“How SEO Transforms a Software Technology Company”
Internship Report on: How SEO Transforms a Software Technology Company

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K.M Nafiul Haque
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Subject: Submission of the Internship Report on “How SEO Transforms a Software Technology Company”

Dear Sir,

At the beginning, I would like to express my gratitude to you for your guidance and support throughout the entire course of preparing this report. It’s a great pleasure to submit my internship report on the topic “How SEO Transforms a Software Technology Company” to you. I tried to use all the information, knowledge in the report that I gathered from my work experience at Dhrubok Infotech Services Ltd.

I, therefore, pray and hope that you would enlighten me with your valuable thoughts and views regarding this report.

Sincerely yours,

Anuron Rahman,
ID – 15104202,
BRAC Business School,
BRAC University
Letter of Endorsement by the Supervisor Faculty

This is to certify that Anuron Rahman, ID-15104202, a student of BRAC University of BRAC Business School has completed the internship report titled: “How SEO Transforms a Software Technology Company” under my supervision. His internship placement was at Dhrubok Infotech Services Ltd. I am pleased to state that he has worked hard in preparing this report and he has been able to present a good picture of the concerned organization. The data and findings presented in the report seem to be authentic.

I wish him every success in life.

........................................
K.M Nafiul Haque
Lecturer
BRAC Business School
BRAC University

........................................
Mehedi Hasan Khan
Founder & Managing Director
Dhrubok Infotech Services Ltd.
Acknowledgment

It was a great experience doing internship in a company like Dhrubok Infotech Services Ltd. This report has reached its completion due to the joint effort of many individuals. So, I have to express my gratitude to everyone involved in this process.

Firstly, I would like to thank my supervisor, Mr. K.M Nafiul Haque for all the guidance and support he has given me throughout the preparation of the report. He has given me valuable advices to improvise my report in every step.

I am also very thankful to Dhrubok Infotech Services Ltd. for letting me do my internship at their organization. The learning and hands on experience I gained during my working period there has given me a broader view of the working field. They help me understood how I should deal with problems in the current technologically advanced world.

In addition, I would like to thank Mr. Mehedi Hasan Khan, Managing Director and the whole team of Dhrubok Infotech Services Ltd. for their support during the preparation of internship phase. My successful completion of internship program in Dhrubok Infotech Services would not be possible without the support of these amazing people.

Finally, I would like to thank BRAC Business School and Office of Career Serviced & Alumni Relations (OCSAR) for giving me the opportunity to develop my interpersonal skills through this practical experience.
Executive Summary

At the beginning, the report provides a brief overview of Dhrubok and the services offered. Then, the importance of the study has been expressed with some important factors. After that, the topic “How SEO Transforms a Software Technology Company” has been thoroughly described from the major factors of SEO to how it brings leads to a software company webpage. It explains how SEO ensures the company website visibility on top of the search engine which brings the maximum traffic to a website and help converting them into leads. The report also showed some data from SimilarWeb.com on how top software companies like Wordpress or Adobe getting maximum traffic from search engine. The report tried to establish the effectiveness of SEO and how it transforms a software technology company. However, in Dhrubok Infotech services there are some missing factors of SEO which needs to be filled up and as a result, the report has provided some recommendation.

During this short period, it was difficult to gather enough data with accuracy. Although, Dhrubok team gave me their best support to finish the internship report. Despite all the difficulties, I believe that the report could effectively explains how SEO transforms a software technology company.
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1. Organizational Overview:

Dhrubok InfoTech Services Ltd.

1.1 History

Dhrubok InfoTech Services Ltd. is a custom software and development company established in the year 2013. The company provides end-to-end development services for web, iOS and Android applications. Two talented software engineer Mr. Mehedi Hasan Khan and Ashiq Uz Zoha driven by the appetite for mobile apps and software started this company from 2013. Both of them always had a dream of building a software company and years of hard work as well as planning made the dream come true.

Dhrubok InfoTech Services Ltd. delivers up-to-the minute iOS, Android apps and web solutions. They focus on the client’s need and try to find the best possible solution to the problem. They have developed 120 android apps, 115 iOS apps, 110 web applications until now. Moreover, they have served 102 clients till today.

1.2 Mission & Vision

The mission of Dhrubok Infotech is to help different size of startups and enterprises to build better products, reach more people and establish a strong online presence. Dhrubok Infotech builds apps/websites and infrastructural software for startups to market their product as soon as possible.

