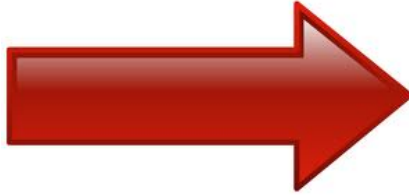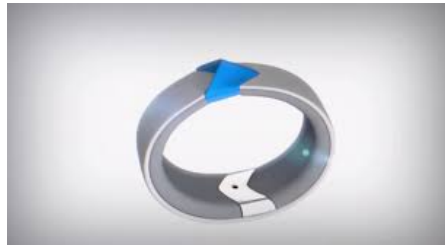# VitalBand

Business Plan
April 19, 2014

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1   Executive Summary

VitalBand is an integrated health monitoring and alert system targeting the Senior Citizen population (65 years of age). The solution will allow for detection and intervention during a heart attack or fall, with no input required from the user. With our wearable monitoring wristband linked to a smartphone our solution offers Senior Citizens the ability to live an active lifestyle and not be worried in the case of a health emergency.

VitalBand will use the latest in sensor and telecommunication technology to alert first responders quickly, providing location and sensor data, reduce fatalities, and decrease medical expenses. Our solution moves well beyond the legacy products that are presently on the market, providing protection and family notification anywhere there is cell phone or WiFi service.

Using a phased rollout plan, VitalBand will slowly introduce this new technology to a demographic that historically has shown apprehension about early adoption of Hi-Tech solutions. With the latest statistics we show that this conception is quickly becoming outdated, with senior citizen presenting a large increase in the use and adoption of todays technology services and products.

The VitalBand Solution is positioned in the same price range as the legacy systems. With our monthly subscription fee our service will offer much more capability compared to the other products in this expanding market.

The target market for VitalBand is the $6 billion medical monitoring market. Focusing on a small local area initially we will use statistically proven marketing channels to reach our target demographic. The early phases will focus on introducing the product to screened qualified users to gain valuable customer feedback. With this small roll out we will gain the local market awareness that will allow for larger target markets in later phases.

With our sales goals showing a conservative approach, we will see a positive cash flow in year 4. By years 6 we are projecting a 78% Internal Rate of Return (IRR) and a Net Present Value of approximately $13 million.

We are seeking an investment of $5 million, broken up over the first 3 years. This investment will fund the product and software development and early operation and marketing requirements.

2   The Problem / Opportunity

The current population of senior citizens in the United States (Figure 1) is approximately 40 million (13% of the population) and is projected to increase by 80% to approximately 73 million (20% of population) by 2030.[i] Approximately 12.8 Million (32%) seniors live either by themselves or with their spouse[ii], (Figure 2) creating situations where they will require medical assistance but have no one

Figure 1:Trends in Population over 65

	2010	2015	2020	2025	2030	2035	2040	2045	2050
Population of 65	40,267,000	47,704,000	56,010,000	65,157,000	72,984,000	77,660,000	80,233,000	82,027,000	84,792,000
Percentage of Population	13.00%	14.85%	16.82%	18.93%	20.61%	21.42%	21.68%	21.75%	22.04%

there to help. Statistics from Center for Disease Control (CDC) show that at least 20% of those age 65 to 74, and 26% over 75, have at least 1 medical situation annually that requires a visit to the emergency room.[iii]

This rapidly growing demographic faces a unique challenge in their everyday life, detecting signs of a health emergency or catastrophic fall and then alerting the proper responders in a timely manner. Seniors have several health related threats that require the timely response from emergency responders to provide the lifesaving procedures. Notably, recent pertinent statistics from 2010, regarding senior citizens highlight the gravity and magnitude of the problem faced[iv]:
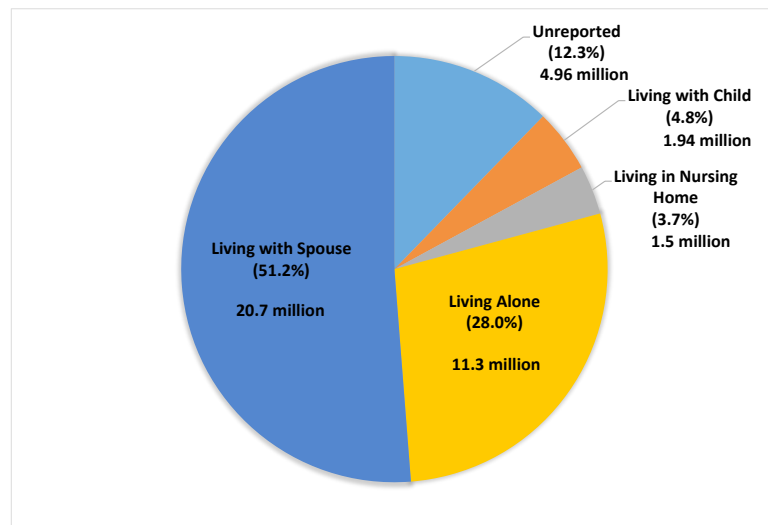
Figure 2: Living Arrangements for 65+

- ➢ One out of every three seniors (65 year old or older) fall each year.
- ➢ Falls are the leading cause of both fatal and non-fatal injuries.
  - o 2.3 million non-fatal injuries among older adults were treated in emergency departments
  - o More than 662,000 (approx. 29%) of these patients were hospitalized.
- ➢ 477,338 deaths were attributed to heart attack and 109,695 to stroke

With the direct medical costs of the falls in 2010 of $30 billion[v] and estimated at $444 billion for heart disease and stroke[vi] we see that any chance to prevent or provide early assistance would be a potential business opportunity.

Given the fatal incidents and frequency of calls to the emergency responders, the subsequent health outcome of the patient hinges on response time. Research shows that response time in medical situations is the key determinant in saving lives[1] (Figure 3). When response time exceeds 5 minutes, the fatality rate triples. It almost quadruples around the 12-minute time frame.[vii] It is easy to conclude that lowering the emergency response time provides the most promising opportunity for significantly lowering the chance of fatalities. Associated with this is also the significance of decreasing the long-term health cost from costly hospital stays and rehabilitation expenses because of early detection and intervention.
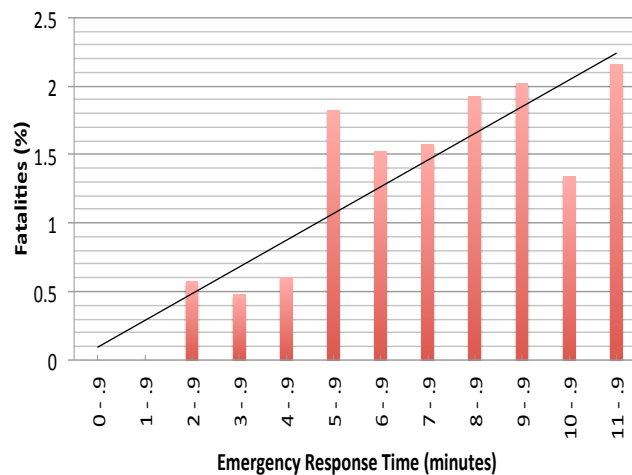
Figure 3: Trend in Response Time vs. % of Fatalities
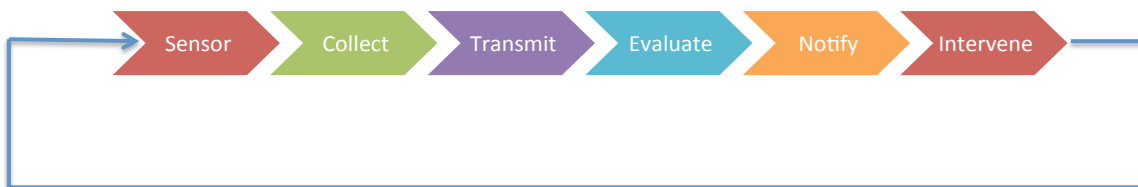
Figure 4: Alert Detection and Response Cycle

Catering to response time we see (Figure 4) the detection and response cycle framework. This framework provides guidance one the most affective and complete way to remotely collect sensor data to provide the user assistance in an emergency. Today the market offers several products to address this growing concern, the most famous being LifeAlert (I've fallen and I can't get up). LifeAlert along with all of the other products that are presently offered require interaction from the individual by pushing a button to initiate a call, with many of them limited to the user's interior living space. These legacy systems do not address all of the elements within the detection and response cycle framework and therefore do not address the total solution.

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[1] These statistics are for population at large of all age groups. The sensitivity of the response time can logically be expected to be greater for senior citizens.
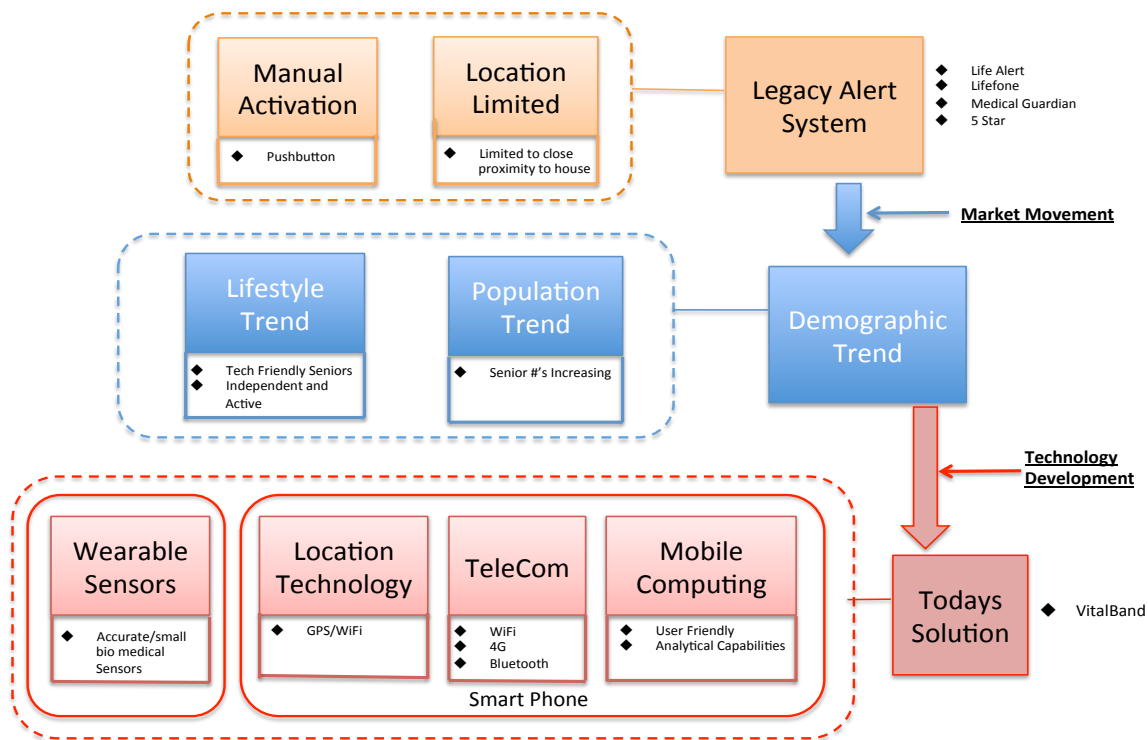
Figure 5: Health Monitoring Trends

Analyzing the market (Figure 5) the demographic shift in the population and lifestyle of the seniors clearly leads us to a more mobile solution that is in line with the latest technology offered today. The VitalBand solution using today's technology consists of wearable wrist sensor coupled with a smartphone. VitalBand will initially focus on the senior citizen fall and heart rate irregularity situations. With the VitalBand wristband coupled to a smartphone, the user is free to travel anywhere there is cell coverage and be confident that the have access to emergency services in the case of a health problem.

