A Thorough Analysis of the Technical and Business Requirements for Cyber Security Startup Management

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Abstract:- The last few years have been a witness to an exponential growth in cyberattacks on various organizations, multinational companies, banks, corporate sector, banking and commerce, government, healthcare etc. Furthermore, there is an ever-growing shortage of skilled, competent and experienced cyber security professionals. According to a recent report, there will be a predicted global shortfall of 3.5 million cyber security jobs by 2021. Consequently, several cyber security startups are now picking up rapidly and with efficient employment of Machine Learning, Artificial Intelligence, Blockchain and IOT, are redefining how the world views cyber security.

I. INTRODUCTION

The disparate domains which are in urgent need for a proper framework and technological and business solutions to curb the threats they face on a daily basis are corporates, multinational organizations, military infrastructure, voting infrastructure, telecommunications, healthcare, government organizations, internet and cloud based services, e-banking, law firms, social networking sites , schools, universities, banking and commerce sector, political and business leaders, celebrities. Cyber security is getting more sophisticated day by day, with attackers employing a variety of advanced tools, techniques and exploits to cause immense damage to the technical infrastructure and reputation, not to mention exposing the customers' sensitive data. Furthermore, it has become difficult to incorporate cyber security in the entire project development cycle. The culprits in this regard are primarily budget constraints, strict deadlines, and a lack of awareness regarding this field. Therefore, multinational corporations and organizations prefer to outsource their cyber security needs to specialized companies and professionals. Consequently, we have seen a rise in cyber security related startups, with the most competent and latest ones employing

groundbreaking technology like Machine Learning, Artificial Intelligence, Blockchain, IOT etc. We will explore the technical as well as business requirements, strategy, technical specializations, possible investors, and scope of such a startup in detail.

II. AREAS AND SPECIALISATIONS TO FOCUS ON

- Firewall, antivirus, anti-malware
- Cloud security
- Database decentralization
- Risk management
- Web application security and penetration testing (OWASP)
- Network security
- Ransomware
- Block chain
- Cryptocurrency
- IOT security
- Cryptography

A. COMPETITION/RIVALRY

Competition depends on the area of specialization and the concept of security provided as solution. Regardless of the area of specialization, the product has to be unique and much more effective than other competitors to succeed in this business. The number of security startups is on the rise, but the bright side is many technological giants are more than eager to support and fund startups with realistic and practical solutions to the current problems.

B. CHALLENGES FACING CYBER SECURITY STARTUPS

- For a cyber sec startup to succeed, the technical should be very competent and well versed in the latest types of attacks and development, and the latest possible and affordable solutions. Management should be very strong as well and should be able to convey effectively the importance of secure infrastructure to their clients.
- The product should give solutions to the latest problems in the security world to defend against the most recent types of attacks, and should be able to predict and adopt according to the rapidly changing and volatile trends when it comes to organized cybercrime. Many a times

startups come up with solutions to attacks which are no longer prominent or which are no longer practical due to unpredictable scenarios.
➤ Needless to say, the product should be different and much better than the competitors.
➤ Also, the solutions should be such that the companies are unable to adopt the said solution on their own and hence have a need to invest in the startup.

C. ECONOMIC/BUSINESS ANALYSIS

The key to success for a cyber security startup is staying up to date with the latest trends, technologies, and types of attacks. The team should periodically do a thorough analysis of the recent attacks, the infrastructure vulnerabilities of the victims, the technical as well as economic reasons for the said vulnerabilities in their infrastructure, the gaps in their risk management frameworks and policies, amount of money invested in security prior to attack, the possible solutions to improve infrastructure , proper analysis of their revenue and business model to propose and a financially feasible investment in security.

Also, to really keep ahead of the race, the team should also carry out a periodical and thorough analysis of the funding, infrastructure and technology available for cyber criminals as well as the level of organization, and motives.

D. INVESTMENT

➤ Self-funding
➤ Angel investors, venture capital
➤ Pitching ideas to donor organizations
➤ Loans and selling shares

E. CHOOSING APPROPRIATE LOCATION

➤ Conduct a thorough analysis of the availability of clients before you choose a location
➤ Also, get accurate estimates of the investment which the clients are willing to make
➤ The competitors and as their success or even failures, and reasons for each
➤ Policies, laws, rules and regulations

F. INFRASTRUCTURAL REQUIREMENTS

Adequate investment must be made to obtain proper equipment, - computers systems, servers, routers, software, firewalls, database which should be able to process large amounts of data, telephone, fax machine, office furniture etc.