The vision of Dhrubok Infotech is to build a better and innovative world through mobile first software solutions. They also envision to build more intelligent system which can connect human lives using data science, machine learning, computer vision and artificial intelligence.

1.3 Services offered

Mobile Apps Development: Dhrubok develops native iOS and Android apps for today’s app savvy generation. They help the client decide what technology and framework is right for the project. Some of the examples of their app developments are: Credntia, Even3 app and so on. Credntia is a personal identity management system and Even3 app is an event organizing app.

Web Development: They build web applications and cloud services ranging from light weight to complete solutions. They are specialized in PHP, WordPress, Laravel and so on. Some of the examples of their web developments are: North West Power Generation Ltd (NWPGCL) website, Even3 app website and so on.

Enterprise Solutions: Dhrubok builds SOA-based solutions to integrate enterprise software services. They try to ensure seamless data integration as well as smooth information flow and help manage business process more effectively.

UI/UX Design: Dhrubok designs user friendly, scalable and HCI research-based interfaces with the best UI/UX practices and tools.
1.4 Clients

- Credntia LLC
- Hint Interactive
- The Legal Empiricism
- Rocket Tier LLC
- Exovat
- PCH International
- North-West Power Generation Company LTD.
- Ministry of Cultural Affairs, Bangladesh
2. Introduction:

In this era of modern science digital marketing is unavoidable to run a business. There are different forms of digital marketing but the most important of all is SEO or Search Engine Optimization. The term SEO means the process of affecting the online visibility of a website or web page in a web search engine’s unpaid results which sometimes referred to as “organic” results. This process helps a website to stay on top of the SERPs (Search engine result page). This is the most effective way to bring online traffic to a website. “Google”, “Ask.com”, “bing”, “Yahoo” these are some of the popular search engines that people use. Though Google is the most popular search engine. According to the latest netmarketshare report [January 2018] 74.52% of searches were powered by Google, where only 7.98% by bing.

There are a number of factors of SEO. For instance, keywords, backlinks, content quality, accuracy of titles and so on. A website will be ranked on SERPs according to the effective use of these factors. The more effectively a company will optimize its webpage on search engine the more leads it will be able to generate. Moreover, users mostly look for their solutions on the first page of the search engine. About 91% people stay on the first page to find what they need and among them 63% users look for their solutions only in the first three links. The position of a site on the search engine is determined by page rank. Page rank is one of the methods Google uses to figure out the importance and relevance of a webpage.

To determined how SEO transforms a software technology company, it is important to know the effective use and importance of SEO for a software company. SEO is very important for a software company, specially the startups. In this era of online marketing, the customers or clients need to know that such a company exists. It is way more important for a software company to display its business expertise online to the potential clients. So, by utilizing the factors of SEO a software company website can earn the value and trust of the leads. Proper use of SEO will ensure a company’s position or rank above its competitors as the online market is very competitive at present. If a company site is missing out a keyword that competitors are using, it might affect the position of that company. Above all, SEO will not only ensure the online visibility of a webpage but it will also provide the company with quicker tangible results.

2.1 Limitations of the Study:

Though I am writing the report based on research, I came across a number of limitations while writing it. The limitations are mentioned bellow:

- Lack of available data.
- Due to short time period it was difficult to gather enough information.
- As an Intern I couldn’t use most of the tools at their best as I don’t have the administrative access and they are paid tools.
2.2 Objectives of the Report:

The objective of this report as well as study is to analyze the factors of SEO that shows a clear picture of how SEO is transforming a software technology company. This report includes analysis of SEO factors like keyword research, content quality, SEO technical checklist, building backlinks and so on. The report also focuses on how top company’s SEO works and how startups should work on SEO. Moreover, it explains how to keep track of the competitor’s online authority to maintain the company’s rank on search engine and bring more traffic.

2.3 Literature Review:

**SEO:** (From the study of SEO basic by Bivings Group, June, 18, 2008) SEO term stands for Search Engine Optimization. This optimization process expresses the process of highlighting one’s content or site on search engine results carried out by search engine like Google, bing, Yahoo and so on. The websites are ranked based on relevance.

**SEO is the most effective method:** (Telnic Limited. 2009) Search Engine Optimization is the most effective form of digital marketing as well as bringing traffic to the webpage. This process improves the degree of user traffic of a domain through the natural searching options. This process is categorized as organic search. The higher the domain authority of a webpage is the higher the ranking of the webpage is given by SEO. The ranking also changes by improving particular section or updating content periodically.

