

The digital community of Drive MKB

BUSINESS CASE



FONTYS UNIVERSITY OF APPLIED SCIENCES

EXECUTIVE SUMMARY

DRIVE MKB is the name of the project, which stands for “durable regional innovative flexible ecosystem.” Its goal is to assist restaurants and retail businesses in becoming self-sufficient in terms of digitalization, allowing them to be more resilient and flexible during times of crisis. The project’s purpose is to demonstrate feasibility, technological capability, and a potential strategy for building a digital community that is suitable for the DRIVE MKB project. This will be done in a business case, explaining the benefits of a digital community for the DRIVE MKB project and offering insight into the best strategy to launch and implement such a community, unless other tactics show better suited.

Benefits and constraints are critical components of every project since they provide the guidelines for how the solution should be implemented and how it adds value to DRIVE MKB. "To what degree can analysing an existing digital community give information on the best techniques to develop a self-sustaining community for the DRIVE MKB Project?" This is the basis of our project, as mentioned in our study document. In addition, the added value supplied by this research is advise on the qualities and best practices that a digital community should adopt in order to become self-sufficient, which will aid them in their job. Limitations must be examined since they are defined as any hurdles that impeded the research process or the collecting of data. The biggest constraint was the project's start date, which was two weeks later than expected, putting the project under time pressure. This was minimized by scheduling more meetings at the start to make up for the lost time.

According to the study done on the three distinct subscription options, DRIVE MKB's subscription will most likely be based on the access model. Customers who wish to engage in subscription-based communities frequently have high expectations and want to know what additional value they will receive. To persuade clients to choose an advanced membership plan, make sure the access to unique material is worthwhile and not accessible for free elsewhere. Furthermore, providing members with online courses or seminars gives them the impression that they are receiving their money's worth from their subscription. It also gives them the opportunity to improve on specific goals, which is what the DRIVE MKB community offers.

Many of the benefits that individuals seek from online communities, such as knowledge, entertainment, or novelty, appear to grow in proportion to the size of the community. The usage of metaphors like critical mass or network effects in works geared for practitioners and researchers assumes that all communities want expansion, or at the very least that they would be better equipped to service the demands of users if they became larger. Despite this, there are still a lot of little online communities. Small communities occur in large numbers on Reddit, one of the most popular online community sites, and many of them survive in their smallness throughout time. However, large communities appear to give two types of benefits as a result of their size. They have a larger level of activity, the capacity to create a sense of vitality, and the ability to provide a steady flow of material that attracts and retains people.

The strategy for building such a subscription model is just as vital, and many organizations with the same attitude as a self-sustaining community prioritize it, according to our study. As a result, we looked into the best foundation for putting such a concept into action. First and foremost, the company must determine what it aims to gain through subscription. Our recommendation is to create KPIs from the start. In addition to this, customer profiles should be created. Targeted marketing and value setting while devising the tiers is important. Finally, in order for subscription models to be effective, they must be accessible. All models should put the customer's attachment first.

The total cost of ownership is the sum of a product's purchase price and its operating costs. These are costs incurred during the course of a product's lifetime. Maintenance, installation, implementation, licensing, and updates are just a few examples. In our situation, we utilized this approach to estimate a database because data storage is a vital asset to have if you want to develop a digital community. Small businesses may compete with franchised enterprises if they work together.

According to our findings, every self-sustaining community that does not execute its own development should conform to ISO 27001, which is the most appropriate IT-governance framework among others. ISO 27001 establishes an environment and governance structure that enables the firm and its interested stakeholders to continually develop and evaluate themselves. More significantly, any self-sustaining community that seeks to monetize or exploit personally identifiable data in any way.

Using data, according to our findings, may provide several benefits to your community. First, from a commercial viewpoint, financial data from online business communities may help to enhance pricing and sales. With our data analysis for the restaurants, we were able to demonstrate our argument. It was a collection of random data from restaurants during the Covid epidemic. We were able to compare large restaurants (franchises) to small companies using data insights. We find that, despite the difficult circumstances of the pandemic, there was no significant difference between the two groups. Following that, restaurants may use data to target their consumers and enhance their offerings.

To help DRIVE MKB with their data-related questions, we looked into it and came up with an example of data that may be sold to other parties. We believe that such a scenario motivates people to start collecting data and envisioning a future for business data maturity at any scale. Data is your most significant asset for driving business transformation and, as a result, driving your company's digitalization. Externally, you may monetize your data in two ways: by selling data as a service or product, or by selling insights as a service or product. DRIVE MKB would deliver their data as a one-time product or as a subscription service to a customer under the Data as a Service model. Also, the data DRIVE MKB could sell in the future are customer and user profiles or demographic data. Finally, one of the strategies to make money from your data is email marketing. Email marketing is more beneficial than you would think since, as a direct form of contact, it allows you to engage with your audience through better organization. Customer and user profiles, as well as demographic data, are examples of data that DRIVE MKB may sell in the future. Finally, email marketing is one of the ways to profit from your data. Email marketing is more effective than you would believe since, as a direct means of communication, it helps you to better organize your interactions with your audience.