VitalBand leverages the recent advances in the sensor technology, allowing the users to monitor their vital signs and be linked through a mobile device and networked to multiple devices. With the rapid growth in this technology, the sensors and bio monitoring, in addition to the growth of wireless networking and wearable/mobile computing devices, the opportunity for growth in this area is evident.

Using the latest in wearable biometric technology, monitoring their heart rate, the body temperature and detecting a fall, coupled with a smartphone, VitalBand will offer a totally integrated solution. This solution is geared towards the senior citizen community to offer peace of mind to the family and friends that in an emergency they will be taken care of.

With the growing population of seniors, both in numbers and proportion, and the increasing choice of independent lifestyles – the resulting concerns associated with monitoring their health status is an emerging market offering enormous growth opportunities. The market of wearable medical monitoring devices is expected to be a $6 Billion industry by 2018.[viii] VitalBand will be first to market a self-contained active solution to provide the senior community quick, accurate, medical response in any situation no matter where they are located.

3 The Solution

The Vital Band solution is a rugged wristband that is worn 24 hours, containing motion and vital sign sensors. The wristband is linked to a smartphone that will contain an analytic software tool to monitor, detect, and quickly respond to the appropriate parties in case of an emergency. The proprietary developed health analytics software will be an application provided on the phone to monitor the vitals and physical movements of the individual. The application will be base-lined and customized to an individual's specific health and vitals. Upon detection of an anomaly (out of range readings) in physical movement and/or vitals being monitored, the app would initiate a distress call to a 24/7 emergency call center and provide notification to the family and friends.

3.1 Product Offer

The main product components we offer as our solution to the customers are a VitalBand, SmartVitalMobileApp and custom smartphone. Figure 6, briefly describes these components:

VitalBand	SmartVitalMobileApp	Smartphone
· Custom wristband with advanced sensors · Adjustable band worn either on left or right wrist · Bluetooth 4.0 (paired to custom smartphone) · Manual backup alert notification button · Estimated weight of wristband 35 grams (with sensors and manual button) · Waterproof (not submerged in water depth of +1 meter) · Rechargeable Battery · Physical design of the Band includes, senior friendly material, clasp, and color options For additional details, Refer to Appendix 1.1 (Vital Sign Levels) and Appendix 1.2 (Bluetooth Specification and Standards).	· Custom application installed on Smartphone. · User interfaces is specifically designed for senior friendly operations · Provides the monitoring, alerting and reporting capabilities using the built-in Smartphone features · A second backup manual alert notification button For additional details on features, refer to Appendix 1.4 (Software Application).	· Commercial off-the-shelf smartphones · Relaying alert messages to call center · 3G/4G Wireless Technology · Wi-Fi (a,b,g, and n) · Bluetooth 4.0 · Customized smartphone for the seniors. · Upload SmartVitalMobileApp for analytics monitoring and reporting. For additional details, refer to Appendix 1.2 (3G/4G and Wi-Fi Specification and Standards) and Appendix 1.3 (Pairing Procedures).

Figure 6: Customer Components

As part of the VitalBand solution, there are three infrastructure components that will also be available for the customers. The three components are the website, HIPAA Cloud, and a 24x7 Call Center. Figure 7, briefly describes these components,

Website	HIPAA Compliant Cloud	Call Center
Website VitalBand Log On — Username _____ Password _____	**HIPAA Compliant Cloud** Cloud	**Call Center**

Website

- · Create Account/Register User Information
- · Setup User Vital Signs Thresholds
- · Add Emergency Contacts
- · Add Physicians Contacts

For additional details, refer to Appendix 1.5 (Website)

HIPAA Compliant Cloud

- · Provides the medium to store and manage user's configuration data and historical vital data
- · Family/Friends and the 24x7 Call Center will have access
- · The user storage capacity in the Cloud will hold 5GB of data

Call Center

- · 24x7 Call Center
- · Call Center will be non-medical staff, and will NOT provide any medical diagnostic back to the user
- · Call Center will provide the following when receiving an alert notification
  - · First, contacts the user to verify their condition
  - · Second, if user needs medical assistance, will contact 911 for medical assistance and a Family/Friend

Figure 7: Infrastructure

3.2   How Our Product Works

Figure 8, describes how all the components described above (customer and infrastructure) are integrated together:
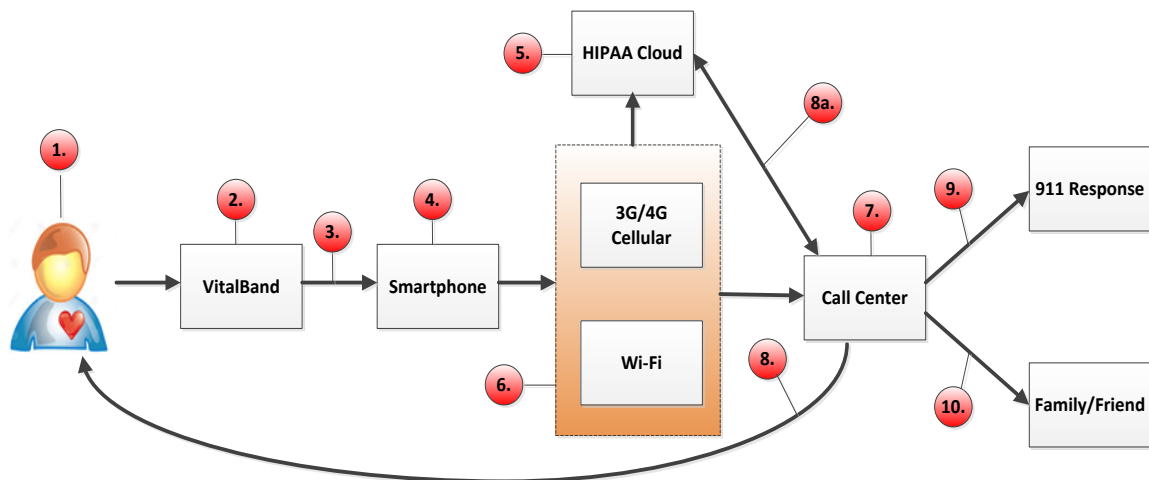
Figure 8: VitalBand Concept of Operation

1. User wears VitalBand on wrist (left or right).
2. VitalBand collects data (body temperature, heart rate, and motion).
3. The data collected from the VitalBand is transmitted to a custom smartphone via Bluetooth.
4. The SmartVitalMobileApp on the smartphone process the data and can also display a health status report.

5. The data collected from the SmartVitalMobileApp will be stored in the cloud via 3G/4G Cellular or Wi-Fi.
6. If a poor health reading is automatically detected, an alert message will be transmitted through the 3G/4G Cellular or Wi-Fi. Also, if a fall is detected, the smartphone GPS will be used to locate the user position.
    a. If the 3G/4G Cellular or Wi-Fi network is not available, a SMS will be used as backup feature to automatically transmit the alert message.
    b. Manual alert button on the wristband and or the SmartVitalMobileApp will be a backup feature for the user if there is not an automatic detection.
7. A 24x7 Call Center receives an alert message.
8. The Call Center will then contact the user to verify if medical assistance is needed.
    a. Also if needed, the Call Center has access to cloud to access user information/contact.
   b. If Call Center cannot reach the user, they will proceed with 9.
9. If medical assistance is needed, the Call Center will contact 911.
10. The Call Center will then contact a user's family/friend to notify them their love one was in need of medical assistance.

3.3   VitalBand Data Packet
The alert message data packet is illustrated in Figure 9. The three main segments of the data packet design are the header, payload and footer. In these segments, contain the following information (bits),

1. Header: protocol, destination address, sender address, and length of packet.
2. Payload: user's information.
    a. Name
    b. Location (Home Address and GPS coordinates)
    c. Time/Date
    d. Type of emergency (User fell or vital sign threshold out of range)
3. Footer: identify the end of packet, and error coding.

