



## A 10-year review

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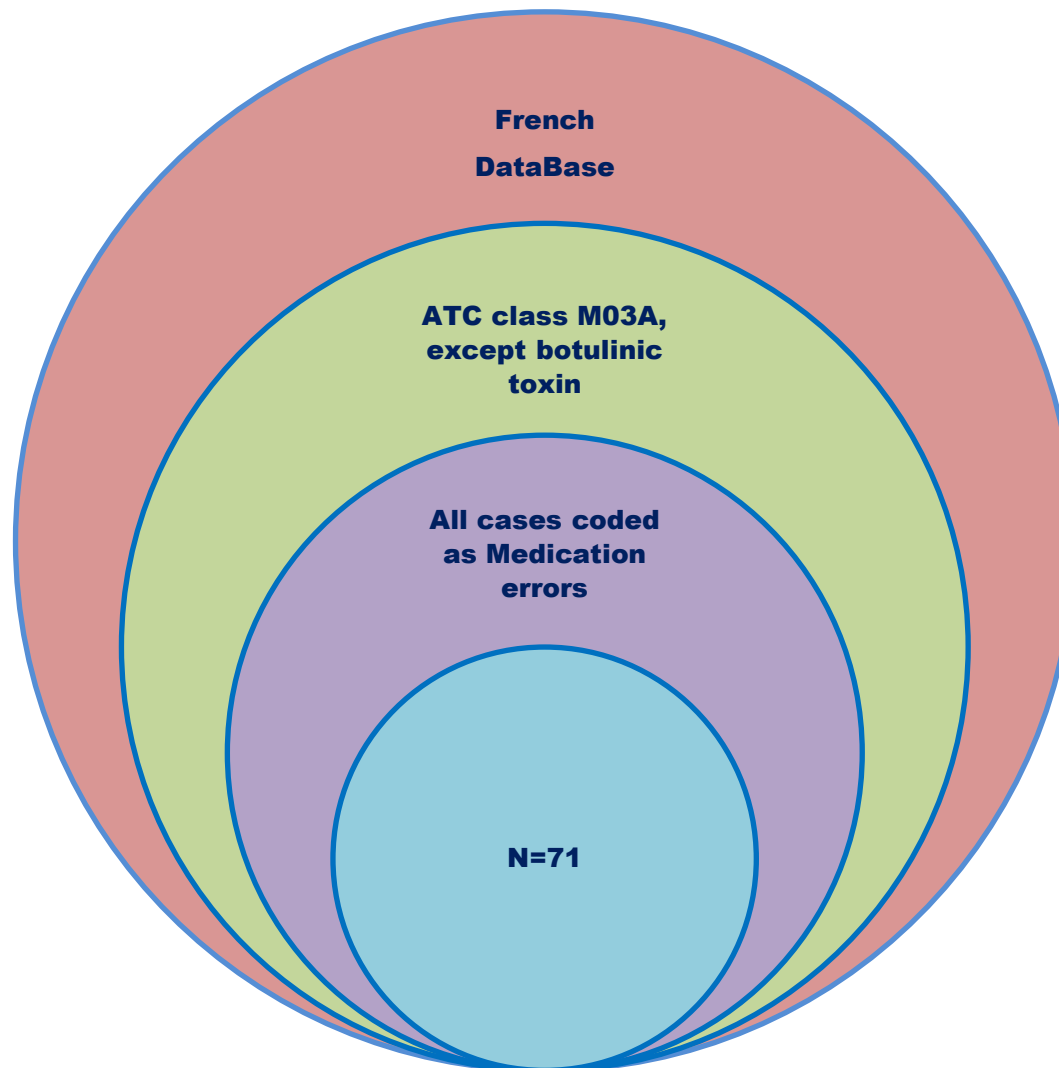
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# Methods