All the above requirements should be kept in mind before renting or leasing an office space.

G. TEAM ASSEMBLY

The team should be diverse and from different backgrounds. The skills needed are =>

➤ certified security experts,
➤ software developers
➤ database administrators
➤ Security analyst,
➤ risk analyst,
➤ HR manager,
➤ marketing and Sales executive,
➤ business/marketing analyst,
➤ accountants

H. MARKETING

➤ The business needs to be advertised to all the clients - corporates, multinational organizations, military infrastructure, voting infrastructure, telecommunications, healthcare, government organizations, internet and cloud-based services, e-banking, law firms, social networking sites, schools, universities, banking and commerce sector etc.
➤ Advertising can be done through internet, ICT magazines, radio stations, TV stations, talk shows, seminars, workshops, conferences etc.
➤ Marketing executives and business developers should be able to carry out direct marketing
➤ Work according to the client's budget.
➤ YouTube, Facebook, Instagram, Twitter, LinkedIn etc.
➤ Position banners and bill boards at appropriate and strategic positions.
➤ Advertise the product via the official website and employ the latest marketing techniques to pull more clients.
➤ Fliers and handbills can also be employed and distributed accordingly.

I. AREAS TO FOCUS ON TO STAY ONE STEP AHEAD OF THE COMPETITION

➤ Implement solutions keeping in mind the client's budget, infrastructure and security threat. Keep in mind the business and process model of the client, and suggest ways to incorporate security in the most effective and technologically and financially feasible ways possible.
➤ Make the client aware of the importance of security and the consequences of neglect, and convince them of the worth of their investment in this area.
➤ The solution should be flexible and adaptable to various scenarios according to the comfort of the client.
➤ Carry out thorough vulnerability analysis, penetration testing and patching up of vulnerabilities.
➤ Implementation of Artificial Intelligence and Machine Learning is of utmost importance in the field of Cyber Security
➤ Ransomware is a very prominent threat, and unique solutions to deal the problem need to be proposed as soon as possible.
➤ Known vulnerabilities must be patched to avoid data breaches
➤ Rise of botnets, and self-learning malicious software are gaining popularity amongst cyber criminals.

➤ Adequate attention must be given to Internet of Things (IOT) security

III. SWOT ANALYSIS

A. STRENGTHS

The product and services offered should stand out from the competition and most importantly must have immense practical utility. Since cyber security is a vast domain comprising of web security, vulnerability analysis and penetration testing, network security, cryptocurrency, IOT, ransomware, malwares etc., the products or solutions offered should cover as many domains as possible which will be very convenient for the clients who won't have to invest in different companies for various types of protection services.

The startup must be able to provide practical and feasible solutions based on the business plan and expenditure of the client, as well as their present risk management strategies. Also, if the employees of the startup are well paid and the employees holding senior positions have immense experience, it would be a boon to the business.

The startup must keep up to date with the rapidly evolving threat profile and changing functionalities and offer solutions accordingly.

B. WEAKNESSES

Cyber Security is a very competitive business with many well-established companies as well as startups. Also, many a times, the only possible security solutions for the organization many not be implemented due to budget and time constraints, hence companies are prone to turn to their own security department to come up with short term solutions instead of investing in professional cyber security companies and opting for long term solutions.

Also, many a times to effectively implement security solutions, the companies may have to alter their business plan or make some changes in budget and infrastructure, which they may not be willing to do due to time constraints hence may not be motivated to approach a cyber security company.

For a new startup, especially in cyber security, the company may struggle in the early stages due to shortage of staff and financial resources.

C. OPPORTUNITIES

Cyber security is an area which the government and corporate are in desperate need of, and are in dire need of professionals. The skill gap is rapidly increasing, and the damages caused due to a cyber-attack can be catastrophic. Cybercrime is currently the most profitable illegal business and it is a very organized crime in which the latest technologies are being employed to carry out the attacks. Hence, any company, be it a startup or a well-established one will flourish if it is able to provide feasible and very effective solutions to their clients. Thorough market analysis and studying the latest kind of threats is of utmost importance.