Table of Contents

1. Project definition	1
2. About the company	1
3. Background information	1
4. Goal of the project	1
5. Business Objective	1
6. Benefits and Limitations	2
7. Implementation advice	2
7.1 Base model	2
7.2 Implementation strategy	3
7.3 Subscription model	5
7.4 Tiers and the value metric	7
8. Finance	7
9. Cost of ownership	7
10. Advice on management	8
11. Governance	8
12. Data	16
13. Data use	16
14. Monetisation	16
8 Dashboard	18

1. PROJECT DEFINITION

2. ABOUT THE COMPANY

The project is called DRIVE MKB and is currently led by Carli Kleijnen who will be our project owner. It stands for “durable regional innovative flexible ecosystem.” It aims to help restaurants and retail and wishes to enable them in self-sufficient digitalisation, in the hopes of granting them more survivability and flexibility during times of crisis. The project has been subsidarised by the EU, and is done in cooperation with a set of partners such as Mindlabs, ROC Tilburg, Binnenstad Management Tilburg, Appsemble a.m.

3. BACKGROUND INFORMATION

The project was prompted by the Corona crisis. Retail and restaurants are sectors that have suffered especially under the crisis and the new (temporary) legislation endorsed by it. Although there had been a lot of creativity and entrepreneurship, to maintain turnover through home deliveries, limited openings and more, these sectors have shown they are less crisis resistant than their larger counterparts and have suffered severely. In 2020 one third of SMEs feared to be out of business without further support, before the end of the year (OECD, 2020).

4. GOAL OF THE PROJECT

The goal of the project is to prove the feasibility, technical readiness and attain a possible strategy for creating a digital community suited for the DRIVE MKB project. Unless other strategies prove better suited, this will be done in a business case, defending the benefits of a digital community for the DRIVE MKB project, and providing insight in the best way to initiate and implement such a community. Within 16 weeks –starting on the 7th of March – NextGen-Solutions will create a research-based business case on the creation of a digital community suited for the DRIVE MKB project.

5. BUSINESS OBJECTIVE

Business objectives are the main goals that an organization want to achieve within a specific timeframe that adds value to their knowledge, and/or provides a solution which improves their process and efficiency. The DRIVE MKB project is trying to enable restaurants and retail stores to reach a certain level of self-sustainability, which when applied correctly reaps huge benefits. By becoming self-sustainable, a business can ensure that the business model is able to maintain itself with limited human interaction, which as a result saves on labour-hours. Furthermore, having this characteristic helps the business with survivability in case of any crisis that impacts the world-wide market (such as Covid-19) and as a result causes a rumble in the economy. In other words, becoming self-sustainable ensures that a business is prone to crisis due to the practices adopted by this characteristic as well as digital transformation.

Given the rise of digital solutions, businesses are now opting to adopt modern digital transformation practices, which help them keep an extensive data record, that is stored in a modern format. Having strong data collection practices is essential as it helps businesses keep track of their successful products, how they are performing, and any other quantitative data point. Furthermore, most retail stores and restaurants still keep track of data using outdated techniques such as physical ledgers, which does not provide the possibility of data analytics. This also makes them crisis-prone, as keeping track of data in a modern format helps business stay up to date in their operational processes and can easily access their data from remote locations.

Finally, the main objective is to create a self-sustainable digital community that helps retail stores and restaurants enter into the age of digital transformation and offer help to other people. Through the research conducted in the research document, the characteristics of a self-sustainable community were clearly defined, as well as the different types of communities. This information provides additional insights, which will be used to achieve the objective of creating a digital community for the DRIVE MKB project. Given that ICW was used as an example to test the influence of becoming self-sustainable can impact a digital community, which is classified as a support community. The key points to a self-sustainable model for a digital support community are having products/services that add value to the members, selecting an appropriate hosting location for the community to help foster communication, and make sure the additional benefits provided to the members are desired by them. These are some of the many points regarding self-sustainability for an online community, which was discussed in further detail in the research document.

6. BENEFITS AND LIMITATIONS

The benefits and limitations are essential components of any projects as they provide the rules that dictate how the solution should look like and how it provides added value to DRIVE MKB. Our main research questions as stated in our research document is, “To what extent can analysing an existing digital community provide insight on the best practices to create a self-sustainable community for the DRIVE MKB Project?” which is the foundation of this project. In other words, we are trying to find the most effective characteristics that help make a digital community self-sufficient. Furthermore, the added value provided through this research is advice on the characteristics and best practices a digital community need to implement in order to become self-sufficient, which benefits them in their way of working. Additionally, the knowledge of becoming self-sufficient and the benefits, which are reaped should also be taken into consideration. By becoming self-sufficient a digital community can increase its longevity and as a result increase the probability of success in the market.

The limitations need to be considered as these are seen to be any obstacles that interfered with the research process or with gathering information. The main limitation was the start of the project which was two weeks later than the intended start date, which placed a time constraint on the project. This was mitigated through planning additional meetings in the beginning to make up for the time lost. Secondly, we reached out to multiple digital communities with a survey that was meant to provide additional insights on the benefits of becoming self-sustainable and what are the defining characteristics. However, after sending to about 40 different online communities we did not receive any responses, which limited the amount of primary research used in this project. Furthermore, in terms of primary research, we did not have any access to content experts on the subject matter as well as being limited to one community as the basis of our research. These limitations hampered our ability to do some practical research and observing how other communities implement the required steps to become self-sufficient.

7. IMPLEMENTATION ADVICE

Based on the research done for the research report, we devised the most suitable way for DRIVE MKB to create a fitting subscription model. The following sections provides implementation advice on such a model.

7.1 BASE MODEL

Our research proved that a subscription model is modern, a popular business strategy and well underway to be adopted by 70% of international business leaders. It is expected that people will not know better in around 30 years, than paying a subscription for everything. However, that does not mean they will just pay. One should first decide between replenishment, access, or curation as their base incentive. Curation is mainly offering goods on a timed interval or as a surprise and would make no sense in DRIVE MKB’s case. Replenishment would also target the replenishing of consumer goods; however, this is more on a household stock-oriented basis. Associated entrepreneurs, the web shop, or the physical store might make use of this, but it does not apply as well as the Access model. The Access model is the used scientific term for what DRIVE MKB’s envisioned subscription model. Customers pay for access to certain content or a premium service, usually on a monthly fee.

