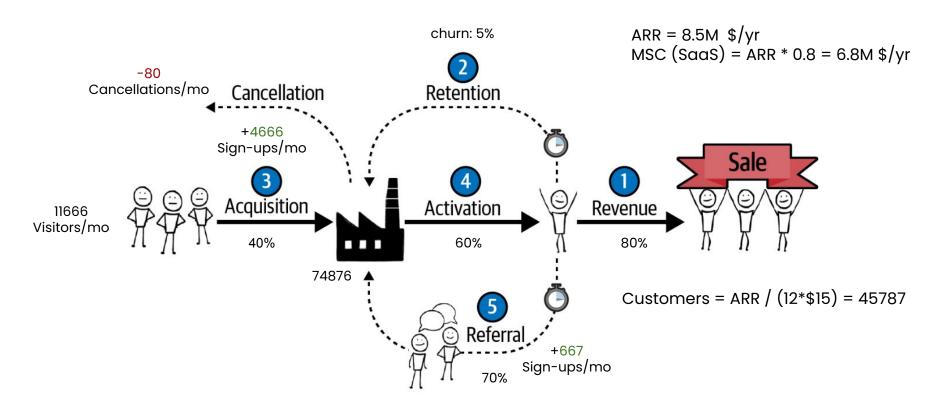
#### Year 2

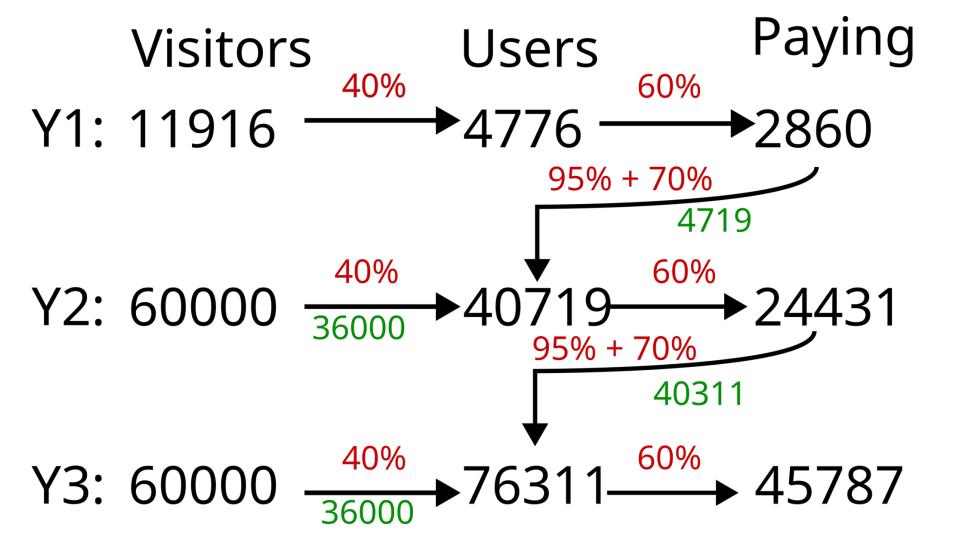
- Generate ~\$1.6 million
- Improve features based on feedback
- Reach more artists through new partners

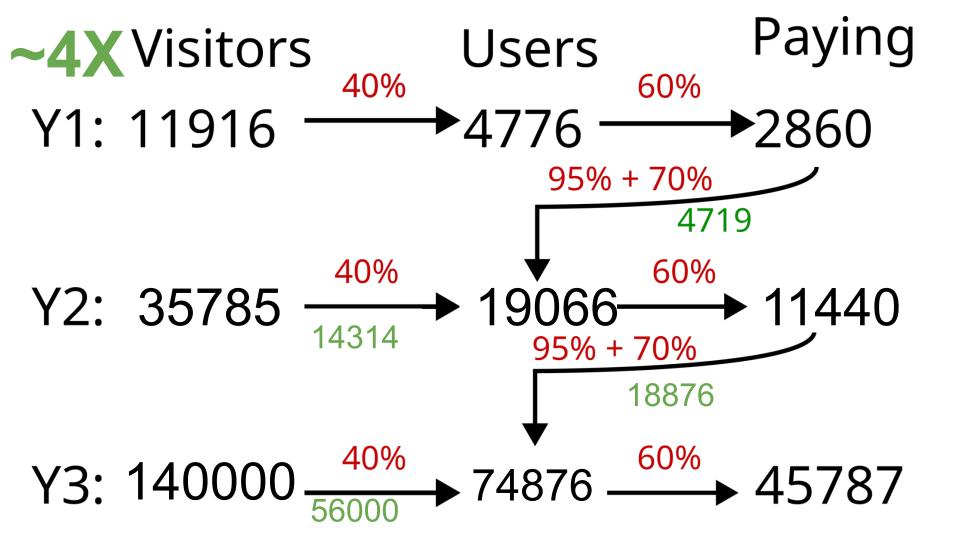
#### Year 3

- Reach ~45,000 users
- Generate ~\$6.8 million (MSC)
- Expand across Italy

# **Customer Factory**







# Factory

Y1: we want to reach SOM. In order to do so, we need 2860 paying users at the end of the year. Using the estimated rates, we can do so reaching 12000 visitors in the first year, which is an average of 1000 visitors per month.

Y2: we increase the number of visitors to attract from 1000 per month to 2982. This way we can leverage the mechanisms of retention and referral of our model to ease the burden of reaching MSC at Y3.

Y3: By increasing visitors per month to 11666, we reach a base of paying users of 45K -> MSC.