D. THREATS

There are many companies who have very expensive and as well as effective modern infrastructure to provide the best possible solutions to their clients hence competing with these giants with a dearth of infrastructure, man power and financial resources will be a huge challenge.

Also, it will be difficult to provide solutions which evolve as per the threats faced, as many security solutions may very quickly become outdated or prove to be ineffective due to rapidly evolving threat profile.

IV. MARKET ANALYSIS

A. MARKET TRENDS

The latest attacks have been on healthcare, banks, law firms, governments organizations and social networking sites, as well as e-commerce sector.

The latest threats these organizations face: malware, ransomware, spyware, cross site scripting, phishing, IOT, denial of service (DOS) and distributed denial of service (DDOS) attacks, which are further powered by technologies like Machine Learning and Artificial Intelligence. The quantity and success rate of these attacks is rapidly increasing, whereas there has not been a proportional investment by these organizations in cyber security as of yet. Also, according to a report by PWC, more than 34% of the cyber-attacks are carried out by the employees of the company and 28% of the attacks are carried out by former employees. 54% of companies have experienced one or more successful attacks that compromised data and IT infrastructure. Also, only 33% of organizations believe they have adequate resources to manage security effectively.

The amount of money spent on cyber defense has reached epic proportions. The USA government has spent over 100$ billion between 2006 and 2016 and $14 billion in 2016. Also, by the year 2021, amount of damage caused by cyber-attacks will reach $6 trillion.

B. TARGET MARKET

The disparate domains which are in urgent need for a proper framework and technological and business solutions to curb the threats they face on a daily basis are =>
1. MNCs and Corporates
2. Military
3. Voting Systems
4. Telecommunications
5. Healthcare
6. Government organizations
7. Internet and Cloud Based services
8. E-banking
9. Law firms
10. Social networking sites
11. Schools and universities
12. Banking and commerce sector
13. Political and business leaders
14. Celebrities

C. COMPETITIVE ADVANTAGE

The team should periodically do a thorough analysis of the recent attacks, the infrastructure vulnerabilities of the victims, the technical as well as economic reasons for the said vulnerabilities in their infrastructure, the gaps in their risk management frameworks and policies, amount of money invested in security prior to attack, the possible solutions to improve infrastructure , proper analysis of their revenue and business model to propose and a financially feasible investment in security.

Implement solutions keeping in mind the client's budget, infrastructure and security threat. Implement solutions keeping in mind the client's budget, infrastructure and security threat. Make the client aware of the importance of security and the consequences of neglect, and convince them of the worth of their investment in this area.

The solution should be flexible and adaptable to various scenarios according to the comfort of the client. Carry out thorough vulnerability analysis, penetration testing and patching up of vulnerabilities.

Conduct a thorough analysis of the availability of clients before you choose a location. Also, get accurate estimates of the investment which the clients are willing to make. The competitors and their success or even failures, and reasons for each. Policies, laws, rules and regulations should be kept in mind. The team should be diverse and from different backgrounds, technical, business and marketing.

V. SERVICES OFFERED AND SOURCE OF INCOME

As said before the startup should be able to offer practical, feasible and affordable solutions in as many domains of cyber security as possible to beat the competition =>

1. Cryptography
2. Networking
3. Programming
4. System Hardening
5. Consultancy and Advisory Services
6. Technical Support
7. Training
8. Firewall, antivirus, anti-malware
9. Cloud security
10. Database decentralization
11. Risk management
12. Web application security and penetration testing (OWASP)
13. Network security
14. Ransomware
15. Block chain
16. Cryptocurrency
17. IOT security
18. CEH, CCNA, CISSP, PWK training programs
19. Data Analysis

❖ *Marketing And Sales Strategy*

1. Marketing is a very important aspect for any business either new or existing as this is where revenue for the business is not only generated in order to sustain and grow the business, but awareness for both existing and new customers for the business is created as well. The importance of marketing has seen businesses keeping a separate budget and creating marketing policies and strategies that will allow it to stand out in the market place.

2. Due to the intense competition in this industry, cyber security firms that do not engage in the right publicity are bound not to survive long in the business. While publicity and advertising are very important for any business, knowing the right strategies to use due to the nature of the business will ensure that corporate goals and objectives are easily adhered to.

