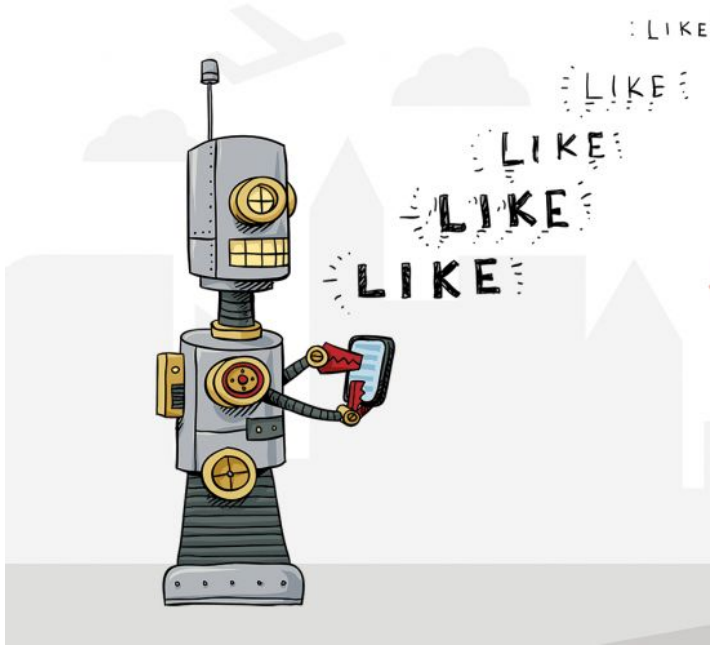


# GANBots:

Detecting Twitter bots with  
GAN generated human faces.