Figure 9: VitalBand Data Packet

3.4   VitalBand Functional Block Diagram
Figure 10 illustrates the functional block diagram for the VitalBand system.
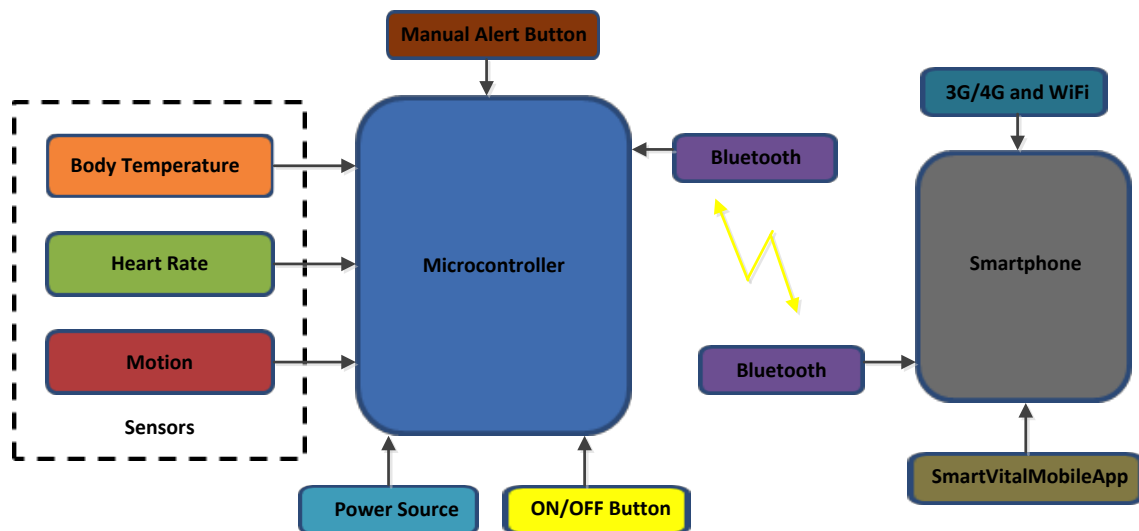
Figure 10: VitalBand Functional Block Diagram

3.5 Health Insurance Portability and Accountability Act of1996

The VitalBand system will store the user's personal information, and vital sign reports into a cloud infrastructure. This type of data will be protected under the Health Insurance Portability and Accountability Act of 1996 (HIPAA). This ensures the users data is well protected and cannot be used by another medical provider or anyone unless the user gives consent.

3.6 U.S Food and Drug Administration

The VitalBand system will not need the approval of the U.S Food and Drug Administration (FDA), since this device will be used to only track and report the user's vital signs, and detect falls. A medical diagnosis will not be available to the user on the SmartVitalMobileApp.

Also, during the process when the SmartVitalMobileApp automatically detects an issue in which an alert message is relayed to the Call Center, they will NOT provide any medical diagnosis. The Call Center staff will only be responsible for re-contacting the user to verify if medical attention is needed. If medical is needed, the Call Center will contact 911 and the designated Family and Friends.

3.7 Development Approach

During the development of the VitalBand Service we will work with several key partners to bring our value proposition to market. The manufacturer of the VitalBand monitoring wristband and the service provider for our cell phone option will be put in place during the early phases of development. The HIPPA compliant cloud provider will also be required early. The software development for SmartVitalMobileApp and the website will be outsourced to take advantage of the industry expertise and experience. VitalBand will structure the contract with the software development company to make sure we retain all rights to the analytic software to maintain our competitive advantage. Table 1 shows some potential companies for our product

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Product	Company	Description
Wristband	Goodwin (RFID) Technology Co. Ltd [ix]	Manufacture company in Shenzhen China, builds product in smart card, wristbands, tags, etc.
HIPAA Cloud Compliant	Box[x] Egnyte[xi] Symform[xii]	Based in Los Altos, CA Based in Mountain View, CA Based in Seattle Washington
Mobile APP and Website	Pathfinder[xiii] Proclaim Medical[xiv]	Based in Chicago, IL. Focus on medical software development and sensors. Based in Wilmington, NC. Focus on web design, and mobile apps for healthcare.

3.8 Redundancy Scenario Matrix

VitalBand data is collected and processed by three key components; VitalBand wristband, Mobile Device, and SmartVitalMobileApp. With any technology solution there is a potential risk of component and communication failure due to the technology limitations. The VitalBand solution will provide a smart detection and alerting capability in case of these failures. (Table 2), summarizes the redundancy scenarios between these major components, and the mitigation logic used in the solution to provide more reliable solution. Enquiry calls from 24x7 support center will be made directly to the customer followed by the call to the emergency point of contact.

Table 2 - Redundancy Scenario Matrix

	VitalBand Wristband	Comm. Link to Smartphone (Bluetooth)	Smart Vital Mobile Application	Comm. Link to Call Center (3G/4G or Wi-Fi)	Identification & Mitigation
1	Failed	Failed	Failed	Failed	This case is identified when there is no vital data communication. The mitigation for this scenario will be a direct enquiry call from the 24x7 support center.
2	Failed	Failed	Working	Working	This case is identified when there is no VitalBand data flow to the SmartVitalMobileApp. The mitigation for this scenario

					will be an audible alert from the Mobile phone, and followed by the direct enquiry call from 24x7 support center. In addition if the user falls, they can push the manual alert button on the app.
3	Failed	Working	Working	Working	Identification and mitigation logic will follow the scenario 2 logic.
4	Working	Failed	Failed	Working	This is identified in the VitalBand when it fails to reach the paired SmartVitalMobileApp. The mitigation for this scenario will be a vibration signal from the VitalBand, and followed by the direct enquiry call from 24x7 support center.
5	Working	Working	Failed	Working	Identification and mitigation logic will follow the scenario 4 logic. In addition if the user falls, they can push the manual alert button on the app.
6	Working	Failed	Working	Failed	This is identified in both VitalBand and SmartVitalMobileApp when there is no data flow. The mitigation for this scenario will be a vibration signal from the VitalBand, audible alert from the phone, and followed by the direct enquiry call from 24x7 support center.
7	Working	Working	Working	Failed	SMS will be used to transmit the alert message to the Call Center

4 Business Model

4.1 Value Proposition

The VitalBand value proposition of providing the user automated (24x7) detection and emergency response time, requiring no input from the Senior Citizens differentiates our solution from the rest of the market. "Alerts without Seniors Input" is the key VitalBand solution, along with our SmartVitalMobileApp analytical application. These provide both the Senior Citizen and their friends and family the peace of mind that they can get help where ever, whenever they may need it. In our automated health monitoring system, emergency alerts are triggered by continuously monitoring the vital signs of the seniors using the customized VitalBand wristband and the integrated SmartVitalMobileApp application. Once the emergency alert is triggered the cell phone sends a signal to our 24/7 manned emergency call center.

4.2 Service Options

VitalBand will position itself in the market as a service provider. The customer will be offered two service plans, both requiring a monthly subscription fee. Customers will also be required to pay a onetime upfront fee to purchase the monitoring wristband and if required the senior friendly smartphone. The two service plans offered will be our Base Service and Full Service. Both service plans allow the users access to the website, SmartVitalMobileApp, HIPPA compliant cloud storage, call center, and help desk. With the upgrade to the Full Service plan the customer will be provided a smartphone that has been ergonomically designed to incorporate the unique requirements of the senior citizen user. VitalBand will offer a selection of three different smartphone models for the customer to choose from and the SmartVitalMobileApp application will be

Features	Base Service	Full Service
VitalBand Monitoring Bracelet	✔	✔
Monthly Emergency Call Center Access	✔	✔
Monitoring and Emergency Dispatch Service	✔	✔
Notification Messages	✔	✔
Family & Friends Notification (max of 5)	✔	✔
SmartVitalMobileApp	✔	✔
Senior Friendly Smartphone with Unlimited Voice, Data and Text Message Service		✔

Figure 11: Service Features

installed prior to shipping. The full service plan will also provide the senior citizen a cell phone service plan to include unlimited voice, data and text messaging with no long-term contract. Our Base Service option will require that the customer have a Bluetooth enable smartphone to allow for the installation of our analytical software and communication with the monitoring wristband. VitalBand will not require a service contract or long-term commitment for our customers.

4.3 Pricing

The pricing of the VitalBand solution was evaluated and benchmarked to be competitive with the existing remote medical alert devices in the market. The VitalBand solution will be introduced into the market in phases to allow for local market penetration and product awareness. Each follow on phase will target a larger geographical market with the goal to launch to the entire country in the out years. During the early phases pricing will be subsidized allowing us to attract the users to the product and gaining market awareness. After product stabilization in the market the promotions/subsidized will be reduced and

the one-time equipment sales will add to the company's revenue stream. The primary revenue stream is the monthly subscriptions required. In support of our marketing and operation plan the pricing is in line with our three-phase roll out plan.   During the Northern Virginia Product Launch Phase VitalBand will be offering only the base service and be using qualified volunteers to provide real world data. We will not be charging these users during this 12-month phase, but will require them to start paying the monthly subscription if they chose to maintain the VitalBand Service. The following (Table 3) provides the pricing details by service for marketing phases where revenue is generated.

Table 3 - Pricing Details

Marketing Phase	Service Package	Pricing		Details
		Subscription/Month	Equipment Cost/Onetime	
Product Release DC Metro Area (18 Months)	Basic Service	$33	$64	➢ VitalBand with no Mobile Phone. ➢ Provides all the monitoring and alert features. ➢ VitalBand is given at discounted price.
	Full Service	$84	$86	➢ VitalBand with customized mobile phone for seniors and unlimited data, voice and SMS services. ➢ Provides all the monitoring and alert features. ➢ VitalBand and Mobile Phone is given at discounted price.
Product Release Mid-Atlantic Region (18 Months)	Basic Service	$33	$64	➢ VitalBand with no Mobile Phone. ➢ Provides all the monitoring and alert features. ➢ VitalBand is given at discounted price
	Full Service	$84	$127	➢ VitalBand with customized mobile phone for seniors and unlimited data, voice and SMS services. ➢ Provides all the monitoring and alert features. ➢ VitalBand and Mobile Phone is given at discounted price.