3. Conduct a thorough analysis of the expectations of the clients, their user and technical requirements, and also the marketing strategies which have been successful in the past to come up with appropriate strategies of your own and decide the marketing budget. The marketing strategies should be firmly in line with the core values, goals and philosophies of the company

4. Engage the services of reputable publicity consulting firms to help draft strategies that will not only promote the brand of the company, positively communicate the brand and stand out but also that will allow the company to compete favorably against the competitors.

5. Employ internet, ICT magazines, radio stations, TV stations, talk shows, seminars, workshops, conferences etc. Marketing executives and business developers should be able to carry out direct marketing

6. Create an interactive website and promote contests from the startup's brand or from other brands

7. Advertise through social networking sites such as YouTube, Facebook, Instagram, Twitter, LinkedIn etc.

8. Position banners and bill boards at appropriate and strategic position and use fliers and handbills.

9. Attend seminars and relevant tech and software conferences in order to network and increase awareness about the brand and also participate in and sponsor relevant community programs

10. Develop trial versions of our cyber security products for users and have them buy the original as soon as they are satisfied with the services from your products.

VI. SUSTAINABILITY AND EXPANSION STRATEGY

Cyber security is a very competitive field and hence the startup will need to evolve and adapt to the changing scenarios to best serve the diverse needs of their customers. The security framework and solutions offered should be evolving and flexible to incorporate the very advanced, sophisticated and well-planned forms of attacks. A very important point to be kept in mind is that the solutions should be practical and feasible to implement as well as within the budget of the client, and the solutions should be offered by keeping the business, process model, risk management

framework and defense history of the client in mind. The clients should be kept aware of the importance of security and the dire consequences of the lapses in security by providing the latest examples of system compromise, data theft, and infrastructural as well as financial damage done to similar organizations.

Thorough vulnerability analysis and penetration testing of the system of the client, as well as the analysis of the weaknesses and vulnerabilities in the third-party functionalities, services and technology which the client is using is a must.

Explore and Employ the latest technologies like Botnets, Artificial Intelligence and Machine Learning to defend against self-learning malicious programs and software, Anti-Malware and Ransomware, Cryptocurrency and Blockchain technologies, to set yourself apart from the competition.

VII.   MEANING AND PURPOSE OF FEASIBILITY STUDY

A feasibility study is conducted to understand and analyze the cost and value of a business by taking to account various parameters and factors, like opportunities, environments, resources as well as the business model and proposed financial plan of a venture. Moreover, it also takes into account a multitude of other factors like the history of the said project, an adequate analysis of the product or service, budget, business plan, expected expenditure, rules, regulations and policies as well as the market and target audience of the said product or service. The technical details and infrastructure requirements also form an integral part of such a study. Then comes the investors, source of money and possibility, probability and potential of success of the venture.

With the help of a proper and well carried out feasibility study, we can determine the plan of action, and come up with proper and well-informed strategies, by shedding light on risks, constraints, budget, long term as well as short term goals.

There are 5 frames of analysis =>

• The frame of definition
• The frame of contextual risks
• The frame of potentiality
• The parametric frame
• The frame of dominant and contingency strategies.

There are 4 Ps in a feasibility study. The risks are divided regarding the 4 Ps are divided into 8 categories =>
1. Plan
a) Financial risks – These are risks related to money, budget and finance
b) Organizational risks- These risks are related to strategies, policies and procedures

2. Processes
a) Environmental risks- These risks are related to the environment, and the current condition and position of business, economy and target audience.
b) Technological risks- These are the technical risks associated with implementing a project

3. People
a) Marketing risks- These risks are related to losses and failures in estimating and marketing the product, as well its promotion strategy and target audience.
b) Sociocultural risks – These risks are due to a combination of multitude of factors like social, culture and the environment

4. Power
a) Legal risks- These risks are associated with failure of implementation with regard to the required legal policies and procedures.
b) Political risks- These risks arise due to the political climate.

Which areas to focus on depends on the context in which the feasibility study is being implemented. The procedures of conducting a feasibility study varies with the size of the project, as well as long term goals, short term goals, budget, target audience, process and business models, etc.

A. TECHNICAL FEASABILITY

This aspect of the feasibility study focuses on the thorough analysis of the technical details and infrastructural requirements, and to predict the possible technical and infrastructural issues which may be faced by the organization in the present as well as in the future.