The customers who want to participate in communities with subscriptions usually have high expectations and they will want to see what added value they will benefit from. Ensuring that the access to exclusive content is valuable and not available for free elsewhere is key to convincing the customers to select an advanced subscription plan.

Furthermore, offering online courses or workshops to the members gives them a feeling of satisfaction that they are getting their money’s worth for the subscription. It also provides them with the opportunity to improve on certain goals, which is what is being provided by DRIVE MKB’s community.

The research done on the three different subscription types show that the access model will most likely be the model on which DRIVE MKB’s subscription is based on. This is due to the fact that most, if not all, of the benefits provided by them will be granting access to exclusive content, information, and events to the members.

Finally, by choosing this model and understanding what you are choosing, they might gain access to resources suited to further help them improve.

7.2 IMPLEMENTATION STRATEGY

The goal of the DRIVE MKB project is to support small to medium enterprises (SME's) in times of crisis, economic hardship and by doing so, also during times of economic stability/prosperity. Prompted by the COVID of recent years, retail and restaurants are sectors that have suffered especially under the crisis and the new (temporary) legislation endorsed by it. Although there had been a lot of creativity and entrepreneurship, to maintain turnover through home deliveries, limited openings and more, these sectors have shown they are less crisis resistant than their larger counterparts and have suffered severely. In 2020 one third of SMEs feared to be out of business without further support, before the end of the year (OECD, 2020) with all due economic consequences.

DRIVE MKB intends to support SME's by offering methods of digitalization. Many of these companies are severely less digital than their larger counterparts. Most small to medium businesses are ill prepared for a radical transformation on such a short notice. Gaps in digital capacity and infrastructure that existed prior to the outbreak remain, with rising threats on SME cybersecurity and data integrity. The increasing indebtedness of SMEs may pose challenges to the longer-term investments required to innovate, upgrade digital capacity, acquire new skills or reach out to new markets. Moreover, many entrepreneurs and SME employees are facing an extremely trying period, with serious consequences for their mental health and psychological well-being. Therefore, the focus lies with proving the technology readiness level of digitalization, starting a community, gathering education needs and gaining insight in the status of digital transformation of these branches. Low code applications have not yet been implemented or proven for these sectors, and a combination with an open-source community has certainly not been found. Furthermore, opportunities lie with automation of processes in general, and enabling entrepreneurs in the use of data, paving the way for making data-driven decisions. Here we intend to answer what the requirements would be for such a community.

The political climate

According to OECD, 2020, SME digitalization is recognized as a priority by many governments, as they move from management crisis to structural reforms and design recovery packages. In recent years a large mix of approaches has emerged to unleash SME and entrepreneurs' digital potential, while accounting for the great heterogeneity of the SME population and the diversity of their business ecosystems. The pandemic caused governments to look closely at this policy area, to ensure short term survivability of SMEs as well as to strengthen their digital prowess in the longer term. The Dutch government has focused on "SME Digitalization in response to the COVID-19 crisis", such as by advancing groundwork for empirical research to assess the e-commerce surge by SMEs, showcasing experiences of SMEs undergoing accelerated digital transition, and promoting knowledge exchange on increasingly important themes like teleworking and digital security. They do so in a socialistic manner with a second focus on inclusion. A number of websites (Seniorweb, KBO-PCOB, De Koninklijke Bibliotheek, Stichting Lezen en Schrijven) are already investigating the reason certain groups do not wish to partake in the digital society, claiming a larger part of the Dutch society is elderly, and therefore a large part is anxious of digitalization.

For many SMEs, it is a big step to make good use of the opportunities offered by digitization. They simply lack time, knowledge and money. Hiring expensive ICT specialists or upskilling your own staff is not an option. That is why, on the initiative of the Ministry of Economic Affairs and Climate, the program 'Accelerating the digitization of SMEs' was launched. In this program, SMEs will work in so-called 'SME Workshops digitization'. The entrepreneurs receive practical advice from students from Applied Sciences, practical studies or Universities. These students are supervised by teachers and experts. All the while students map out the knowledge and innovation demand of entrepreneurs.

Rewards and incentive

Based on our observations at International Creative Woman, a thriving digital and physical community, rewards are what drives a community. On many occasions the owner of the community explained to us that they had a stop on accepting new members, due to the high demand. As we observed the community and its members, the incentive for joining the ICW became very clear. According to us, it can be distilled down to three major factors; social contact, access to events

and knowledge/training. The reason one of the members attempts to get in contact always boils down to one of these incentives. The social contact mainly exists through the different channels ICW owns (Facebook, Instagram, Discord, and WhatsApp), and the event where the members meet physically. The way the members interact with each other and ICW observes as an informal and friendly manner of communication, and it solidifies itself as an incentive for people wanting to join communication within the channels. Within the social incentive is the networking incentive. As SME owners or start-up's, the members hope to find likeminded entrepreneurs to further their knowledge, collaborate or get in on the latest business strategies. The access to events appears to be their bestselling product, which after interviewing the owner, appears to be true. The events are always sold out almost immediately and people ask for it in advance. ICW is at a point where they have to tell people they can't join, due to the popularity of their markets or other SME enriching type of event. Access to these events alone is not only free marketing, but allows for a strong incentive to join the community, according to the employees and the members of ICW.