4.4 Differentiation

The existing products in the remote medical alert market are leveraging older technology and solutions. Products such as Life Alert, Life Station, Medical Guardian and Lifefone all require the user to wear a pushbutton device that communicates with a base station located in the users home. The limited communication range[2] between the push button and the base station restricts the usage to a limited area and does not address the needs of the aging but active population

In addition to the medical alert product we analyzed the fitness tracker market. The products such as FitBit, Nike FuelBand, and JawBone all use similar sensor technology but

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[2] No more than 1,000 feet with limited obstructions between user and base station

offer none of the services that VitalBand does. These products have no analytical software capability and in most case just track heart rate and daily movement geared towards healthy individuals looking to track their workout progress. The marketing of these products is to a completely different demographic.
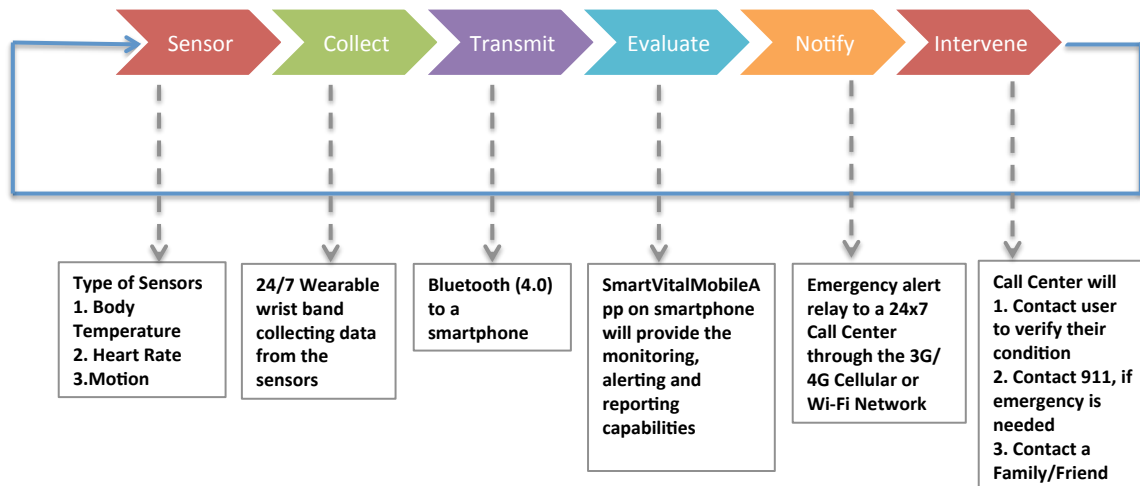
Sensor	Collect	Transmit	Evaluate	Notify	Intervene
Type of Sensors 1. Body Temperature 2. Heart Rate 3.Motion	24/7 Wearable wrist band collecting data from the sensors	Bluetooth (4.0) to a smartphone	SmartVitalMobileApp on smartphone will provide the monitoring, alerting and reporting capabilities	Emergency alert relay to a 24x7 Call Center through the 3G/ 4G Cellular or Wi-Fi Network	Call Center will 1. Contact user to verify their condition 2. Contact 911, if emergency is needed 3. Contact a Family/Friend

Figure 12 - Alert and Detection Cycle Details

Through our competitive analysis (addressed later) we see that the market for medical monitoring and alert devices is emerging with the advances in technology and there are many different products available. VitalBand will position our product to differentiate from the rest of the market by providing a unique total solution to address all of the elements of the alert and detection cycle (Figure 12).

5   Marketing Strategy and Sales Plan
5.1   Marketing Strategy
VitalBand is targeting the senior citizen health monitoring and alert service market. Our target market consists of senior citizens 65+ and their families living in the USA. The 2012 census shows that there are more than 43 million senior citizens currently living in this country.

VitalBand Target Market

➢ Families of seniors living alone
➢ Seniors living alone

Our marketing goals and objectives are to create product awareness and meet the sales target of 100,000 customers in 5 years. With this objective, VitalBand will utilize a three-phased marketing and rollout plan, focusing on the Northern Virginia local area first and ending with the Mid-Atlantic regional market. The approach for the marketing plan will be to reach senior citizens as well as their friends and family. After the fifth year and successful market penetration, we will expand to the east coast and beyond.
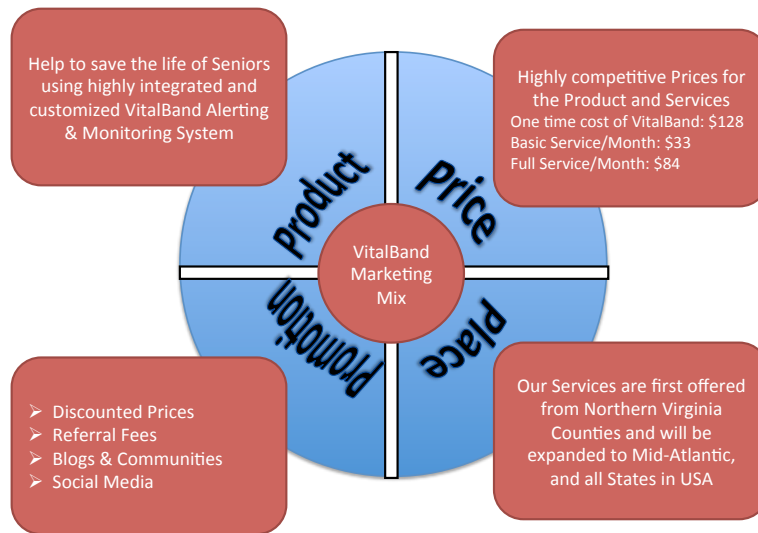
Table 4: VitalBand Marketing Mix based on McCarthy's 4 P's

To create product awareness and meet our sales goal, VitalBand will offer promotions that are flexible and can be tailored based on the progress made in marketing. Our key promotion will include heavily discounted prices for early customers.

5.2   Marketing Goals

To reach the goal of 100,000 customers within the first five years our initial roll out of our service, we will use a three-phase approach to marketing and sales. The three phases span five years, starting with the Northern Virginia counties, moving to the Washington DC Metropolitan area, and finally the Mid-Atlantic region. Figure 13 lists the sales expectations and goals for each marketing phase. Our sales goal is to promote the full service rather than the basic service so that we can realize maximum revenue/customer. After 5 years, we will reach out to the national market and create new sales targets based on business needs.

	Year-1	Year-2	Year-3	Year-4	Year-5	Year-6
Full Service	-	-	2,400	8,000	22,000	28,000
Base Service	-	1,000	6,400	19,000	56,100	72,000

Figure 13: Sales Expectation and Goals

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5.3   Target Segment & Sales

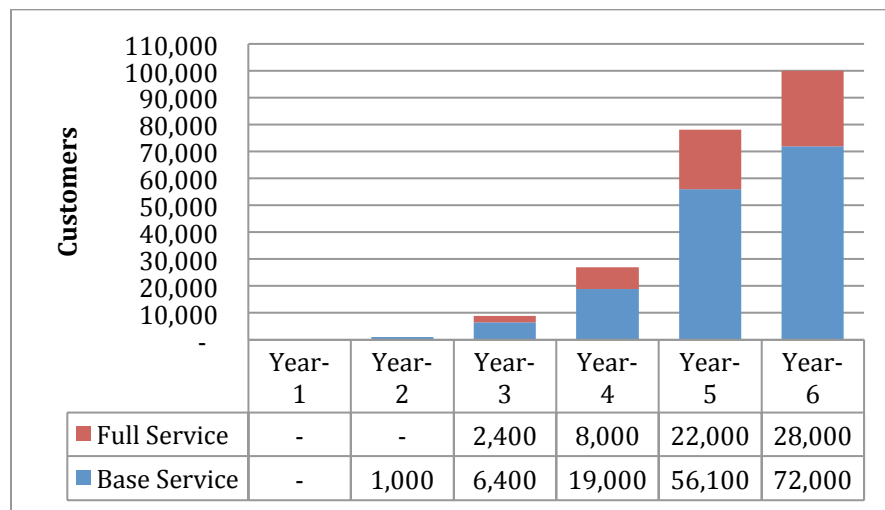The three-phase approach (plus Pilot Phase) will roll out to a small geographic area to allow for more focused local advertising techniques. After VitalBand acceptance within the local market area, we will move to the next phases, increasing the geographical size at each stage.

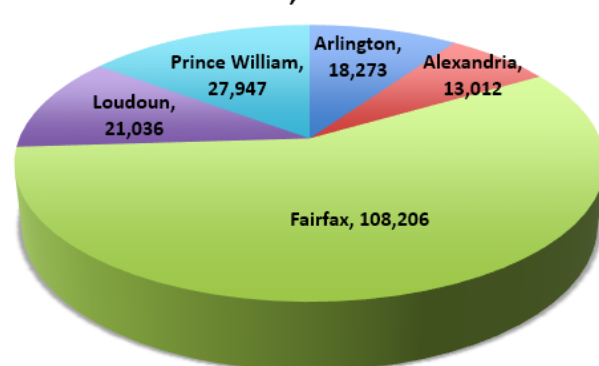### 5.3.1   Pilot Phase (12 Months)

The pilot phase is still considered part of R & D and testing, and there are no target marketing or sales goals. This phase will provide the VitalBand wristband and SmartVitalMobileApp to 25 friends and relatives of the founding team members. The 25-test subjects will be required to have a smartphone that is compatible with the VitalBand solution. During the pilot phase, product performance will be tested thoroughly and we will work to exceed the expectations of the VitalBand customers. A good working relationship will be created with VitalBand customers to use them as a success story in promoting the product for the subsequent marketing phases. We will also work on creating active social media groups using the pilot customers to promote the product.

5.3.2   Limited Product Launch Northern Virginia (12 Months)

The goal for this phase is 1,000 customers; to reach that, we will need to capture less than 1% of potential customers. For this time period, we will target several Northern Virginia counties including Arlington, Alexandria, Fairfax, Loudoun, and Prince William.

During this phase, we will provide VitalBand equipment and service for free to qualified senior citizens who have VitalBand-compatible smartphones. The marketing plan will be to offer the service and hardware for free to senior citizens that answer a short qualifying questionnaire. This will allow us an opportunity to evaluate and select the appropriate candidates. These candidates will use VitalBand and provide valuable feedback to help in the next phase of the product launch. The goal of this phase will be to make sure the VitalBand infrastructure is ready and can handle the expected future customer base.