**Benefits of SEO:** (Andrew B. King, July 2008) The Search Engine Optimization has boosted a lot as Internet marketing has boomed so much in this era of technology. There are a lot of benefits of SEO in business. Few important benefits are the following:

The search engine escalates the degree of traffic to a business’s website implementing significant number of relevant axioms and keywords. The SEO also help extending the business by converting the traffic to potential leads.

The SEO is referred to be the most effective and functional form of conventional marketing than any other conventional marketing.

The search engine optimization is very functional to increase large size of earning on return on investment. Moreover, SEO is better in improving sales and profits of a company than any other form of marketing.

SEO is a cheaper form of marketing approach than any other method. SEO ranking helps a company maintains its status on the search engine for a very long time.

The SEO helps a company connect to its clients through optimizing process. This process helps a company to increase searching ability and traffic to its site based on the strategies used.
3. Methodology of the Study:

The report is prepared based on the information collected through primary and secondary data.

Primary data:

Primary data was collected from the interactions with office colleagues and discussion with the Managing director of Dhrubok InfoTech Services Ltd. The Managing director has experience in the SEO activities. As a result, he could brief me with some valuable information on SEO.

Secondary data:

- Online articles, websites, tutorial videos.
- Dhrubok InfoTech’s record of working on SEO.
4. Analysis and Interpretation of the Data:

How SEO Transforms a Software Technology Company

SEO or Search Engine Optimization is the most effective form of digital marketing. It ensures the visibility of a website on the search engine. It helps a software company to let people know that they are out there in the sea of online market. Most importantly, SEO helps a company bring traffic to the site as well as convert them to leads. Basically, SEO helps a software company transform its market as well as online status. To understand how SEO transforms a software company, we need to analyze the factors of SEO. There are around 200 factors of SEO but we have to analyze the right ones which are essential.

4.1 Keyword Research:

Keyword research refers to a practice search engine optimization (SEO) experts use to find and research alternative search terms that people enter into the search engines while looking for a similar subject. For example, if I am running a software company then the relevant keywords would be software, hardware, application software, system software, SQL and so on.

Keyword is the most important part to find information in the search engine. If someone searches for a software solution, they will type in some keywords in Google or other search engines. Then the search engine uses that phrase to find relevant information on thousands of pages online to rank for the best fit for that search.

There is a process of Keyword research to optimize a webpage:

4.1.1 Keyword Research process:

Step1. Developing a Buyer Persona: Putting oneself to customer’s shoe is very important to understand the customer’s psychology. Because customer is looking for a solution, not a site. The customers or clients looks for valuable information that might solve their problem. So, developing a buyer persona is vital to understand what the best customers or clients are typing in Google. There are three level of customers: Awareness, Research & Comparison, buying.

Awareness- This level of customers knows that there are variety of software are out there in the market. For example, he will search by using the word “software” which is not precise.

Research & Comparison- This level of customer research the market and compare different companies to find out the right software for him/her. They are potential leads.

Buying- These customers know what they want. They are going to buy the service or product. For instance, this type of customer will search using “enterprise software solution” which is a long-tail keyword and more precise.
**Step 2. Keyword Strategy:** There are mainly two types of keywords.

**Head terms:** Consists of one to three words. These terms are searched more frequently. For instance, “blogging”. It boasts the most search volume.

**Long-tail keywords:** Consists of three or more words. People use this for more specific content. For instance, “how to write a great blog post”. The traffic a user get from this term is more desirable.

A software company should aim to target the body & long-tail keywords that are less competitive or overlooked by competitors. These keywords are more precise. Although, proper mix or balance of head terms and long-tail keywords is required to balance long term goals and short-term wins.

