**Baby Patient Simulator**

**Problem definition:**

A baby patient simulator for basic life support that can improve automated real-time feedback for nurses at HAN Nursing school, Utrecht University and Radboud University Children's hospitals. Normal manekins aren't realistic and don't give feedback to the person giving CPR. The more realistic simulators are very expensive and not useful for large-scale education through the high price.

**Limitations current prototype:**

* Thorax doesn’t feel life-like (when compressing)
* Lungs are for single use (So re-useable lungs that you can clean)
* Skin isn’t life-like
* Ventilation measurements (Sensor has a moisture problem)
* Airway isn’t designed for new components (thorax, sensors e.g.)
* Airway doesn’t block when preforming the Head-tilt technique wrong
* Real-time feedback (Realistic feedback from an infant)

**Ideas:**

* Re-design Inner body for mounting (components) and integration
* Re-design Thorax
* Re-design Mouth/Nose for integration
* Re-design Lungs for integration
* Ventilation measurements (Maarten van den Berg)
* E-ink bracelet integration
* ???