Study Period: 01.01.2013 to 04.30.2023

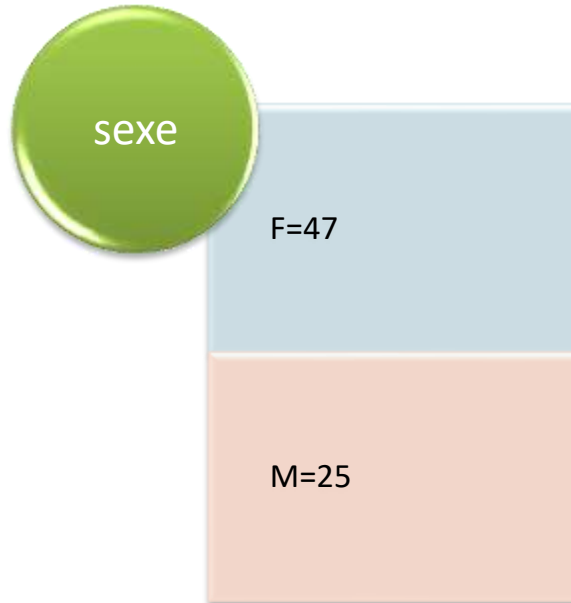


# Main Results

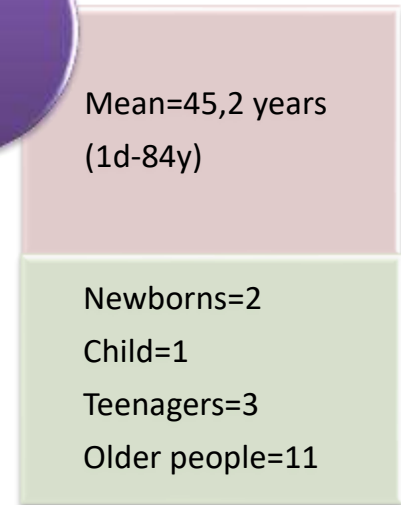
## Who notified?



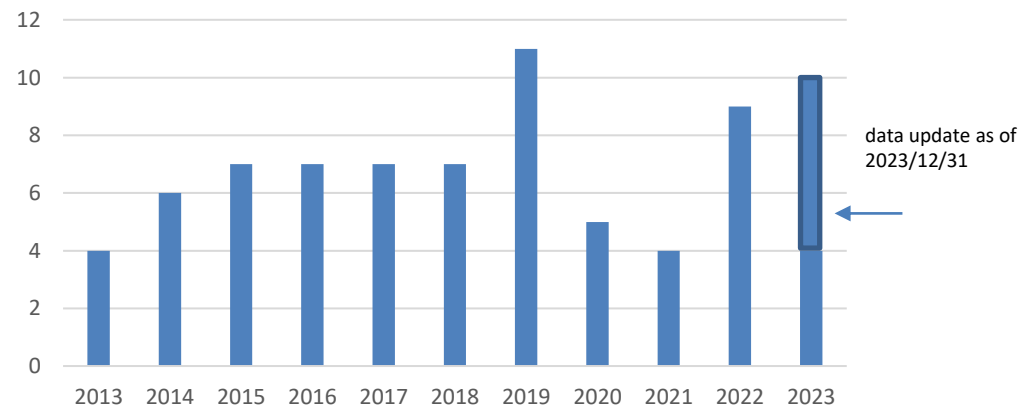
## sexe



## Age



Case number/year



# Results: Consequences

Seriouness

N=66 (93%)

Death=2

Engaged Vital pronostic=39  
Hospitalisation=9  
Others medically situations =16

Death 1  
2022

F, 49 y, obesity, AHT, depression  
Place: operating room  
Surgery: wrist fracture

ME:  
**cisatracurim 2mg/ml mylan**  
instead of  
**midazolam mylan**  
AE: cardiorespiratory arrest

**Death** D18 after ME  
Cerebral anoxia  
ME Roots: human factor



Death 2  
2016

F, 58 y,  
Place: Hospital Room  
Intervention: endoscopy

ME:  
**atracurium 50mg/5ml Hospira**  
instead of  
**trimebutine 50 mg/5ml Pfizer**  
AE: cardiorespiratory arrest

**Death** the same day  
ME roots:  
-same dosage for both product  
-confusion between two similar  
products stored in the same  
place in the fridge



# Results: according to unit of care

## Surgery, =31

- **MIX-up between similar products**
  - Midazolam/(cis)atracurium, N=15 (death n°1)
  - Sufentanyl/suxamethonium-atracurium, N=5
- **Route Error (intrethecal), N=3**
- **Others confusions (human factors) with**
  - Ketoprofen
  - Neostigmine
  - Lidocaine
  - Heparin
  - dexamethasone