**Step 3. Brainstorm for Keyword ideas:**

- First, making a list of relevant keyword template in excel
- Hacking Wikipedia for relevant topics and ideas. For instance, if I type the word software in Wikipedia, I might get words like computer software, application software, hardware, mobile software and so on which are relevant.
- Then using a number of keyword research tools like Google Autocomplete, Ubersuggest and keyword shitter to generate 1000s of long-tail keyword ideas.
- Finally, using Quora to discover untapped topics and keywords.
Step 4. Narrowing down the Keyword list:

- Using Keyword Everywhere Extension and Google Keyword Planner to cut down the list based on average monthly search, competition, suggested bid and so on.
- Considering commercial Keywords using CPC (cost per click) figure is priority.
- Following table shows the competition level of some keywords based on CPC and monthly search volume:

<table>
<thead>
<tr>
<th>Keywords (Relevant)</th>
<th>Monthly Search Volume</th>
<th>Suggested Bid</th>
<th>Competition</th>
</tr>
</thead>
<tbody>
<tr>
<td>SEO</td>
<td>673,000</td>
<td>$4.34</td>
<td>Medium</td>
</tr>
<tr>
<td>SEM</td>
<td>368,000</td>
<td>$4.34</td>
<td>Low</td>
</tr>
<tr>
<td>Social Media Marketing</td>
<td>90,500</td>
<td>$6.08</td>
<td>Medium</td>
</tr>
</tbody>
</table>

- The level of competition of any relevant Keywords helps a company decide what Keyword should be used for better SEO ranking.

Step 5. Assess Competition and Choose Target Keywords:

- A tool called MOZ SEO toolbar can be used to eliminated overly competitive keywords based on competitors Page Authority (PA) and Domain Authority (DA).
- PA and DA is scored on the scale of 1 to 100.
- For instance, if a website has PA: 75 and DA: 95, then the webpage is very competitive.
- PA and DA defines how strong a webpage is on the search engine. Less PA and DA means less competitive.
- A company has to focus on Keywords that gives more chances to rank higher.

4.2 Quality Content:

Quality content is very important to grab traffic into the page. If the visitor doesn’t find a webpage interesting or appealing, he/she will look for another webpage for solution of the problem. Good illustration is important for quality digital content. However, writing SEO friendly content with proper keyword research is also important. It helps users to find the company webpage very easily. Writing blogs on related industries also give a weight to the webpage.
4.3 Link building:
Generating links or backlinks to the website is an important off-site component. It lets Google trust a website. For instance, articles, discussion boards, social media, blog post etc. These components help one’s site to move up on the search engine. To be clearer, if a gadget selling site backlinks amazon.com for its product then it’s trustable.

4.3.1 Link Building Process:

Link Building Strategy: All types of back link don’t carry the same weight. A software company should aim for earning “do follow” links from high ranking pages. Do follow backlinks allow Google or any search engine to follow them and reach one’s website. Basically, these links will pass on the SEO benefits of the website where it is built from to the hyperlinked website.

Analyzing Competitors Backlink: This is one of the easiest starts of link building. The company should analyze top search results and use MOZ SEO toolbar to view the links for target Keywords. Moreover, they should focus on Inbound links from Only External sources to find out who has linked to those competitor’s site. A software company can also use Ahrefs and SimilarWeb to analyze the marketing strategies of the competitors.

Maximizing Links for SEO Campaigns: Through this process a company can use the previously mentioned link building tools to find the authoritative links and pitch their latest blog post or service. Moreover, a company can also search for existing non-linked content using tools like “Mention” or Buzzsumo. The company should contact with the author of the content to link back the company page on his/her site.

Create Content That Generates Links & Social Shares on Autopilot:

- Creating model successful content by “Buzzsumo”.
- Putting some top infographics for internet marketers on the site.
- Publishing survey models.

Finally, posting company contents, blogs on High domain authority sites like Youtube, Quora, Udemy and many more will help the webpage get to the top of the search result very quickly. This process brings traffic back to the company website.
Analysis of webpages by Similarweb.com for some top software companies like Wordpress, Adobe, Canva in terms of SEO:

<table>
<thead>
<tr>
<th>Company</th>
<th>Direct</th>
<th>Referrals</th>
<th>Search (SEO)</th>
<th>Social Media</th>
<th>Mail</th>
<th>Display</th>
</tr>
</thead>
<tbody>
<tr>
<td>Canva.com</td>
<td>61.95%</td>
<td>0.91%</td>
<td>30.45%</td>
<td>3.70%</td>
<td>2.97%</td>
<td>0.02%</td>
</tr>
<tr>
<td>Wordpress.com</td>
<td>22.39%</td>
<td>7.33%</td>
<td>62.77%</td>
<td>6.55%</td>
<td>0.79%</td>
<td>0.18%</td>
</tr>
<tr>
<td>Adobe.com</td>
<td>53.96%</td>
<td>9.99%</td>
<td>31.19%</td>
<td>2.38%</td>
<td>1.43%</td>
<td>1.05%</td>
</tr>
</tbody>
</table>

The above table shows that top software companies either get maximum traffic from search engine or direct visitors if the company has good enough SEO and already became a brand.