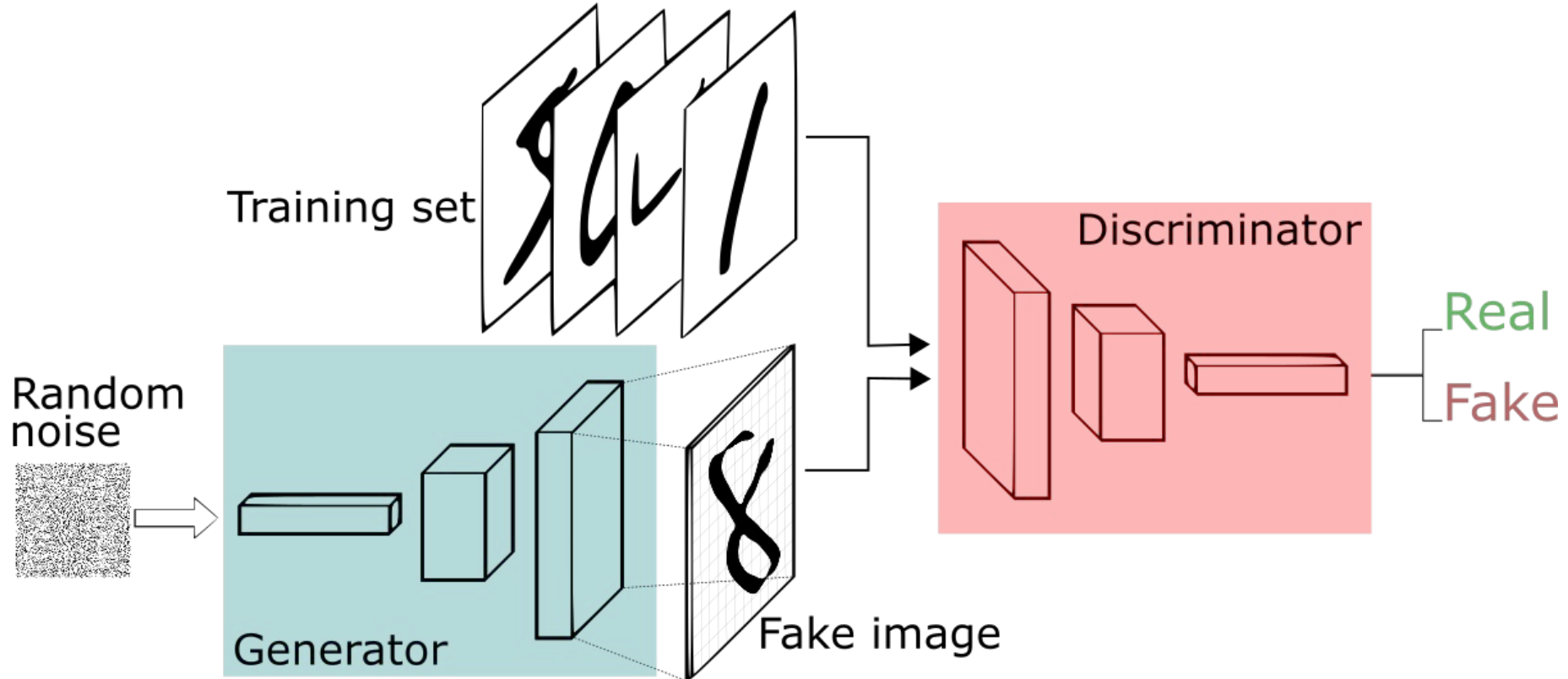


# What is a social media bot?



- Programs to do tasks on social media platforms
- Can be good or bad with their actions
- Nonetheless, raise a lot of ethical concerns

# What is a GAN(Generative Adversarial network)?



# Why is a social bot with a human GAN face a problem?



- Creates a lot of ethical concerns, for eg(faking a identity, manipulating people)
- Harder to detect than regular bot accounts
- Lately it's been hard to differentiate between a real and a fake face

# What have we done about this so far?

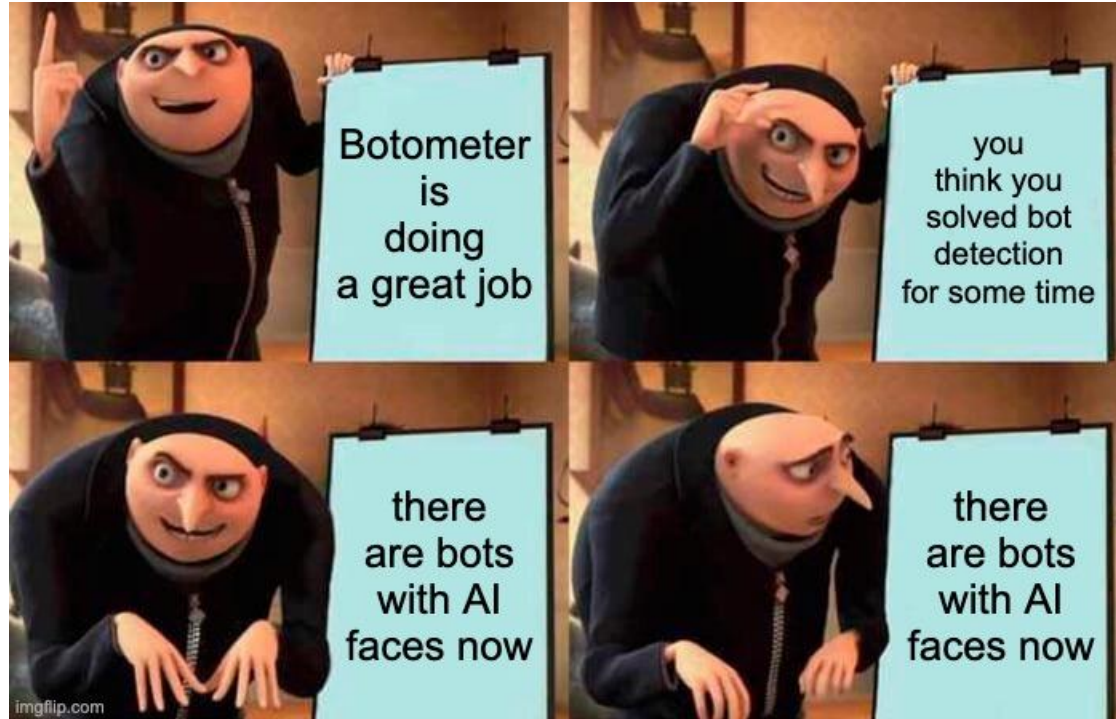
## Botometer

- Checks the activity of a Twitter account and gives it a score.
- Higher scores mean more bot-like activity.
- Considers around 1000+ features in it's analysis.