Figure 14 - Zeigler Capital Investment Advice

Based on our analysis the best marketing channels to reach our customer goals in this phase will include targeting direct products and using social media campaigns. According to Ziegler capital investment statistics, trends in the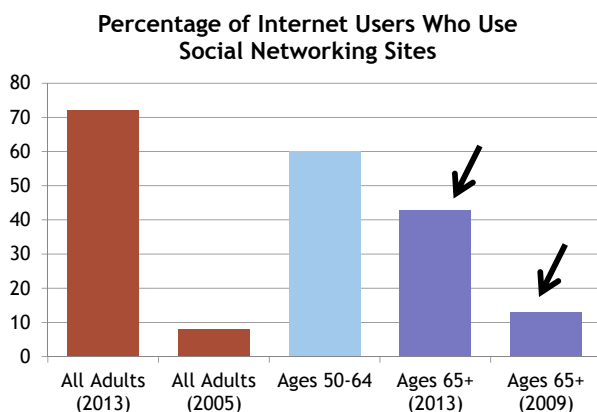 use of social media sites by seniors are growing rapidly. For example, in 2013, more than 40% of Internet users aged 65+ used social networking[xv]. This phase will continue to directly sell products through customer

recommendation strategy. Our targeted social media groups will be health monitoring groups, assisted living groups, and senior service groups. Part of this effort will include the creation of a new social media group called "Kids of Seniors in Assisted Living". At this time, we will finish building our social media presence from the success of the pilot testing.
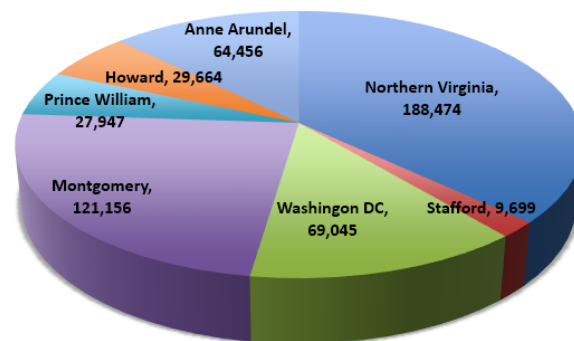
5.3.3 Product Release DC Metro Area (18 Months)

In this phase, our goal is to add an additional 26,000 VitalBand customers. We will target the Washington DC market, including Washington DC, Northern Virginia, Stafford County, Montgomery County, Prince George County, Howard County, and Ann Arundel County.[xvi] In this phase, we are looking for less than 6% of potential customers.

Before we arrive at this phase, we will have significant success in the Northern Virginia area, and more product awareness in the senior news and social media. In the area of social media, we will work hard to create product awareness and a strong reputation. We will increase our social media campaigns for seniors and their children using our own blogs. SeniorCareMarketer.com trends and statistics[xvii] show that more than 90% of sales leads for seniors come from Blogging.[3] In addition, since 60% come from magazines, we will also start a subscription campaign in the most important local magazines and newspapers:

65+ Population In Washington DC Metro 510,441

Anne Arundel, 64,456
Howard, 29,664
Prince William, 27,947
Northern Virginia, 188,474
Montgomery, 121,156
Washingon DC, 69,045
Stafford, 9,699

Magazines:	➢ Northern Virginia Magazine: Total Circulation: 150,000 + with an average of 92.1% of readers that are homeowners. ➢ Arlington Magazine: Total Copies: 25,000 +
Newspapers:	➢ Washington Post: Total circulation: 528,797 (Daily); 738,962 (Sunday) ➢ Express: Total circulation 179,118; (Monday through Friday)

5.3.4 Product Release Mid-Atlantic Region (18 Months)

An additional 73,000 customers, or less than 2% of potential customers in this geographical area, will be the goal for this phase. We will have our target market concentrated in the Mid-Atlantic region, which includes Delaware, District of Columbia, Maryland, New Jersey, Pennsylvania, Virginia, and West Virginia.[xviii]

In this phase, we will be in a position to introduce retail stores in addition to direct Internet sales. We will work only with selected retailers in promoting

65+ Population In Mid-Atlantic Region 5,638,020

West Virginia, 311,104
Delaware, 140,813
Washington DC, 69,045
Maryland, 762,681
Virginia, 1,062,133
New Jersey, 1,250,314
Pennsylvania, 2,041,930

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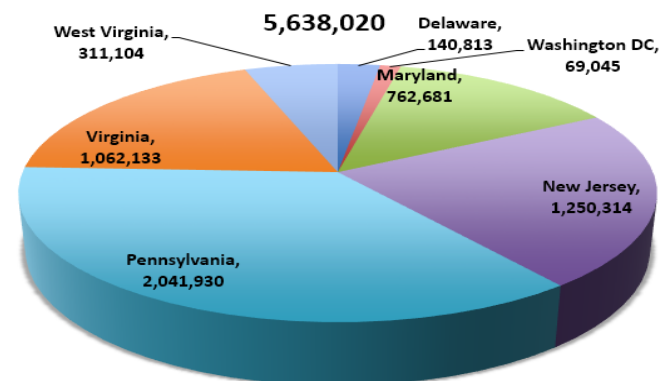
[3] See SeniorCareMarketer.com statistics and trends in the Appendix.

VitalBand products. We will also conduct live demonstrations every week in selected stores to continuously create brand and product awareness. We strongly believe that by following this marketing strategy and actively measuring the success of each marketing channel (Refer to Appendix 2.1 for details on channels), we will reach the 100,000-customer milestone in 5 years. In order to support this phase, we still continue our subscription campaign in magazines and newspapers, and with more than 70% of sales leads coming from online advertising[xix] we will increase our campaign in this channel as well.

| **Online Advertisement:** | ➢ We will focus on Google Ads and online magazines/newspapers by purchasing targeted keywords related to our product |

5.4 Competitive Analysis

The closest comparative market is that of the static emergency alert system. This is an emerging technology business in Mobile Health Monitoring, which is expected to increase in coming years. According to our analysis of the target market in Northern Virginia, we have a local advantage to promote high quality, localized supplemental health monitoring services in this area since similar services do not currently exist here. In the review of our competition, we identified the key functionalities of those providing similar but narrowed services to this market segment. (Table 5) The majority of the competing firms offer only one or two of these functional areas per firm.

Table 5: Competing Products and Services Matrix

Features	VitalBand	JitterBug	Bay Alarm Medical	Medical Guardian	Lifefone	LifeStation	Life Alert
24x7 Device Monitoring System	✔	✔		✔	✔	✔	✔
Vital Monitoring System	✔						
Personal Emergency Response	✔	✔	✔	✔	✔	✔	✔
Active Monitoring Wristband	✔						
Senior Friendly Mobile Phone	✔	✔					
Flexible Contract Terms	✔		✔	✔	✔	✔	✔
Activity Tracking & Sharing	✔						
Customizable Alert & Sharing	✔						
Automated Alert	✔						
Manual Alert	✔	✔	✔	✔	✔	✔	✔
Dual Automated/Manual Alert	✔						

VitalBand (Table 5) is offering the opportunity to use all of its key functions of solutions to differentiate our service from the competition. Using a variety of features and capabilities, a tiered pricing system has the potential to allow us to also be a price leader in this market space.

5.5 Product Evaluation and Purchase

To purchase the VitalBand services along with the required hardware, the customer will either order directly through our secure website or call the senior-friendly customer service representative. The customer service representatives will be specifically trained to accommodate the unique needs of the senior citizens. The website will show all of the

specific details for the products. This will include pictures of the monitoring wristband and all of the different cell phone models that will be offered. Screen shots for the cell phone applications will be shown to allow the customers to see the different features that our analytic software will offer. Customer testimonials will be available to be viewed and video demonstrations for product operation and setup will be included to allow potential customers the ability to fully evaluate the product and service.

Once the customer has ordered the VitalBand service, their order will be shipped to them through normal delivery channels – USPS/FedEx/UPS. Upon receipt of the product, a customer service representative will contact the new user to help with startup. This will include walking the new user through the customizable software; setting up the user account on the HIPPA certified cloud; and activating the "friends and family" call status. This allows the user to designate the order and priority of the people called during an emergency situation. This personal technical assistance will further differentiate us in the market, allowing VitalBand to cater to the senior citizen demographic and address their potential uneasiness with new technology.

Another important differentiator for VitalBand will be our total integrated service and value chain that is geared to the senior demographic. Each of our customer service representatives and technical support staff will be required to be trained in how to handle the special needs of the elderly demographic.

5.6   Marketing Budget

In Table 6, we will describe the entire budget that we are going to use in order to accomplish our goals in each phase. We distribute the budget according to all the expenses that we are going to have each year in the different channels as well as the staff that we are going to need. We also indicate the purpose and amount of each expense.

Table 6: Marketing Budget

Marketing Expense	Purpose	Year-2	Year-3	Year-4	Year-5	Year-6
Product Promotions	Discounts on equipment to promote Sales (Included in Operational Cost)	$89,940	$661,134	$2,143,819	$4,193,468	$2,030,000
Sales Staff	Support direct sales of VitalBand	$100,000	$200,000	$400,000	$500,000	$500,000
Marketing Manager	Oversight of marketing	$100,000	$120,000	$144,000	$172,800	$207,360
Magazines	Product awareness creation	$20,000	$50,000	$250,000	$250,000	$250,000
Newspapers	Product awareness creation	$20,000	$50,000	$250,000	$250,000	$250,000
Social Media	Product awareness and promotions by social media groups and customers	$40,000	$100,000	$500,000	$500,000	$500,000
Online Advertisement	Product awareness and promotions by the selected online partners	$40,000	$100,000	$500,000	$500,000	$500,000
Product Demonstrations	Helps the direct sales by providing more localized demonstrations in the community areas	$40,000	$100,000	$500,000	$500,000	$500,000
Total Marketing Expense		$449,940	$1,381,134	$4,687,819	$6,866,268	$4,737,360
Marketing Expense without Promotions		$360,000	$720,000	$2,544,000	$2,672,800	$2,707,360

6 Operations and Implementation

The operation and implementation of VitalBand will be broken down into five phases. This approach will allow the company to perform all of the required functions to become fully operational for product launch. With each phase comes different milestones and metrics that will be recorded for evaluation and allow for any adjustments in the product design or implementation before moving on to the next phase of operation. Figure 15 shows our performance management strategy. We will be actively measuring our performance in the area of Finance, Marketing, Customers, Operations, Product Development, and Suppliers.