Self-sustainability

According to Foote (2021), size and growth are often natural indicators of whether an online community is sustainable and successful. Many of the benefits that people seek from online communities, such as information, entertainment, or novelty, seem to increase with size. Works aimed at practitioners and researchers often use metaphors like a critical mass or network effects and assume that all communities seek growth, or at least that they would be better able to meet the needs of users if they grew larger. Despite this, small online communities still exist in droves. On Reddit, one of the most popular online community sites, small communities not only exist in great numbers but many persist in their smallness over time.

These persistently small communities challenge the assumptions underlying many online community design recommendations for how to recruit more participants, encourage more contributions, and retain more users: that growth is imperative and that small communities will either become large or die off. Why do so many communities remain small throughout their "lives"? What value do participants get from small communities and how do these benefits relate to community size? Our understanding of online communities would be enriched by a deeper understanding of how motivations, participation dynamics, and perceptions vary across communities of different sizes. Rather than growth being an unalloyed good, we suggest that some benefits can be obtained only through small communities and that users may intentionally seek out the kinds of experiences that small communities distinctly provide. In this study, we focus on the long tail of small communities, exploring how and why Reddit users participate in them, through a qualitative interview study. Drawing from conversations with twenty participants of various small online communities, this paper makes multiple contributions. First, we supply evidence that small communities provide qualitatively distinct benefits to their participants, such as expertise, trust, and a supportive community. Second, we find that small communities in our sample often provide participants with a sense of camaraderie or group identity but rarely serve as a source of dyadic relationships, contrary to what prior work would suggest. Third, we present a theory that small communities are enabled by and enable a robust ecosystem of semi-overlapping topical communities of different sizes and specificity. We end by reflecting on the role of size in online communities and the importance of examining and understanding communities across different scales of sizes.

The term "online community" covers a broad range of activity in the social computing literature, and many different types of communities have been studied. As a result, CSCW (2022) literature has used the term to describe entire platforms such as Slashdot, a social news and discussion site, as well as distinct groups within those platforms such as Usenet newsgroups, Facebook groups, and Reddit subreddit communities. Unsurprisingly, because online communities are so diverse in their scopes, purposes, and topics, the motivations for participating in them are similarly wide-ranging.

The role of size in community participation

Large communities seem to provide two main kinds of benefits through their size. They maintain a higher volume of activity, the ability to produce a sense of liveliness and maintain a flow of content that can attract and retain users. Secondly, they are drawing from a larger pool of participants, the ability to not only obtain diverse knowledge and information from different participants but also in turn meet a broader set of needs. Maintaining a sufficiently large and active number of participants is a fundamental concern for online communities: if a community does not have enough active members, it will not have content for others to engage with, and the community will stagnate and eventually die. Activity is not just a basic existential concern, but something key to stimulating further engagement in the community:

contributions, posts and questions, serve as a basis to trigger further responses for example with discussions and answers. This leads to potential new members being attracted to a community when they observe an active community with content that matches their interests. As such increased interactions between individuals via posts and comments in a community can increase an individual's commitment. For example, in a study on Yahoo! Groups (2022), Backstrom found that users who later went on to become heavily-engaged in a group were far more likely to have quickly received a response to their first posting. Moreover, because participation in online communities is generally tenuous, one can easily depart a community and never come back so therefore constantly recruiting more members is crucial. Continuously attracting new members can also create the impression that a community is lively and in turn, encourage participation from others. As a result, quantitative metrics of online activity such as the number of posters and commenters per day can serve as natural indicators of a community's success and are frequently utilized by researchers. A large body of research has focused on design mechanisms and strategies to stimulate growth in both size and activity. Underpinning this approach is the assumption that all online communities will try to recruit and retain members, that is, that they will try to grow. Or put another way, communities that are meeting their members' needs will grow, because newcomers will not join, and current members will want to leave, a community that is unable to meet their needs. One of the most well-known frameworks for this kind of community growth is Kraut's Building Successful Online Communities (2012), which lays out a series of design suggestions for online community designers and managers. Derived from a rich body of research, these design mechanisms take up a top-down "social engineering" approach, wherein the basic assumption is that community managers can make design choices that will shape the community's success. This and similar work often directly or indirectly propose at least one of the following three goals:

1. Increasing the number of community members by attracting new members, crafting early experiences, and socializing newcomers.
2. Retaining existing community members via strategies to increase individuals' commitment to a community
3. Increasing contributions by and interactions amongst community members.

Two important concepts that have driven this idea of growth-as-success are network effects and critical mass. Network effects refers to the phenomenon in which the value of a good increases with the number of users and is generally used to discuss digital platforms more broadly but translates well. For example, on the peer production site Wikipedia, the more users contribute to and create articles the larger and broader a repository of knowledge Wikipedia becomes and the less likely a potential contributor would choose to contribute to a rival online encyclopaedia. Similarly, communities like subreddits which rely on user contributions are likely to benefit if they become the centre of discussion about a certain topic. The concept of critical mass comes from theories proposing how to attain successful collective action and has been applied to interactive media and more specifically, online communities, as the idea that there is some key level of participation that allows a community to reach a critical mass beyond which the community will continue to grow (Raban, 2010). Many of the reasons that people have to participate in online communities, from entertainment to information-seeking/sharing, seem at first blush to be more compelling in larger communities, and it seems like users would naturally gravitate toward ever-larger communities. Thus, in social computing literature, small communities are seen as those that are either on the path to growing or failing.