Following these SEO processes any software company can transform itself into a brand and stand out in this competitive market. It will bring a brand image of a software company to the potential leads. That’s why most of the successful and large software companies in the world has very good SEO.

4.4 SEO Technical support list:

- **Installing Google Analytics**: Essential to measure key SEO metrics like traffic, traffic conversion and revenue.
- **Using Ahrefs (A third party tool)**: Measure Keyword ranking and link building.
- **Using Wordpress to optimize homepage**: Downloading and activating plug in yoast SEO and writing the SEO title and meta description of the page.
- **Using Google Search Console to verify the site**: Check how the search engine views the site; Reports about indexing status, search queries, crawl errors and penalties.
- **Improve website performance and speed**: Analyzing site speed with “Google PageSpeed Insights”; Installing three Wordpress plugins to speed things up.
- **Google Mobile-Friendly test**: The site should deliver a great user experience across all devices. For instance, easy to use on mobile, contents are readable without tapping or zooming etc.
5. Findings of the Study:

The study gives a clear picture of how SEO can transform a software company. It also helps to understand how essential SEO is for a software company.

- The study explains that SEO is vital for bringing traffic to a company site.
- Usually software company get most visitors in their site from search engine.
- SEO makes sure the strong visibility of a company webpage on search engine.
- Backlink is important for a webpage to let Google trust the site.
- Webpage should be Google-mobile friendly.
- Keeping webpage on top of the first page of search engine is important as around 63% of the users look for their solutions in the first three links.
- According to SimilarWeb.com, as a startup software company Dhrubok InfoTech Services Ltd. webpage gets most traffic from the search engine.
  
  **Direct visitor:** 6.28%
  **Referrals:** 0.36%
  **Search (SEO):** 93.36%
6. Recommendations:

Investing more on SEO is very important for a software company like Dhrubok Infotech Services Ltd. since it brings most of the traffic online. It gives a company more possibility to convert traffic into clients. Generally, a company should invest around $500 to $1500 per month.

Dhrubok requires more SEO professionals to optimize their web activity more efficiently. Otherwise they won’t be able to keep pace with the competitors.

They should post blog and content on high domain authority site like Youtube, Slideshare, Quora to rank higher and find themselves on the top of the search results.

They should write more blog post and backlink them. They can also use “Quora” to answer the relevant questions to solve people’s problem. This might add value to their company image.
7. Conclusion:

To conclude, in this era of digitalization it’s very competitive to stand out in the market. Especially the online market has become so competitive that all most all the software companies are investing a lot of money on Search Engine Optimization every year to stay in the digital market. The situation is not so different in Bangladesh. The software companies in Bangladesh are also investing on SEO to transform them into a global brand. As I discussed in the report that SEO is the most effective form of digital marketing to bring traffic to a webpage. SEO also gives the opportunity to convert the traffic into customers. So effective use of SEO is very essential for any company including Software technology companies because it can transform a company’s market status online.
8. References:


9. Appendix:

(1) An aware customer searches for keyword like “software”.

(2) A buyer will search with very precise long-tail keyword like “enterprise software”.
Wikipedia Hacking is an effective way to search for relevant keywords.

Ubersuggest is a tool to find relevant keywords along with competition level, CPC, Volume and so on.
MOZ Toolbar is a tool to view the page authority (PA) and domain authority (DA) of any website in the search engine. It helps to figure out the strength of any webpage.

Backlinks help Google trust a website. Many websites backlink articles, journals, etc. to another relevant high DA page to get higher rank on SEO.
One of the top software companies like **Adobe** gets second highest traffic from search engine. Although Adobe gets more direct visitors but it is now possible because of good SEO work.

Software company Wordpress gets highest traffic from search engine.
One of the top software companies like Canva gets second highest traffic from search engine. Although Canva gets more direct visitors but it is now possible because of good SEO work.

Dhrubok Infotech Services gets maximum online traffic from search engine.
Tools like Google AdWords, Keyword Everywhere help a company decide which keyword is best for them. These tools provide information like cost per click (CPC), search volume, competition level and so on about any relevant keyword.
Making a list of relevant Keywords with Excel is an important step of Keyword research. It also helps a company to narrow down the most relevant and effective Keywords.