RxJava
Schedulers cheat sheet

MAMMALS FISH BIRDS REPTILES

```
Completable.fromCallable { animalsMaker.makeCat() }
        .doOnComplete { animalsMaker.makeDog() }
        .observeOn(scheduler(FISH))
        .andThen(Completable.fromCallable { animalsMaker.makeShark() })
        .andThen(
                Completable.fromCallable { animalsMaker.makeChicken() }
                        .subscribeOn(scheduler(BIRDS))
                        .andThen(Completable.fromCallable{ animalsMaker.makeDuck() })
        )
        .andThen(Completable.fromCallable { animalsMaker.makePenguin() })
        .subscribeOn(scheduler(MAMMALS))
        .subscribeOn(scheduler(AMPHIBIANS))
        .observeOn(scheduler(REPTILES))
        .doOnComplete { animalsMaker.makeCrocodile() }
```

Basic

- `observeOn()` always works downstream - it defines the Scheduler for the tasks **following** it.
- `subscribeOn()` generally defines on what scheduler the **first** task in the chain starts (e.g. `makeCat()` is called on `MAMMALS`).

Nested chains

- A nested chain is by default subscribed on the preceding Scheduler, but this can be changed with a call to `subscribeOn()`. In other words, `makeChicken()` would be subscribed on `FISH` by default, but is explicitly subscribed on `BIRDS` instead.
- The Scheduler of a nested chain defines the Scheduler for the following tasks of outer chain. That is why `makePenguin()` is called on `BIRDS` Scheduler.

Watch out!

- Some operators (e.g. `delay()`, `timer()`) have a default Scheduler, which can affect the following parts of the chain.
- In the example above the `AMPHIBIANS` Scheduler is never used, because it's overridden by `MAMMALS`, but there are special cases where multiple `subscribeOn()` make sense, e.g. when using `doOnSubscribe()` - you can explore them with Maciek Górski's presentation: https://www.youtube.com/watch?v=3xqsIEiqgzk.

Explore this code at https://github.com/FutureMind/schedulers-cheat-sheet. **Have fun and pay special attention not to mess crocodile and dog on the same scheduler (brrr)**

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