Anonymity and privacy of participants

Because most communities consist mostly of public pages as well as viewable histories of a user's activity, it could be possible to identify a user, especially those in smaller and topically-unique communities. As a result, we modify, obfuscate, or omit details that could either identify the participants, specific users, or the subreddits in question. The stories and quotes below often reflect points and issues raised by multiple interview participants.

7.3 SUBSCRIPTION MODEL

When implementing a subscription model, it is not only important not to reinvent the wheel by finding the model most commonly used (or which you are already using) and doing research on the matter or asking the right questions. The strategy of developing such a subscription model is just as important and based on our research, prioritised by many companies with the same mindset as a self-sustaining community should. Therefore, we researched the right framework for implementing such a model. First and foremost, the enterprise should decide what exactly it wants to accomplish through subscription. More revenue, faster growth? Adopting this business model requires you to define these goals early on. This helps ensure you are building the best pricing strategy possible for your specific goals. When your recurring revenue is tied directly to the monthly or annual fees, long-term strategic thinking is important. These goals will then help you define how you build your buyer personas and structure your pricing tiers. Matching the features included in your tiers with the needs of different target customers helps you craft a better overall strategy. These goals should be set at exactly the time DRIVE MKB and ICW are finding themselves at; early. This allows for growth based on the current model, iterations upon it and a higher maturity when the company itself becomes depended on these models. Our advice would be to device KPI's at the very beginning. These should include different value metrics such as the quality of the service, customer satisfaction, the demand for such a service and the return value for the customer.

“Whatever monetization strategy you choose, make sure it's a natural fit for the community you've built and that what you're selling is something they'll want.” (Kamaran, 2020)

In addition to this, customer profiles should be created. Targeted marketing and value setting while devising the tiers is important. Even if it seems all customers are alike, they are not. All customers go through the same customer journey with a normal product, however when setting tiers, the journey starts to differentiate accordingly. This can be expected of course, but when the customers are considered as a multi-identity-entity suddenly there are multiple factors to consider. Customer profiles should at least be based on;

- Social economic status
- Wealth
- Incentive
- Tier changes
- Satisfaction
- Relationship length

Finally, accessibility is a major factor in successful subscription models. All models should first prioritise attachment to the customer. This generally means having a free subscription tier which is devised in a way where the customer is brought into consistent contact with the content or is shown what a higher subscription tier includes. This attachment will create a lower barrier for new potential customers to join. In addition, you cannot push customers to far when applying monetisation or introducing marketing for higher tiers. Based on the research we have done, higher subscription tiers are usually conveyed by offering free insights, no different than the value of the free subscription tier. The crux of these free advertisements hoping to create incentive is mainly to make sure the costs do not outweigh the benefits.

7.4 TIERS AND THE VALUE METRIC

Every company should put effort in, and be careful about deciding the value metric and the cost for the respective tiers. The value metric with which it sets its prices can be either quantitative, usage, feature sets or based on how your customers perceive the product. The number of tiers should allow you to capture the market by targeting different market segments (customer profiles) without losing out on revenue. Basically, your pricing model and strategy could make-or-break your business; apart from the tangible monetary consequences, it is one of those intangible yardsticks that have a major share of influence on your customer's/prospect's perception of your business.

Value metric boils down to data maturity. A company should be aware of why customers procure a subscription and determine what exactly holds value for the customer. Based on this the model can be adapted to reflect exactly that value further in the use of the tiers. When all customers are after is knowledge, tiers should reflect this by for example working from resources, to physical books, to live feedback to workshops and one-on-one conversations.

8. FINANCE

9. COST OF OWNERSHIP

A total cost of ownership is the buying price of a product combined with its operational costs. These are expenses incurred during the product's life that is being used. For example, this can be a maintenance, installation, implementation, licensing, and upgrades. The formula is: **Purchase Price + Cost incurred during the useful life of the product**. If we want to expand the formula, we will need to calculate the price of buying the product plus adding the expenses minus the remaining value of the product/property (Salvage value). In our case, we are going to estimate database example with this formula because if you want to build digital community, data storage is important asset to have. In combination with working together small business can compete with franchised companies.

Acquisition cost	Operating cost	Maintenance cost	Salvage value	Plan for 1 year
Example:	Example:	Example:	Example:	Total:
Google cloud subscription	More storage or extra software	Database maintenance or updates	Could be equal to resale value	
\$6 per month	\$0.026 per GB of storage Starting GB – 30	\$0 - Standard support	No value	\$72.52 with 20 GB extra storage

10.ADVISE ON MANAGEMENT

11. GOVERNANCE

As per our research, any self-sustainable community that does not perform their own development should adhere to the ISO 27001, as the most suitable IT-governance framework compared to others. ISO 27001 creates an environment and a governance framework that allows for constant improvement and evaluation of the company and its interested stakeholders. More importantly, any self-sustaining community that wishes to monetise or otherwise use personally identifiable data. Adhering to the GDPR and AVG policies both globally and nationally emphasises a certain responsibility when devising such an enterprise based on “people”. In the following advice we have selected the most important measures that should be taken when adhering to the ISO 27001 applicable to any digital community, both DRIVE MKB and ICW.

Of course, the organisation should try to advance further in the governance frameworks maturity as they see fit, but the following is deemed the bare minimum. For each security category from the Information Security Code, the organizational objectives and the starting points for the measures to be taken are set out. The numbering in this document corresponds to the Information Security Code (ISO 27001 Annex A).

A. 5 Information security policy

A.5.1 Management of information security

Objective

Providing management and support for information security in accordance with business requirements and relevant laws and regulations.

