Valida

AI-based document forgery detection for fraud prevention

Valida by Gradiant assesses the trustworthiness of digital documents to prevent fraud in on-boarding and KYC processes.

Our technology allows companies to offer an extra level of security and prevent fraud by analysing documents and detecting digital forgeries through AI-based forensic techniques.

- ✓ **Automatically detects digital forgeries in ID documents, bills, payslips, etc.**
- ✓ **Automatically detects whether a document has been captured from a screen display**
- ✓ **Supports all types of ID documents and nationalities:** passports, national ID documents, driving licenses, etc. without the need of adaptation nor specific training
- ✓ **Does not require connection to external databases (e.g. ID document databases) to detect modifications**
- ✓ **Does not require the original document to detect modifications**

Functionalities

Validation modules

- ✓ Forgery detection in digital documents: ID documents, bills, payslips…
- ✓ Detection of documents displayed on screen

Input document formats supported:

- ✓ JPEG images
- ✓ PDF files

Performance

Recognition rates

- ✓ Forgery detection:
  - EER = 2.3%
  - TPR@FAR1% = 94.0%
- ✓ On-Screen detection:
  - EER = 7.5%
  - TPR@FAR1% = 87.3%

Time consumption

- ✓ For a reference server:
  - Amazon server: t2.xlarge
  - CPU: 4.
  - RAM: 16 Gbytes.
- ✓ **~2.0 s** for a 3.2 Mpix image
- ✓ **~0.05 s** for a single page PDF file

Integration

REST API with sample code for multiple platforms and languages

Code samples provided for Shell, HTTP, JavaScript, Node.js, Ruby, Python, Java, and Go

SaaS / Dedicated Cloud / On-Premises Deployment

Deployment requirements

OS: Linux 64 bits (recommended Ubuntu 16.04).

Programming language: Python3.6

Hardware Requirements: Intel x64 architecture.