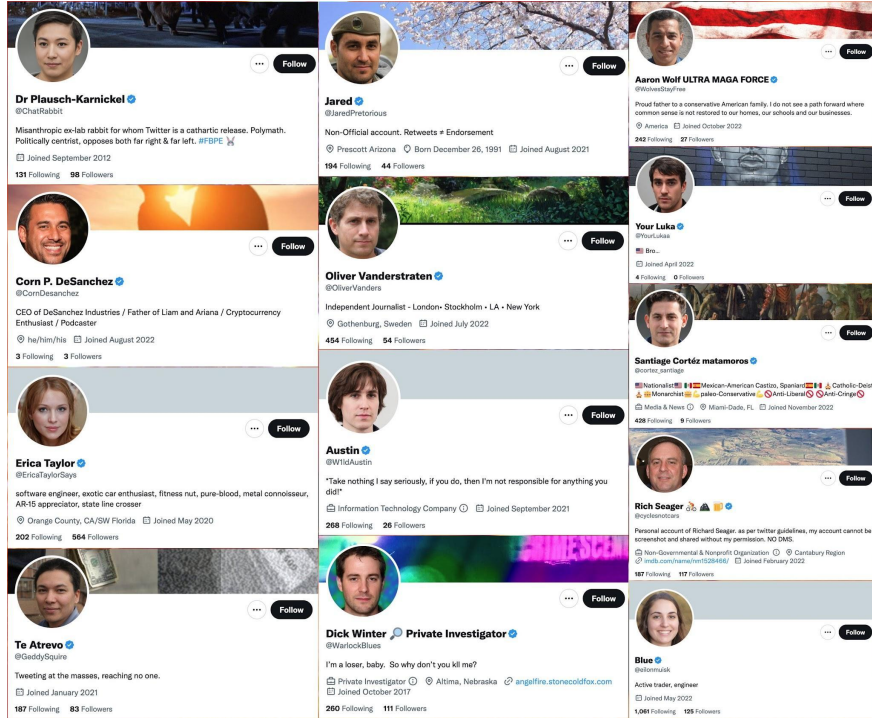


**However, doesn't consider the profile picture in it's analysis, yet!!**

# OUR PROBLEM?



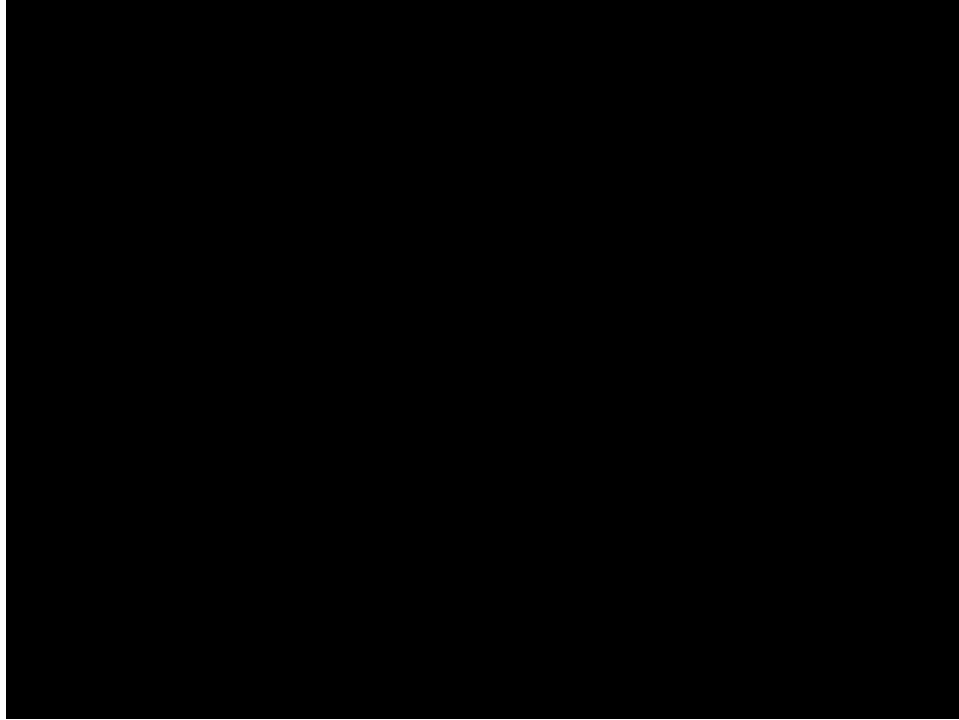
# Some **\*verified\*** bot accounts with GAN faces out there



**Verified account**

This account is verified because it's subscribed to Twitter Blue. [Learn more](#)

# What are we doing about it?



Actual fake faces used on twitter by bots.



## Data collected so far

- StyleGAN dataset on GDrive.(100k+ GAN faces)
- Academic dataset from generated.photos (10k GAN faces, heavily annotated)
- TwitterGAN dataset(twitter accounts with GAN faces)(250+ accounts)
- Tweets with profile pictures(100k+ images)