Principles

1. The management has approved the information security policy, published it internally and made it known to all employees, hired personnel and relevant external parties.
2. The Strategic IORP policy shall be reviewed at scheduled intervals, or as soon as significant changes occur, and, if necessary, strengthened to ensure that it remains appropriate, adequate and effective.

A.6 Organizing information security

A.6.1 Internal organization

Objective

Establish a management framework to initiate and control the implementation and execution of information security within the organization.

Principles

1. All responsibilities in information security should be defined and assigned.
2. Conflicting tasks and responsibilities should be separated to reduce the likelihood of unauthorized or unintentional alteration or misuse of the organization's assets.
3. Appropriate contacts should be maintained with relevant public authorities.
4. Appropriate contacts with special interest groups or other specialized security for a and professional organizations should be maintained.
5. Information security should be addressed in project management, regardless of the type of project.

A.6.2 Mobile devices and teleworking

Objective

Ensuring the safety of teleworking and the use of mobile devices.

Principles

1. Policies and supporting security measures should be established to manage the risks posed by the use of mobile devices.
2. Policies and supporting security measures should be implemented to protect information accessed, processed or stored from teleworking locations.

A.7 Safe staff

A.7.1 Prior to employment

Objective

Ensure that employees and contractors understand their responsibilities and are fit for the roles for which they are eligible.

Principles

1. Verification of the background of all candidates for employment should be carried out in accordance with relevant laws, regulations and ethical considerations and should be proportionate to the business requirements, the classification of the information to which access is granted and the risks identified.
2. The contractual agreement with employees and contractors should state their responsibilities for information security and those of the organization.

A.7.2 During employment

Objective

Ensure that employees and contractors are aware of and comply with their information security responsibilities.

Principles

1. Management should require all employees and contractors to apply information security in accordance with the organization's established policies and procedures.
2. All employees of the organization and, where relevant, contractors should receive appropriate awareness education and training and regular training of the organization's policies and procedures, as relevant to their role.
3. There should be a formal and communicated disciplinary procedure to take action against employees who have committed an information security breach.

A.7.3 Termination and modification of employment

Objective

Protecting the interests of the organization as part of the employment change or termination procedure.

Principles

Responsibilities and tasks related to information security that remain in effect after termination or change of employment should be defined, communicated to the employee or contractor, and performed.

A.8 Asset management

A.8.1 Responsibility for assets

Objective

Identify organizational assets and define appropriate responsibilities for protection.

Principles

1. Assets associated with information and information processing facilities should be identified, and an inventory of these assets should be established and maintained.
2. Assets that are tracked in the inventory overview should have an owner.
3. For the acceptable use of information and of assets associated with information and information processing facilities, rules should be identified, documented and implemented.

4. All employees and external users should return all assets of the organization in their possession upon termination of their employment, contract or agreement.

A.8.2 Information classification

Objective

Ensure that information receives an adequate level of protection consistent with its importance to the organization.

Principles

1. Information should be classified with respect to legal requirements, value, importance and sensitivity to unauthorized disclosure or alteration.
2. To label information, an appropriate set of procedures should be developed and implemented in accordance with the information classification scheme established by the organization.
3. Procedures for handling assets should be developed and implemented in accordance with the information classification scheme established by the organization.

A.8.3 Handling media

Objective

Prevent unauthorized disclosure, alteration, deletion or destruction of information stored on media.

Principles

1. To manage removable media, procedures should be implemented in accordance with the classification scheme established by the organization.
2. Media should be deleted in a safe and secure manner when they are no longer needed, in accordance with formal procedures.
3. Media containing information should be protected from unauthorized access, misuse or corruption in transit.

A.9 Access security

A.9.1 Operating requirements for access security

Objective

Restrict access to information and information processing facilities.

Principles

1. An access security policy should be established, documented and reviewed based on company and information security requirements.
2. Users should only have access to the network and network services for which they are specifically authorized.

A.9.2 Management of user access rights

Objective

Ensure access for authorized users and prevent unauthorized access to systems and services.

Principles

1. A formal registration and opt-out procedure should be implemented to allow for the assignment of access rights.
2. A formal user access granting procedure should be implemented to assign or revoke access rights for all types of users and for all systems and services.
3. The allocation and use of sensitive or special access rights should be restricted and controlled.
4. The allocation of secret authentication information should be controlled through a formal management process.
5. Asset owners should regularly review user access rights.
6. The access rights of all employees and external users to information and information processing facilities should be deactivated and deleted upon termination of their employment, contract or agreement, and in the event of changes, they should be modified.

A.8.2 Information classification

Objective

Ensure that information receives an adequate level of protection consistent with its importance to the organization.

Principles

1. Information should be classified with respect to legal requirements, value, importance and sensitivity to unauthorized disclosure or alteration.
2. To label information, an appropriate set of procedures should be developed and implemented in accordance with the information classification scheme established by the organization.
3. Procedures for handling assets should be developed and implemented in accordance with the information classification scheme established by the organization.

A.8.3 Handling media

Objective

Prevent unauthorized disclosure, alteration, deletion or destruction of information stored on media.

Principles

1. To manage removable media, procedures should be implemented in accordance with the classification scheme established by the organization.
2. Media should be deleted in a safe and secure manner when they are no longer needed, in accordance with formal procedures.
1. Media containing information should be protected from unauthorized access, misuse or corruption in transit.

A.9 Access security

A.9.1 Operating requirements for access security

Objective

Restrict access to information and information processing facilities.

Principles

1. An access security policy should be established, documented and reviewed based on company and information security requirements.
2. Users should only have access to the network and network services for which they are specifically authorized.