Figure 15: VitalBand Performance Management Strategy

VitalBand is currently in Business Development Phase and has completed its Business Plan. The plan includes the information collected during the product research, marketing analysis, financial estimation and problem definition. The business plan lays out a comprehensive approach to taking the value proposition from our initial idea through the 5 phases, showing the profitability of the idea. At this point, funding will need to be secured to allow VitalBand to move on to Phase 1; product specification and development. Figure 16 shows the VitalBand timeline.
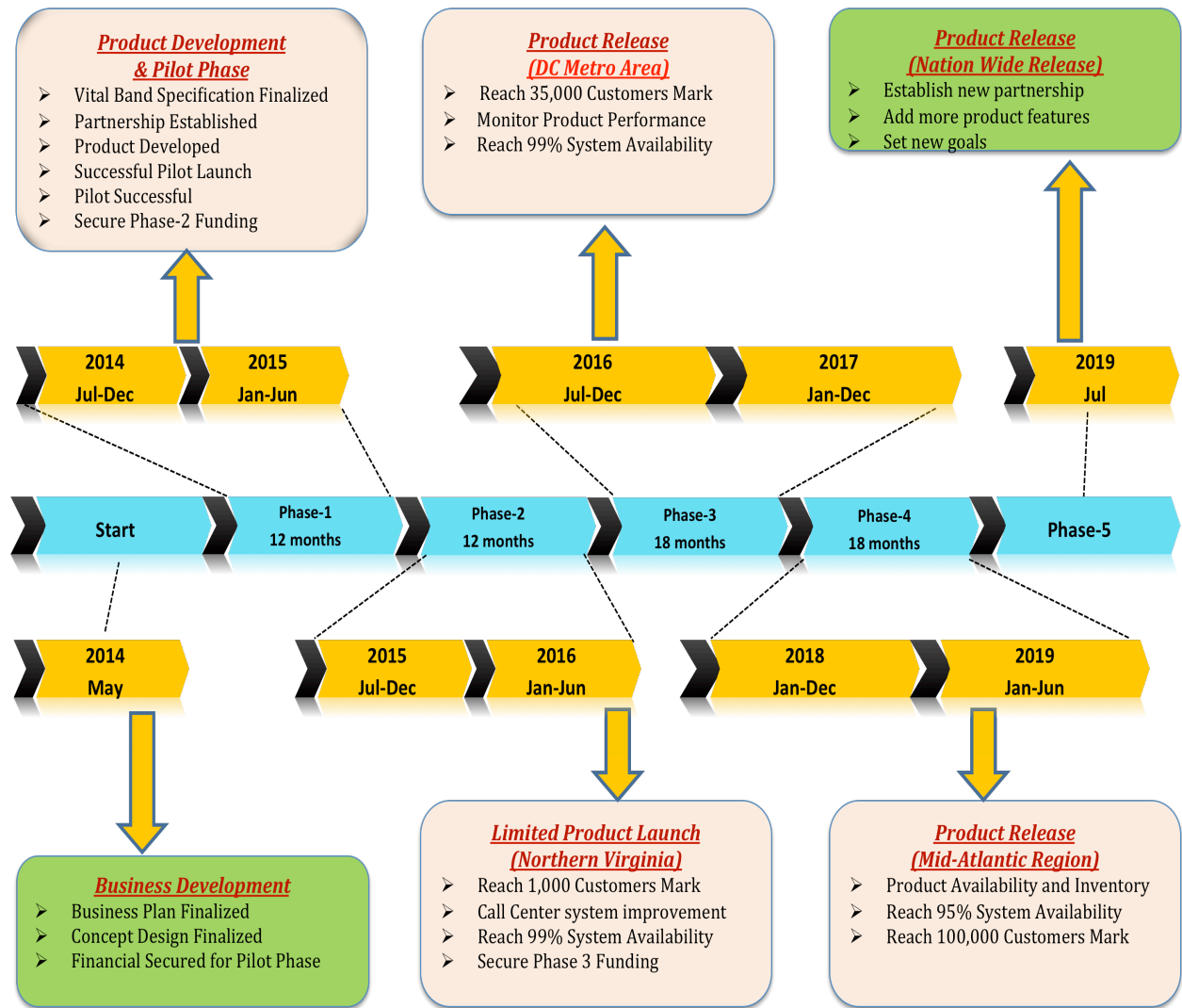
Product Development & Pilot Phase
- Vital Band Specification Finalized
- Partnership Established
- Product Developed
- Successful Pilot Launch
- Pilot Successful
- Secure Phase-2 Funding

Product Release (DC Metro Area)
- Reach 35,000 Customers Mark
- Monitor Product Performance
- Reach 99% System Availability

Product Release (Nation Wide Release)
- Establish new partnership
- Add more product features
- Set new goals

| 2014 Jul-Dec | 2015 Jan-Jun | 2016 Jul-Dec | 2017 Jan-Dec | 2019 Jul |

| Start | Phase-1 12 months | Phase-2 12 months | Phase-3 18 months | Phase-4 18 months | Phase-5 |

| 2014 May | 2015 Jul-Dec | 2016 Jan-Jun | 2018 Jan-Dec | 2019 Jan-Jun |

Business Development
- Business Plan Finalized
- Concept Design Finalized
- Financial Secured for Pilot Phase

Limited Product Launch (Northern Virginia)
- Reach 1,000 Customers Mark
- Call Center system improvement
- Reach 99% System Availability
- Secure Phase 3 Funding

Product Release (Mid-Atlantic Region)
- Product Availability and Inventory
- Reach 95% System Availability
- Reach 100,000 Customers Mark

Figure 16:VitalBand Operation and Implementation Timeline

6.1 Major Milestones

Operation Phase	Major Milestones
Phase-1: **Product Development & Pilot** **(12 Months)**	- Build SmartVitalMobileApp Application - Setting up Call Center - Website and Cloud - Staff Training - Secure Phase-2 Funding - Cell Phone/VitalBand communication - Vital Signs Data Transfer and Security - Address selected pilot testers Feedback

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Phase-2: **Limited Product Launch Northern Virginia Area** **(12 Months)**	➢ Meeting 90% of customer satisfaction ➢ Reach 93% System Availability ➢ 24/7 System availability ➢ Improve App UI ➢ Call Center system improvement ➢ Secure Phase-3 Funding
Phase-3: **Product Release DC Metro Area** **(18 Months)**	➢ Reach 93% Customer Satisfaction Mark ➢ Reach 99% System Availability ➢ Reach 35,000 Customers Mark ➢ Monitor Product Performance
Phase-4: **Product Release Mid-Atlantic Region** **(18 Months)**	➢ Reach 93% Customer Satisfaction Mark ➢ Reach 99% System Availability ➢ Add more Application Features ➢ Provide statistical data reports on user health monitoring and accidents. ➢ Reach 100,000 Customers Mark ➢ Monitor Product Performance ➢ Monitor Website traffic and Online product purchasing ➢ Ability to run reports and analyze customer data over a certain period
Phase 5: **Product Release Nation Wide**	➢ Expand Marketing campaign to cover all US ➢ Keep monitoring and improving our system and device. ➢ Use WiGig alternative communications solution to improve the performance ➢ Add Call Center medical staff to help provide medical assist users. ➢ Add more product features ➢ Investigate into other advance sensor to integrate into our product

6.2   Phase 1 - Product Development and Pilot

In this phase, our team will work on design of the hardware, software and finalizing all of the required business partnerships. This phase is divided into two main areas, product development and pilot testing. Each section is focused on developing all the requirements for the VitalBand. After the product development stage, which will include both software and hardware, we will start the pilot launch as a test for our product. The pilot will include 25 prototype VitalBands assigned to pre-qualified selected seniors, who will provide us with their feedback for the product usage. The benefit of this stage will be the feedback and will allow for modifications in the product or service before the next phase of the role out.

Software Development Activities will include:

➢ Development of our SmartVitalMobileApp Application for both Apple and Android Mobile phone operating system
➢ Design of the user interface geared towards senior citizens, i.e., larger type, simple directions
➢ Design and launch of the VitalBand website. This will be integrated and allow for access with the HIPPA certified cloud storage.
➢ Testing and Debugging of all analytic software

Hardware Development Activities will include:

➢ Technical specification development for the monitoring wristband device
➢ Technical specification development for the cell phone. This phone will be developed to support Senior Citizen requirements

Business Operation Activities will include:

➢ Quality assurance plan will be developed to oversee the development of the hardware and software
➢ Cloud storage contract finalized – HIPPA Compliant
➢ Network security plan developed
➢ Partnership Established with Vital Band manufacture and Cell phone providers
➢ Call Center will be outlined and plans put in place to launch upon the execution of Phase 2. This will include the preparation of training plans and call center site lease agreements
➢ Place order for first 25 prototype VitalBand monitoring bands to be used for the pilot test
➢ Partnership agreements with the cell phone and wrist band manufacturers to be put in place and finalized

Pilot Activities include

➢ Distribution of the 25-prototype VitalBand monitoring bands. These bands will be distributed for free in select pre-qualified senior (friends and family) for testing purposes. Testing will be for the following specifications:
    1. Measurement for the three Vital Signs (Temperature, Heart rate, and Fall detection)
    2. SmartVitalMobileApp Application
    3. User Profile
    4. Bluetooth/Cell Phone/ wireless communications
    5. Company website
    6. Cloud storage and security
➢ Collection of Customer Feedback. This will be feed back to the development personnel for any required design modification
➢ Call Center staff will also give us a feedback on how they were handling calls and what are their recommendations for our product. They will also give us feedback on outcome of calls and time required for taking actions
➢ Final Marketing and Sales plan will be developed and ready for execution

Upon completion of all the requirements and successfully meeting all of the major milestones for this Phase we will secure the next round of required funding and launch Phase 2.

6.3 Phase 2 Limited Product Launch

Phase 2 will move VitalBand into the limited launch phase, focusing on the Northern Virginia area. The phase will complete the following tasks:

- ➢ Target through our marketing and sales plan at least 1,000 customers
- ➢ Monitor performance and usage rate of website and call center
- ➢ Request and analyze customer feedback. Feedback will be through the company website. Customer feedback will also be solicited through the call center. Provide feedback to the design personnel to allow for any required modifications
- ➢ Performance metrics will be customer satisfaction and the goal will be 90%
- ➢ All metrics will be monitored and reported on a monthly basis unless they are below the required threshold
- ➢ 93% System Availability will be the minimum goal

From this Phase we will secure our last round of external funding and be able to move to Phase 3 and expand our target market.

6.4 Phase 3 Product Release (DC Metro area)

Moving forward on our marketing strategy, Phase 3 will launch VitalBand into a larger market to cover the DC Metro area and include the following activities:

- ➢ Target through our marketing and sales plan at least 35,000 customers
- ➢ Monitor performance and usage rate of website and call center
- ➢ Request and analyze customer feedback. Feedback will be through the company website. Customer feedback will also be solicited through the call center. Provide feedback to the design personnel to allow for any required modifications
- ➢ Performance metrics will be customer satisfaction and the goal will be 93%
- ➢ 99% System Availability will be the minimum goal
- ➢ All metrics will be monitored and reported on a monthly basis unless they are below the required threshold
- ➢ Monitor and plan for call center expansion as more customers are gained

With the company generating revenue at this time, no additional funding will be required and at the conclusion of the successful penetration in this area we will move on to phase 4.