There are several domains in this regard =>

• Thorough analysis of the current infrastructure, hardware and software as well as the infrastructural requirements to meet the organizational goals
• Budget allocated
• Availability of the infrastructure, as well as feasibility of deploying the technical solutions
• Strategy of deployment, testing and training
• The skill set of the employees

B. PRODUCTION STRATEGY

• Analysis of the means of procurement and availability of the input and raw materials necessary to implement the technical solution
• The potential of making the required and expected profits
• Intricate details related to the expansion, growth, marketing as well as the pricing of the product

Thorough analysis of the steps and procedures to implement the product or service by taking into account as many technical and economic factors, budget, history of similar endeavors etc. is very important in this regard.

C. RESOURCE FEASIBILITY

Describe what proportion of resources are offered to make the new system, incorporating and taking into account the design procedures and determining, whether or not it interferes with traditional business operations, and also determining the kind and quantity of resources needed, as well as dependencies, and various processes and procedures keeping in mind the company revenues.

It involves coming up with the correct resources as well as assigning them to the correct tasks. Managing resources involves schedules and budgets for folks, projects, equipment, and provides.

While it's usually employed in respect to project management, it applies to several alternative areas of business management. Young businesses, specially, can pay attention to resource management in a very variety of areas, including:

- Finances – will it meet current expenses or afford to take a position in new instrumentation or workers training?
- Staffing – will it have the correct folks for the work on hand? can it got to rent if it gets that new shopper and if thus, what skills can those folks got to have?
- Physical area – is that the company's workplace or producing area designed in order that alternative resources are often managed for optimum efficiency?
- Equipment – will it have the tools required to do what's required?
- Technology – What will the business got to do to succeed and how the financial resources are to be reallocated to fund what's missing

D. MARKETING FEASIBILITY

All feasibility studies aim to investigate how things work, if they'll work, and establish potential issues. Feasibility studies employ concepts, campaigns, products, processes, and whole business models. Feasibility studies measure and employ assessment tools to determine the plausible scenarios of executions and selling and marketing your business to investors. They must contemplate the professional pros and cons and analyze the spread and reach of potential business situations.

To promote our product or service, we need to map out specific concepts, strategies, and campaigns as well as case studies, that are supposed to be enforce thinking about market feasibleness and target audience as well as a planned course of action. Things to incorporate during a market feasibleness study include:

- Description of the trade
- Current market research
- Competition
- Anticipated Future Market Potential
- Potential consumers and Sources of Revenues
- Sales Projections

E. FINANCIAL FEASIBILITY

Financial Feasibility study focuses on determining the sources of capital, returns or investment and different financial concerns related to business model and strategies, as well as marketing, technical and infrastructural requirements. Furthermore, through this study we are able to understand the sources of capital, return on investment, startup capital, revenues, means of financial gain and profit as well as disbursements.

However, for the aim of building a business or attracting investors, you ought to embody a minimum of 3 key things in your comprehensive money feasibleness study:

- Start-Up Capital needs,
- Start-Up Capital Sources, and
- Potential Returns for Investors.

1) Start-Up Capital needs

Start-up capital is the money you need to commence your business and keep it running till it's self-sufficing. Typically, you ought to embody enough capital funds (cash, or access to cash) to run the business for one to 2 years.

2) Finding Start-Up Capital Funding Sources

There are some ways to raise capital for your business, however regardless of what route you're taking say investors, banks and loans, or even personal self-funded ventures.

It is very important to incorporate skilled and competent people who are willing to put in the extra effort required to firmly establish a startup.

Investors are often friends, members of the family, skilled associates, client, partners, shareholders, or investment establishments. Any business or individual willing to grant you money are often a possible capitalist. Investors offer you cash with the understanding that they'll receive "returns" on their investment, that is, additionally to the quantity that's endowed they'll get a share of profits.

In order to tempt investors is to point out how the business will create profits, how it'll begin to create profits, what quantity profit it'll create, and what investors can gain from their investment. It is very important to determine and clearly present the business, technical, financial and marketing aspects to the investors in this regard.

F. SOCIAL FEASIBILITY

Social feasibility study takes into account the perspective of users and clients with respect to the merchandise or product being launched into the market. It is very important to conduct a thorough analysis of the target audience, taking into account the differences in culture, language, literacy level, technical proficiency, financial backgrounds, interests, needs and expectations from the market.