A.9.2 Management of user access rights

Objective

Ensure access for authorized users and prevent unauthorized access to systems and services.

Principles

1. A formal registration and opt-out procedure should be implemented to allow for the assignment of access rights.
2. A formal user access granting procedure should be implemented to assign or revoke access rights for all types of users and for all systems and services.
1. The allocation and use of sensitive or special access rights should be restricted and controlled.
2. The allocation of secret authentication information should be controlled through a formal management process.
3. Asset owners should regularly review user access rights.
4. The access rights of all employees and external users to information and information processing facilities should be deactivated and deleted upon termination of their employment, contract or agreement, and in the event of changes, they should be modified.

A.11.2 Equipment

Objective

Prevent loss, damage, theft or compromise of assets and interruption of the organization's business operations.

Principles

1. Equipment should be positioned and protected in such a way as to reduce risks of external threats and dangers, as well as the likelihood of unauthorized access.
2. Equipment should be protected from power outages and other disturbances caused by utility disruptions.
3. Power and telecommunications cables for transmitting data or supporting information services should be protected against interception, interference or damage.
4. Equipment should be properly maintained to ensure its continuous availability and integrity.
5. Equipment, information and software should not be taken from the site without prior approval.
6. Assets located outside the site should be secured, taking into account the various risks of working outside the premises of the organization.
7. All parts of the equipment containing storage media should be verified to ensure that sensitive data and licensed software have been removed prior to disposal or reuse or reliably securely overwritten.
8. A clean desk policy for paper documents and removable storage media and a clear screen policy for information processing facilities should be established.

A.12.2 Malware protection

Objective

Ensure that information and information processing facilities are protected from malware.

Principles

- To protect against malware, detection, prevention, and remediation controls should be implemented, combined with user awareness.

A.12.3 Backup

Objective

Protect against data loss.

Principles

1. Backup copies of information, software, and system images should be regularly created and tested in accordance with an agreed backup policy.

A.12.6 Technical vulnerability management

Objective

Prevent exploitation of technical vulnerabilities.

Principles

1. For the installation of software by users, rules should be established and implemented.

A.13 Communication security

A.13.1 Network Security Management

Objective

Ensure the protection of information in networks and the supporting information processing facilities.

Principles

1. Networks should be managed and controlled to protect information in systems and applications.
1. Security mechanisms, service levels and management requirements for all network services should be identified and included in network service agreements. This applies both to services provided in-house and to outsourced services.
2. Groups of information services, users and systems should be separated into networks.

A.13.2 Information transport

Objective

Maintain the security of information exchanged within an organization and with an external entity.

Principles

1. In order to protect the transport of information, which passes through all types of communication facilities, formal transport policies, procedures and controls should be in place.
2. Agreements should relate to the secure transport of business information between the organization and external parties.
3. Information contained in electronic messages should be adequately protected.
1. Requirements for confidentiality or non-disclosure agreements that reflect the needs of the organization with regard to the protection of information should be established, regularly reviewed and documented.

A.14 Development and maintenance of information systems

A.14.1 Security requirements for information systems

Objective

Ensure that information security is an integral part of information systems throughout the life cycle. This includes the requirements for information systems providing services over public networks.

Principles

1. Information security requirements should be included in the requirements for new information systems or for extensions of existing information systems.
2. Information that is part of performance services and that is exchanged over public networks should be protected against fraudulent activities, disputes about contracts and unauthorized disclosure and alteration.
3. Information that is part of application transactions should be protected to prevent incomplete transmission, misdirection, unauthorized modification of messages, unauthorized disclosure, unauthorized reproduction or playback.

A.15 Supplier relations

A.15.1 Information security in supplier relationships

Objective

Ensure the protection of the organization's assets that are accessible to suppliers.

Principles

1. Information security requirements to reduce risks related to the supplier's access to the organization's assets should be agreed and documented with the supplier.
2. All relevant information security requirements should be established and agreed with any vendor that accesses, processes, stores, communicates or provides IT infrastructure elements for the purposes of the organization's information.
3. Agreements with suppliers should include requirements relating to the information security risks related to the supply chain of information and communication technology services and products.

A.15.2 Management of supplier services

Objective

Maintain an agreed level of information security and service delivery in accordance with the supplier agreements.

Principles

1. Organizations should regularly monitor, assess and audit the services provided by suppliers.
2. Changes in supplier services, including enforcement and improvement of existing information security policies, procedures and controls, should be managed, taken into account business information, systems and processes involved, and risk reassessment.

A.18 Compliance

A.18.1 Compliance with legal and contractual requirements

Objective

Prevent violations of legal, statutory, regulatory or contractual obligations regarding information security and security requirements.