6.5 Phase 4 Product Release (Mid-Atlantic Region)

Moving forward on our marketing strategy, Phase 4 will launch VitalBand into a larger market to cover the Mid-Atlantic Region area and include the following activities:

- ➢ Target through our marketing and sales plan at least 100,000 customers
- ➢ Monitor the effectiveness, performance and usage rate of website and call center and get them ready to handle larger volume of requests and calls
- ➢ Request and analyze customer feedback. Provide feedback to the design personnel to allow for any required modifications
- ➢ Performance metrics will be customer satisfaction and the goal will be 93%.
- ➢ 99% System Availability will be the minimum goal

- ➤ All metrics will be monitored and reported on a monthly basis unless they are below the required threshold
- ➤ Monitor and plan for call center expansion as more customers are gained

This will lead us to request our last fund for phase 5 from the venture capital.

6.6   Phase 5 (Nation Wide Release)
To continue to provide a reliable product and add new services, we are looking to explore the following areas:

- ➤ Nation Wide Release
- ➤ Establish new partnership
- ➤ In our first release of our product, with the 24/7 Call Center not having non-medical staff, later we would like to have medical staff to help provide medical assist users.
- ➤ Investigate into other advance sensor to integrate into our product offer more services. For example, Massachusetts Institute of Technology (MIT) has recently successfully developed and demonstrated a climate control wristband prototype. [xx]
- ➤ Provide statistical data reports on user health monitoring and accidents.
- ➤ WiGig (60GHz) is a new wireless technology that is expected to be release in the market (~2014) for short-range communications. This could be an alternative communications solution to improve the performance (data speeds).[xxi]

6.7   Operation Budget:
Our Management team will take control of a number of activities in order to run and manage the business. These are detailed and included below

Start Up and Organization Activities

Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Website, Cloud, Mobil App	$500,000	$100,000	$100,000	$100,000	$100,000	$100,000
Technical Specification for wristband manufacturer	$25,000	$15,000	$15,000	$10,000	$10,000	$5,000
Network, Servers, software and other tools	$10,000	$10,000	$12,000	$12,800	$13,000	$14,000
Management, Accounting, Call Center, office and IT staff	$750,000	$1,150,000	$1,750,000	$2,350,000	$2,900,000	$2,900,000
Office lease, Phone exp., office supply,	$75,000	$75,000	$100,000	$125,000	$150,000	$160,000
Company lawyer, Company registration	$12,000	$12,000	$10,000	$10,000	$10,000	$10,000
Total	$1,372,000	$1,362,000	$1,987,000	$2,607,800	$3,183,000	$3,189,000

Staffing Headcount

Year/ Staff Description	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
Management and Operation staff	5	7	10	10	11	11
Office Staff	3	5	8	12	15	15
Software Developers	2	7	10	10	12	12
Call Center Staff	5	4	7	15	20	20
Total	15	23	35	47	58	58

6.8   Management Team

Leading our product from concept design to full market launch will be a dedicated team of highly experience individuals. Below is a brief look at the management team for VitalBand with their experience.

- ➢ Dan Cluxton (CEO)
- ➢ Alton Arredondo (CTO)
- ➢ Vijay Reddiar (CFO)
- ➢ Zaid Salbi (COO)
- ➢ Marco Vargas (CMO)

7   Risk Management Plan

Since there are many external risks associated with the VitalBand business, we took the iterative approach for managing the risk. In the first phase, we identified the overall strategy risks and operational risks that will seriously affect the investor confidence. We provided the appropriate risk mitigation strategies to manage these risks and make the VitalBand business successful. In the next risk management phase, we will include all the stakeholders and create a detail risk management plan that addresses both internal and external threats. The following list summarizes the key risks and the mitigation strategy for the first risk management phase. The VitalBand Risk Register in the Appendix provides a detailed risk register, which will be further refined after the product launch.

➢   **Risk1: Product does not meet the customer expectation** We will reduce the financial risks by initiating the pilot phase, followed by limited product release. During this period only necessary staff will be hired and the cost of operation will be kept under control.
➢   **Risk2: Cannot secure subsequent funding timely** We will reduce the financial risks by cutting down the customer acquisition expectations and reducing the operational cost.
➢   **Risk3: Cannot meet the customer acquisition goals** We will reduce the financial risk by going from smaller target market segment to larger market segment. Operation cost will be gradually increased based on the customer acquisitions.
➢   **Risk4: Risk from competitors** This risk cannot be fully mitigated. We will focus on improving the operational efficiency to cut down the financial losses.

> ➤ **Risk5: Customer living environment is not suitable for the solution**
> We will reduce to getting exposed to this risk by clearly communicating the product requirements and limitations to the customers before the sale. We won't sell our solution if the living environment is not suitable for the VitalBand solution. In some cases, we will provide guidance to improve the living environment for the potential customers.

> ➤ **Risk6: Infrastructure Performance Problem**
> We will mitigate this risk by selecting the reliable partners for the products and services. We will also implement pro-active monitoring solutions to actively monitor performance risks.

> ➤ **Risk7: Customer Privacy and Information Security Risk**
> We will mitigate this risk by selecting the HIPPA compliant cloud partner to manage the customers PII and health data. We will also implement pro-active monitoring solutions to actively monitor security risks.

8   Financials

Our financial projections focus on building a profitable health monitoring and alert business, particularly tailored for senior citizen needs. Since this is an emerging business with more technology turnarounds, efforts are made to get the accurate current benchmark prices on the needed technology. "Appendix 3.1-Selected Financial Statements and Benchmark Data" provides the details in arriving at these numbers.

8.1   Financial Assumptions

Our business model makes the significant financial assumptions (Table 7) in order to achieve the profitable health monitoring and alert business. All the assumptions are derived based on the detailed market analysis, and achievable milestones in the operational efficiency over the period of five years.

Table 7: Financial Assumptions

Financial Assumptions	Values
Expected Investment	$5 Million
Discount Rate / Investment Rate	20%
Expected Customer Base in 5 Years	100,000
Cost of Vital Band	$89.94
Cost of Smartphone	$253.75
Full Service Subscription Revenue Per Customer / Month	$83.79
Base Service Subscription Revenue Per Customer / Month	$32.54
Full Service Operational Cost Per Customer / Year	$200
Base Service Operational Cost Per Customer / Year	$150
Operational Cost Overhead Factor (Adjusted for each year)	Between 100%-200%
Equipment Promotional Discounts (Adjusted for each year)	Between 40%-100%

8.2 Expense Forecast

VitalBand will apply this funding to begin development, marketing, business operations, product promotions, and overhead expenses. Based on our plan for each of these areas, we are able to derive accurate estimates of expenses (Figure 17). These expenses shift distribution over a forecast of six years. The largest area of expense increase is in promoting the products and overhead expenses. This increases account for the number of customers we are expecting to have in 6 years. Overhead expenses are calculated per customer for the unexpected support works. Also promotional expenses are separately tracked to provide more control over marketing expenses.
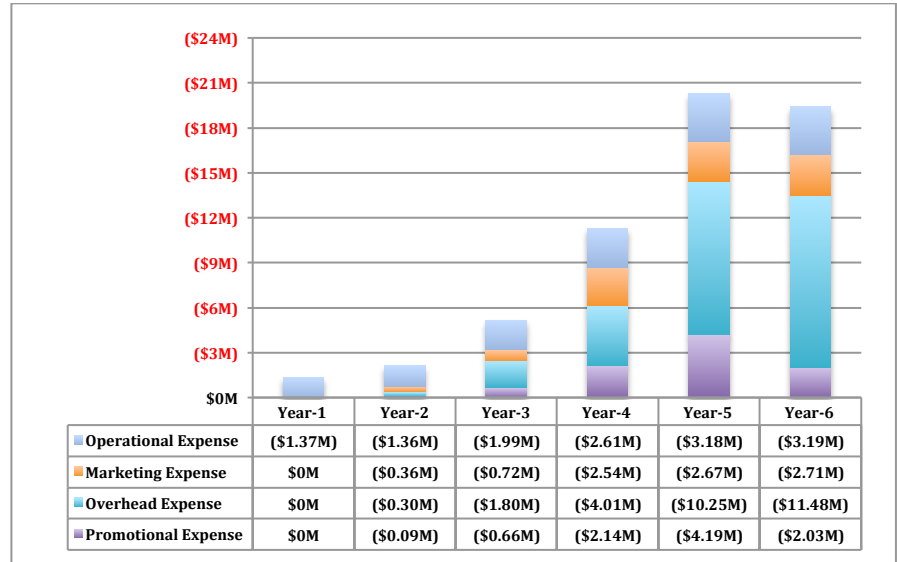
	Year-1	Year-2	Year-3	Year-4	Year-5	Year-6
■ Operational Expense	($1.37M)	($1.36M)	($1.99M)	($2.61M)	($3.18M)	($3.19M)
■ Marketing Expense	$0M	($0.36M)	($0.72M)	($2.54M)	($2.67M)	($2.71M)
■ Overhead Expense	$0M	($0.30M)	($1.80M)	($4.01M)	($10.25M)	($11.48M)
■ Promotional Expense	$0M	($0.09M)	($0.66M)	($2.14M)	($4.19M)	($2.03M)