Hence, we should keep a multitude of factors in mind while designing and implementing a product like speed, size, ease of use, reliability, robustness and portability.

Social Feasibility assessment is used to determine various factors which include analyzing impacts on
• Population or demographic movement
• Economic structure of the local economy
• Access to natural resources by the communities affected
• Long term and short-term effects and efficacy of salaries as well as the efficacy of the strategies in this regard
• Impact on public goods, services and natural resources
• Impact on local business

VIII. STAKEHOLDERS AND THEIR RESPONSIBILITIES

A stakeholder can be understood as any community, organization, group or individual who is directly or indirectly influenced by the operations carried out by the organization, its profit, loss, procedures and overall progress and development. Hence stakeholders have a say in the functioning of an organizations. Stakeholders which do not have a financial stake but are indirectly influenced by the organization are termed as external stakeholders.

A. INTERNAL STAKEHOLDERS

Stakeholders who have a financial stake and are directly influenced by the functioning and the operations of the concerned organization are termed as internal stakeholders. Hence their success and profits are directly correlated to the success and profits of the organization.

1) Employees : Employees are one of the most prominent stakeholders of an organization and have a decisive role when it comes to the functioning, government, management, and working of organization as well as strategy and other operations. The commitment, skill, morale and attitude are crucial for the success of the organization. Moreover, they have made financial investments in the concerned organization.

2) Managers : Managers are the senior employees who assume leadership positions to spearhead the development and progress of the various and disparate departments and organizations as well as maintain the morale and team spirit and ensure proper collaboration and team work to meet the deadlines and the desired goals. Hence, they are held accountable for various actions and act as an intermediate between the senior management, stakeholders and the employees working under them.

3) Owners : Owners of an organization are basically those who own a significant share of the organization, hence overlook many decisions being made regarding the functioning and operations of the concerned organization.

B. EXTERNAL STAKEHOLDERS AND THEIR RESPONSIBILITIES

These stakeholders do not own a financial stake but are influenced by the functioning and working of the organization either directly or indirectly.

1) Customers
Customers are considered one of the most important entities in a business because all the investment and hard work of the organization will be futile if they are not able to attract customers. Hence it is important to spend adequate time understanding the needs of the customers and come with appropriate business and process models which will ensure the functioning the organization and meeting the demands and expectations of the customers. Many startups fail because they are unable to meet the exact demands of a customer and lack a clear vision. Hence constant interaction with customers using surveys, social media, interview etc. is very much crucial. Furthermore, it is also important to predict what users will want in the future, even though the users may not realize it.

2) Suppliers and third-party services
These are the suppliers of various services like technology, apparatus, infrastructure, marketing, consulting, security, shipments, transport etc. Strong alliances is very much important as well as a trust factor.

Miscommunication should be avoided to ensure timely and accurate delivery of the desired products.

3) Government
Organizations have to follow rules and procedures and also meet the requirements laid out by the various policies which are being implemented by the government.

Furthermore, government tax businesses and ensure rules and regulations are followed along with ethical practices.

4) Society
Many projects implemented by the organization have a direct or indirect impact on society like construction of new factories, roads, industries, traffic, prices etc. They also affect the employment and can be both a boon or bane to other organizations and businesses.

C. DIFFICULTY IN UNDERSTANDING REQUIREMENTS OF STAKEHOLDERS

A lot of times it is difficult to understand the requirements of the stakeholders due to the following reasons:

1. Stakeholders often don't know what they want from a computer system except in the most general terms; they may find it difficult to articulate what they want the system to do; they may make unrealistic demands because they don't know what is and isn't feasible.
2. Stakeholders in a system naturally express requirements in their own terms and with implicit knowledge of their own work. Requirements engineers, without experience in the customer's domain, may not understand these requirements.
3. Different stakeholders have different requirements and they may express these in different ways. Requirements engineers have to discover all potential sources of requirements and discover commonalities and conflict.

4. Political factors may influence the requirements of a system. Managers may demand specific system requirements because these will allow them to increase their influence in the organization

5. The economic and business environment in which the analysis takes place is dynamic. It inevitably changes during the analysis process. The importance of particular requirements may change. New requirements may emerge from new stakeholders who were not originally consulted.

