PneuMonitor

Wireless Respiratory Distress Monitor
Device Overview

- Wireless, single-use (disposable) wearable patch that has the ability to measure a patient’s vitals
  - Heart Rate
  - Temperature
  - Blood Oxidation Levels
  - Respiratory Rate
- Medical professionals will be able to determine the proper treatment based upon the vital values

**GOAL:** Develop a device that has the capability to monitor a variety of vitals at once, allowing caregivers to identify symptoms of respiratory distress and specifically tailor a treatment to the patient
Fact Sheet

- Every 20 seconds, pneumonia claims the life of a child under five--that’s 4,300 young lives lost each day¹
- For every child that dies in the industrial world, 2,000 more die in developing countries¹
- Globally, pneumonia affects about 450 million individuals²
- The global cost of pneumonia is estimated to be $17 billion per year³

Detailed Device Information

- Wireless, wearable patch meant to be placed on patient
  - Single patient / single-use patch (disposable)
- Patch will be able to measure:
  - Heart Rate
  - Temperature
  - Blood Oxidation Levels
  - Respiratory Rate
- Readings will be taken and recorded every 2 minutes
- Values of the vitals will be displayed on a small, portable, wireless screen
Target Audience

- Children under the age of five
- Adults over the age of 65
- Developing countries
  - 99% of pneumonia cases in children under 5 occur in developing countries
- Available to hospitals and clinics around the world
Customer Segments

● Pneumonia susceptibility: children under 5 and adults over 65
  ○ Steadily increasing demographic due to growing population and patient longevity
● Patients with a weakened immune system, lung disease
  ○ COPD, asthma, cystic fibrosis
● Patients with chronic health problems
  ○ Diabetes, heart disease
● Patients who smoke cigarettes
● PneuMonitor will offer a user-friendly experience
● Available to hospitals and clinics around the world
Revenue Streams

- Current cost of systems:
  - Heart Rate - $449.00 for ECG System
  - Temperature - $75.00 Temperature Data Logger
  - Blood Oxidation Levels - $245.88 Handheld Pulse Oximeter
  - Respiratory Rate - $295.00 Respiration Sensor

Total Cost to Conventionally Monitor all Vitals: $1,064.88

- The US has the largest medical device market in the world, ranging around $148 billion, and is expected to reach $155 billion by the end of this year
Why we need YOU

- Technical Ability
- Codes for Interface
- Algorithms
- Software Design
- Hardware Design
Contact Us

- If you would like to help make a difference in the medical community by devoting your skill to the PneuMonitor development, feel free to contact us!
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