Figure 17: Annual Expenses by Area

8.3 Revenue Forecast

VitalBand subscription and product sale revenue forecast (Figure 18) is based on expected number of base and full service customers. This is calculated based on our pricing strategy and the customer acquisition rate. For the first 2 years, we are not making any revenue because of the product development, product pilot and zero-cost promotions. From year-3, we will be making revenue and our revenue will be sufficient to meet the expenses from year-4+. A complete breakdown of revenues from product sales and subscription service is available in (Appendix 3.1-Financial).
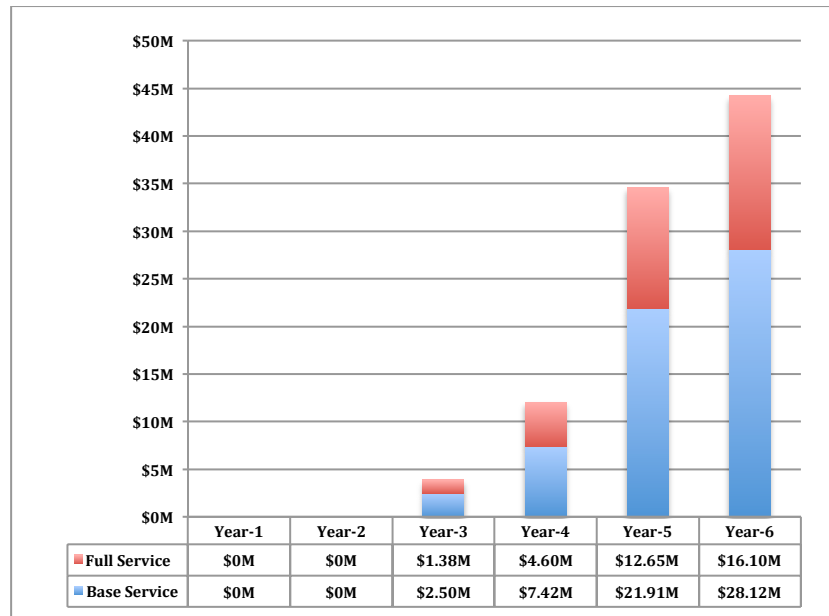
	Year-1	Year-2	Year-3	Year-4	Year-5	Year-6
■ Full Service	$0M	$0M	$1.38M	$4.60M	$12.65M	$16.10M
■ Base Service	$0M	$0M	$2.50M	$7.42M	$21.91M	$28.12M

Figure 18: Revenue from VitalBand Services

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8.4 NPV, IRR, Revenue, Expenses

Based on our revenue and expense forecast, VitalBand will show a positive cash flow in Year-4 (Figure 19). From Year-5 with the significant increase in revenue, our business makes positive NPV at 20% discount rate. Our IRR at Year-5 will be 45%, generating a net cash flow of 14.25 Million. It will reach 78% at Year-6 making a net cash flow of $24.81 Million. Most of the revenue comes from the customer monthly subscription charges. Check (Appendix 3.1-Financial) for further details.
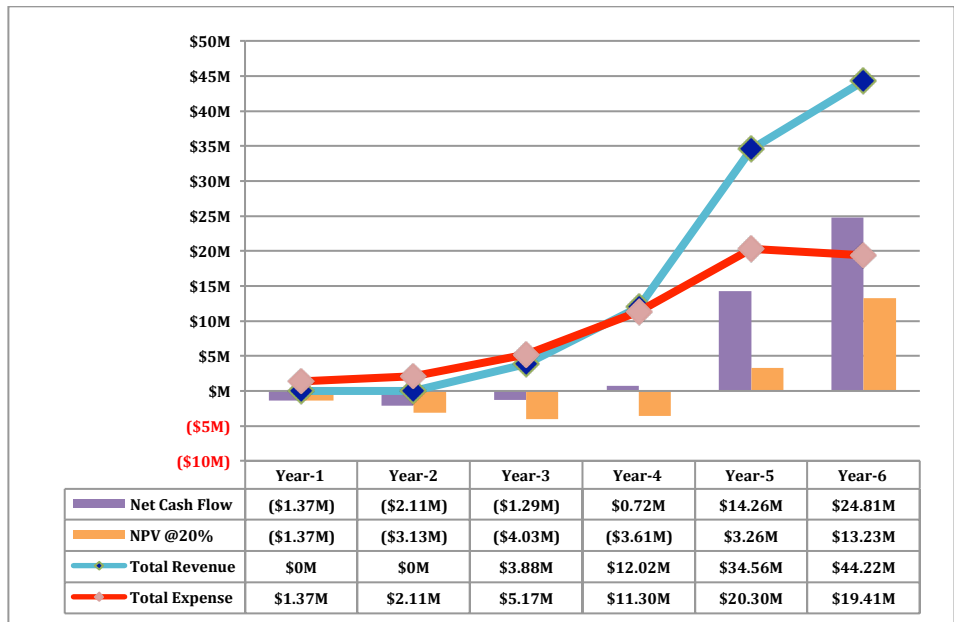

	Year-1	Year-2	Year-3	Year-4	Year-5	Year-6
Net Cash Flow	($1.37M)	($2.11M)	($1.29M)	$0.72M	$14.26M	$24.81M
NPV @20%	($1.37M)	($3.13M)	($4.03M)	($3.61M)	$3.26M	$13.23M
Total Revenue	$0M	$0M	$3.88M	$12.02M	$34.56M	$44.22M
Total Expense	$1.37M	$2.11M	$5.17M	$11.30M	$20.30M	$19.41M

Figure 19: NPV, Revenue, Expenses

IRR and NPV at 20% discount rate in Year-6

IRR	NPV@20%
78%	13.23 Million

8.5 Investment/Funding Requirements

To make VitalBand business successful, we are looking for 3 rounds of yearly investments with a total of $5 Million. From the fourth year, we will have a sufficient cash flow to support the business and expand the customer base.

➢ In year 1 of the business operation, we need $1.4 Million for product development and pilot initiatives.
➢ In year 2 of the business operation, we need $2.1 Million to attract the customer base and stabilize the reliable infrastructure.
➢ In year 3, we need additional $1.5 Million to expand the customer base and increase the capacity of the infrastructure.
➢ From year 4, we will not need any additional capital to successfully operate the business, making significant revenue for the investors.
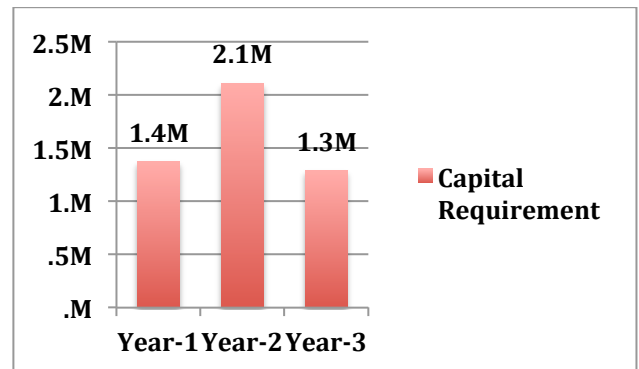

Figure 20: Investment / Funding Requirements

8.6 Exit Strategies

There are many yearly milestones that need to be met to continue the business. If any of the milestones are not met then the executive board members can decide to close the business to cut the financial losses. In minimum, it requires 3.5 Million dollars and 3-year timeframe to clearly identify any greater risks in the business.

9 References

i "Projections of Future Growth of the Older Population." Accessed March 27, 2014.
http://www.aoa.gov/Aging_Statistics/future_growth/future_growth.aspx.

ii "A Profile of Older Americans: 2011," n.d.
http://www.aoa.gov/Aging_Statistics/Profile/2011/docs/2011profile.pdf.

iii "Http://www.cdc.gov/nchs/data/databriefs/db38_tables.pdf," n.d.

iv "CDC - Older Adult Falls - Falls Among Older Adults: An Overview - Home and Recreational Safety - Injury Center." Accessed April 17, 2014.
http://www.cdc.gov/homeandrecreationalsafety/falls/adultfalls.html.

v "CDC - Older Adult Falls - Falls Among Older Adults: An Overview - Home and Recreational Safety - Injury Center." Accessed April 17, 2014.
http://www.cdc.gov/homeandrecreationalsafety/falls/adultfalls.html.

vi "Heart Disease: The Cost of Medical Bills and Disability." Accessed March 30, 2014.
http://www.webmd.com/healthy-aging/features/heart-disease-medical-costs.

vii THOMAS H BLACKWELL, and JAY S. KAUFMAN, PHD. "Response Time Effectiveness: Comparison of Response Time and Survival in an Urban Emergency Medical Services System." ACADEMIC EMERGENCY MEDICINE, April 9, 2002.
http://onlinelibrary.wiley.com/store/10.1197/aemj.9.4.288/asset/aemj.9.4.288.pdf;jsessionid=D9686704BDD7623E90F516A9859C18CE.f04t02?v=1&t=hu4bdhre&s=610831f72e420614cb17cd3164bf68b919230da8.

viii "Led by the Sports, Fitness, and Wellness Segment, Wearable Wireless Device Revenues to Exceed $6 Billion in 2018." Accessed April 17, 2014. https://www.abiresearch.com/press/led-by-the-sports-fitness-and-wellness-segment-wea.

ix "Shenzhen GoodWin (RFID) Technology Co., Ltd." 2014. Accessed April 17.
http://www.gwrfid.com/sz/en/aboutus.aspx?Aid=6.

x "Box | Secure Content-sharing That Users and IT Love and Adopt." 2014. Accessed April 17.
https://www.box.com/.

xi "Egnyte Enterprise File Sharing." 2014. Accessed April 17. http://www.egnyte.com/.

xii "Cloud Storage Pricing | Cloud Storage Cost | Symform." 2014. Accessed April 17. http://www.symform.com/plans-pricing/.

xiii "Medical Software Development | Pathfinder Software." 2014. Accessed April 17. http://pathfindersoftware.com/medical-software-development-4/.

xiv "Proclaim Medical - Web Site Design, Search Engine Optimization, Interactive Communication." 2014. Accessed April 17. http://www.proclaimmedical.com/.

xv 130925_2_State of Senior Living_Handout.pdf." 2014. Accessed April 17.http://eziegler.com/Files/130925_2_State%20of%20Senior%20Living_Handout.pdf

xvi Bureau, U. S. Census. 2014. "American FactFinder - Results." Accessed April 18. http://factfinder2.census.gov/faces/tableservices/jsf/pages/productview.xhtml?pid=ACS_12_1YR_S0103&prodType=table.

xvii SeniorCareMarketer_Report.pdf." 2014. Accessed April 17.http://www.seniorcaremarketer.com/SeniorCareMarketer_Report.pdf

xviii Bureau, U. S. Census. 2014. "American FactFinder - Results." Accessed April 18. http://factfinder2.census.gov/faces/tableservices/jsf/pages/productview.xhtml?pid=ACS_12_1YR_S0103&prodType=table.

xix SeniorCareMarketer_Report.pdf." 2014. Accessed April 17.http://www.seniorcaremarketer.com/SeniorCareMarketer_Report.pdf

xx "'Cool' Invention Wins First Place at MADMEC | MIT News Office." 2014. Accessed April 18. http://newsoffice.mit.edu/2013/madmec-design-competition-1017.

xxi "WiGig CERTIFIED | Wi-Fi Alliance." 2014. Accessed April 18. http://www.wi-fi.org/discover-wi-fi/wigig-certified.