IX. CASE STUDY OF BUSINESS STAKEHOLDERS

A. STAKEHOLDER ENGAGEMENT: A KELLOG'S CASE STUDY

Kellogg's focuses on many aspects like employees, suppliers, shareholders, governments, health organizations and charities, customers, the communities etc. and has established long term business plans, and strategies to meet its desired goals.

Kellogg's adopts the Corporate Social Responsibility Strategy which covers the following:

- Marketplace ambition: To thoroughly understand the needs of the customers and meet their expectations and demands in terms of providing good nutrition maintaining the highest quality and standards.
- Environment ambition: To keep in mind the factors related to environment protection and sustainable development to ensure a prosperous future.
- Community ambition: To give importance to the impact on community and ensuring adequate development and contribution to the community while carrying out their projects.
- Workplace ambition: To hire a diverse and competent workforce and provide a positive, ambitious and productive environment.

B. KELLOGS STAKEHOLDER CONFLICT

- It maintains the government standards and requirements along with the preferences of the customers to ensure mutual benefit. For example, recently Kellogg's reduced the sugar content in Honey Loops which came in conflict with the perception of the customers of the brand.

- Kellogg's also supports various charity groups hence conflict related to prioritizing resources for different charity groups occurs. Recently Kellogg's is facing a conflict in this regard due to its focus on charities promoting breakfast clubs.

C. KELLOGS GLOBAL EMPLOYER BRAND

- Kellogg's gives a lot of importance towards the welfare and well-being of its employees. It incorporates proper feedback and encourages the vision of the employees. There are various ways in which employees interact with each other =>
- The teams which have assumed leadership positions discuss the goals of the company regarding profit, business, employee development, target audience, sustainable development, risk management, marketing, requirements elicitation and analysis etc.

- Kellogg's implements a global intranet to ensure smooth, quick and effective communication and exchange of information between its employees.

- Kellogg's also implements a quarterly team talk webcasts, again to ensure periodic and effective communication.

- Kellogg's actively engages the customers by employing various advertising and marketing strategies especially advertisements through TV and print and social media.

D. SUPPLIERS

Kellogg's ensures a harmonious and productive relationship with its suppliers by following the labor practices and ethical business standards, simultaneously focusing on the various aspects related to environment and health in this regard.

To do its share in reducing poverty and increasing employment, Kellogg's promotes many farmer development programs and carries out development projects in rural regions. For example: Kellogg's supports the sustainable production of amaranth which forms a part of the staple diet in Mexico. Mexico Tierra de Amaranto is an organization founded by Kellogg's to promote this very practice. This program also has increased employment of rural women.

E. COMMUNITY AS A STAKEHOLDER

Kellogg's is actively involved in community service and development, especially in areas rife with poverty, hunger and sustainable agriculture.

F. FOOD BANK INITIATIVES

Kellogg's makes tremendous donations to charities and organizations promoting food banks which is then distributed in the areas prone to hunger and starvation, especially rural and developing areas. To appreciate the impact of these food banks, the Guardian reported that a quarter of a million people in the UK were dependent on food banks in April 2013.

G. SUSTAINABLE AGRICULTURE

Kellogg's is investing heavily in the latest practices related to agriculture, and ensures that the farmers are able to grow crops and have a proper harvest, and reduce the likelihood of failure by employing the latest technological trends like herbicides, pesticides, prediction and forecasts, latest irrigation mechanisms etc.

Kellogg's has invested in the charity Seeds for Africa to promote sustainable agricultural projects in Malawi and Kenya. The charity provides community groups with the tools and training they need to produce nutritious food that is secure and reliable. It has also started breakfast clubs in Uganda, Kenya and Zambia.

X. SOURCES OF FINANCE

A. BANK LOANS

➢ Advantages
• The contract between a business and bank deals only with the loan taken and once a loan has been paid, there are no further obligations.
• Banks have no ownership in the business.
• Furthermore, there are options of implementing fixed rate loans

➢ Disadvantages
• There is always a risk of property and assets being seized.
• It is difficult to obtain a loan without a substantial track record.
• Many a times the interest rates are very high

B. LEASING

➢ Advantages
• Leasing and associated costs of a startup are less than the costs of purchasing fresh premises.
• The lease payments in such regard can also be claimed as business expenses
• Relocating from a leased property can be much easier than being dependent on the sale of an owned premise.