## Gynecology, =10,

- **MIX-up between similar products**
  - Oxytocin/suxamethonium, N=3,



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- Ephedrine **Aguettant**/Suxamethonium **Aguettant**
- **Others confusion with NMB**: lidocaine, sufentanyl, phenylephrine, methotrexate, tranexamic acid

# Results: according to unit of care

## Recovery ward, =8

### Storage

- trimebutine/atracurium Hospira: both products are stored next to each other in the fridge
- **ME By omission: lack of flushing the NMB catheter**
  - Nefopam/Atracurium
  - Phloroglucinol/atracurium
  - Rocuronium: rocuronium bolus after decampling
- **Human factor**
  - Insulin/rocuronium
  - morphine/suxamethonium
- Other case: Tranexamic acid/atracurium: medication error in the preparation of the perfusion of tranexamic acid. The analysed syringe contained both products. No explanation

## Endoscopy, N=7, mix-up, storage

- 3 trimebutine/(cis)atracurim (death n°2)
- 3 phloroglucinol/atracurium
- 1 ketamine/suxamethonium



# Results: according to unit of care

## Cardiology, =3 mix-up

- Midazolam/atracurium
- Isoprenalin/suxaméthonium

## Neonatology, =2

- Medication error in dose calculation: each newborn received 10 fold recommended dose

## Data updated, N=6

- 3 risk of error, no death
- 3 ME
  - 1 confusion between ampoules: storage in the fridge
  - 2 errors in the labelling

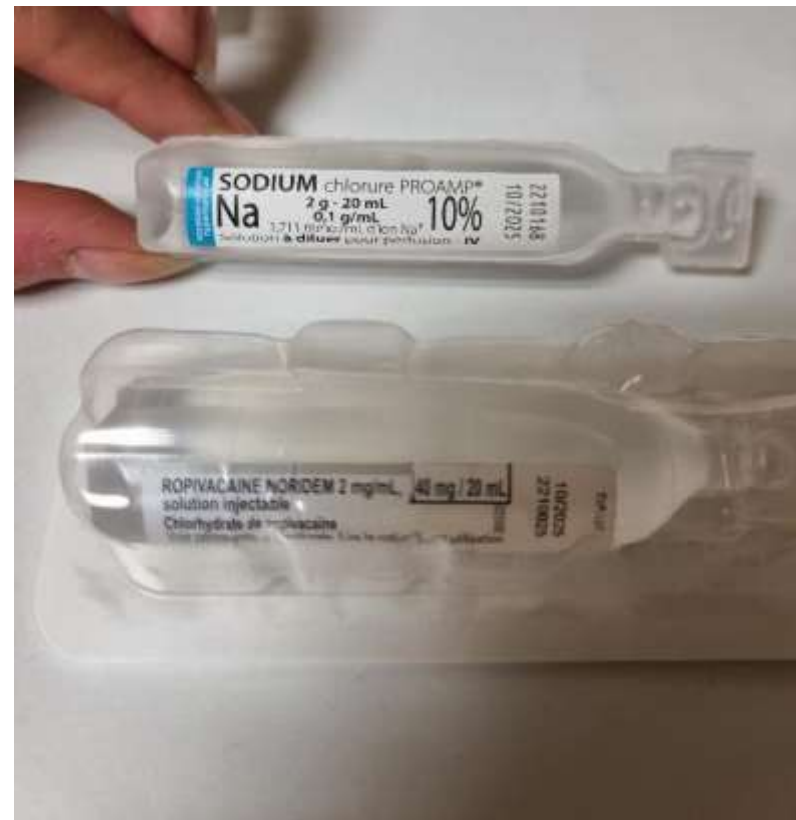
- Info vigilance: One risk of error was reported
  - Detected during software programming for prescription
  - collaboration between pharmacist and physician
  - error in the SMPc of cisatracurium APHP and cisatracurium Accord in the table for calculating the flow rate
  - Transmitted to the French Drug Agency
  - Modification of the SMPc



- Other current business



Same Product?



No, No, NO!!!!

# To conclude

- Few reported medications errors over a 10-year period
- Under reporting
- Reporting spike in 2019, 2022 and 2023:

→ ME reporting circuit centralised by French PV network.

1. Storage in the fridge

2. Confusion between vials, especially in the same generic brand name company

3. Inadvertent flushing of NMB bolus

*All actors,  
All vigilants!*



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