Analyse de l'information

Cette semaine l'ART1 (généraliste) nous met en garde contre les risques de manipulation de l'information et évoquent des pistes de recherche permettant d'identifier les Deepfakes.

On observe d'ailleurs dans l'ART2 que ceux-ci risquent de devenir plus crédibles encore grâce à l'ajout de paroles en langues étrangères ainsi que le permet par exemple la technologie de la société Synthesia.

On voit dans l'ART3 que le deep faking va maintenant plus loin que la manipulation de personnes/persona puisque la Chine a développé des programmes (GAN) permettant de "trafiquer" des images satellites de la Terre et donc, potentiellement, de démontrer des évènements qui n'ont pas eu lieu ou de tromper l'adversaire /concurrent sur la présence ou non d'éléments physiques (ponts, usines,...)

Semaine 7

20180826_AI-altered video makes it look like you can dance.pdf

Thème: Politique, Technologies

Can't pop-lock or Lindy Hop to save your life? Don't worry -- AI could soon make it look like you're a dance superstar. UC Berkeley researchers have developed a deep learning system that translates dance moves from a source video to less-than-experienced subjects.

Thème: Technologies

Just as it's no longer certain that a talking head in a video is authentic, you might not have guarantees that a person's body movements are real.

Thème: Manipulation de l'opinion

20180911_Beyond deep fakes Transforming video content into another videos style automatically.pdf

Because the data-driven method does not require human intervention, it can rapidly transform large amounts of video, making it a boon to movie production. It can also be used to convert black-and-white films to color and to create content for virtual reality experiences

"It was an eye opener to all of us in the field that such fakes would be created and have such an impact," he said. "Finding ways to detect them will be important moving forward."

A variant, called cycle-GAN, completes the loop, much like translating English speech into Spanish and then the Spanish back into English and then evaluating whether the twicetranslated speech still makes sense. Using cycle-GAN to analyze the spatial characteristics of images has proven effective in transforming one image into the style of another.

20180619_The universe of people trying to deceive journalists keeps expanding and newsrooms arent ready.pdf