➢ Disadvantages
• In the long term, having purchased premises on lease could get much more costly.
• The money which goes as rent does not contribute to the growth of the assets of the business as well as the capital.
• We will have to depend on the landlord for maintenance.

C. BUSINESS ANGELS

➢ Advantages
• Can make independent and quick investments
• We will have access to the knowledge and experience of the investors
• There is no concept of repayments and interest.

➢ Disadvantages
• It is very difficult to find angel investors and also to convince them to invest in the business.
• A share of the business will be owned by the angel investor.

D. MORTGAGE

➢ Advantages
• There will be no need to cease control as well as ownership of the business as well as its associated assets and premises
• It is will also promote gain in capital, reduced and deductible interest repayments, fixed options related to interest on loans and overall lower interest rates than overdrafts.

➢ Disadvantage
• We will need a good amount of money in deposit.
• It can get hard to move the business if the premises are owned instead of being leased
• Due to mortgage rate increases, there can be disparity and volatile rate mortgages.
• Capital will be decreases in the event of the property losing its value.

E. DEBT FACTORING

➢ Advantages
• There is a lot of competition regarding the price in debt factoring companies
• We will get more time to manage the business
• Will promote smooth cashflow and financial planning
• Money is always paid back by debt factoring companies.

➢ Disadvantages
• Many customers prefer to have dealings directly with the concerned business.
• Reduction in profit margins on each order or service fulfilment
• The factor deals with the customers and not choosing a reputable can damage business reputation.

XI. INTERNAL AND EXTERNAL SOURCES

Internal sources of finance are those sources which are generated from within the organization or the concerned business from the existing assets and activities. These include sale of stocks, retained earnings, collection of debt, sale of fixed assets etc. Relatively their cost is low and collateral is generally not required as well as the amount raised is comparatively less. It aims to generate capital from the projects and endeavors carried out by the business and hence proper evaluation and analysis of costs is carried out, and the budget is also reviewed.

On the other hand, external sources of finance deals with the procurement of money and capital sources not inside rather outside the business. These includes financial institutions, public deposits trade credit debenture, lease financing, preference shares, factoring, loans from banks etc. The cost is relatively high and collateral is sometimes required and a huge amount is generally raised.

➢ *Differences between internal and external sources*
• In internal sources, the cash and capital are generated from the sources which are present within the organization. Whereas, here the capital is arranged from external resources which can be from private sources or from the financial market.
• Internal sources include sale of stocks, retained earnings, collection of debt, sale of fixed assets etc. These includes financial institutions, public deposits trade credit debenture, lease financing, preference shares, factoring, loans from banks etc.
• Internal sources of finance are affordable and economical, whereas their external counterparts can get very expensive.

- Most of the internal sources of finance are no need of collateral for the purposes of raising funds, whereas in the case of external sources, to raise funds assets are many a times mortgaged as security.
- Unfortunately, many a times the money procured from internal sources is less and also has limited applications. Whereas, a lot of capital can be generated from external sources which can be employed effectively in various ways.

Also, there are 2 types of external sources

1. Equity Financing Shares are sold to the investors to raise money. Hence generally adopted by those companies which indicate the shares and interest of the concerned investors and shareholders of the company.
- Ordinary shares
- Preference shares
2. Debt Financing Here fixed payments are made to the lenders which is the primary source of capital. This includes
- Bank Loans
- Corporate Bonds
- Leasing
- Commercial Paper
- Trade Credit
- Debentures

XII. CONCLUSION

Cyber Security is one of the most overlooked and dangerous threats in the modern era. Cyber attacks are evolving and adapting at an alarming rate. Skilled hackers make use of the latest technology like Artificial Intelligence, Machine Learning and the inherent weaknesses in IOT to carry out disastrous cyber attacks.Phishing, ransomwares, cryptojacking, social engineering etc. are being used in a very sophisticated manner to steal personal financial information, login credentials, credit card information etc. Companies should have strong security policies , checked and audited on a regular basis. Periodical penetration tests should be carried out. Employees must be trained to handle cyber attacks and detect suspicious reconnaissance activity which often precede a cyber attack.Also, softwares should be updated and patched regularly. Furthermore, adequate budget should be allocated to cyber defense. Therefore, it is high time we give adequate attention to the defense of our infrastructure, to not only safeguard our businesses and data, but also maintain the trust of our customers whom we serve.

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