Principles

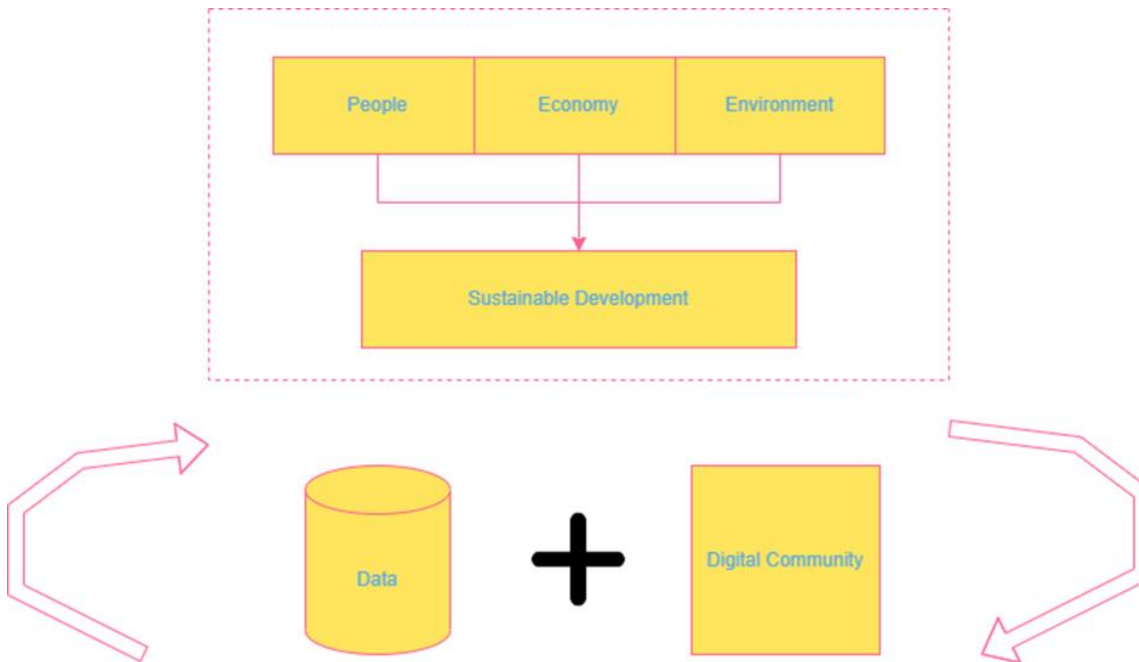
1. All relevant statutory, regulatory, contractual requirements and the organization's approach to meeting these requirements should be explicitly identified, documented and kept up to date for each information system and the organization.

1. In order to ensure compliance with legal, regulatory and contractual requirements relating to intellectual property rights and the use of proprietary software products, appropriate procedures should be implemented.
2. Registrations should be protected from loss, destruction, falsification, unauthorized access and disclosure in accordance with legal, regulatory, contractual and business requirements.
3. Privacy and protection of personal data should, where applicable, be guaranteed in accordance with relevant laws and regulations.
4. Cryptographic controls should be applied in accordance with all relevant agreements, laws and regulations.

12.DATA

13. DATA USE

Based on our research for Drive MKB project, we found three main characteristics for sustainability in digital communities. There are social, economic, and environmental development. Most of sustainable communities are focusing on these categories while trying to minimize the impact on the environment.



According to our research, using data can have many benefits for your community. First, looking the economy perspective, the financial data from online business communities can improve pricing and sales. In general, 1% increase in pricing results in an 8.7% increase in operating profits. We proved our point with the data analysis for the restaurants that we did. It was random data set from restaurants during Covid pandemic. Using data insights, we were able to compare big restaurants (franchises) with small businesses. We conclude that even though the hard times during the pandemic, there was no big difference between the two groups. Next, restaurants can target their customers and improve their products using data. For instance, they can create client surveys for general feedback. Finally, data can help to grow your community. We found that information such as age, location, and sector really can influence your business growth according to research on the economies of the United States, Germany, Australia, and Scotland.

14. MONETISATION

To accommodate DRIVE MKB in their need for advice on the use of data we looked into, and provided an example of data one could sell to third parties. We hope that such a casus provides incentive to really start collecting data and seeing a future in data maturity of the enterprise on any scale possible. Data is your most valuable asset for driving business transformation, and as such drive the digitalisation of the company.

According to Gartner (2019), “Data and analytics can be a valuable business asset that will not only improve business decisions and drive digital business transformation, but even generate new revenue for your organization.” Whether they realize it or not, most organizations can monetize their existing data. It starts by identifying the data’s value-add to a new audience.

According to our research, DRIVE MKB could provide their data as a service (DaaS). There are two ways to monetize your data externally; either by offering data as service or product, or by offering insights as a service or product. Data as a

service is access to raw and governed data sets, information that consumers can use however they want. Insights as a service pertains to a guided analytics solution where insights are presented in pre-built visualizations and reporting to guide analysis.

Data as a Service entails that DRIVE MKB would provide their data either as a one-time product or as a subscription service to a data set that is constantly updated. For example, Gartner, which is considered the industry standard for grading data analytics tools and vendors, sells access to its premium data about the specific tools and vendors it ranks. As an organization, you can provide access to your own data in a variety of ways, including in one of the online marketplaces, a downloadable data dump, or via an API that you make accessible to other organizations. However, DRIVE MKB could also opt to provide a one time set of data, simply by selling a sheet, .csv file or a snapshot. Of course, this would entail privacy governance as described by ISO27001 in this document and the thorough anonymisation of data. Data that DRIVE MKB could generate in the future is in multitudes. However, they have already had a few requests for data from third-companies. In any case, no matter our research, the obvious demand is always best to use as a guidance into what data to collect, and where to divert your resources. That being said, we looked into what data is both attractive, and generatable by DRIVE MKB.

Data is valuable because it helps companies understand customers and prospects more accurately, predict business or social trends and changes and make more money. First, we looked at the incentive data from DRIVE MKB could provide. Data purposes that DRIVE MKB could address for third parties would be;

- Better tailoring products or services (including the website or ecommerce experience) to target consumers
- Advertising more accurately
- Statistical analysis or other quasi-scientific uses

As such the data DRIVE MKB could sell in the future are customer and user profiles or demographic data. All is well and done in the GDPR age without personally identifiable data. If the data does not lead back to a person its free game and can be sold. The government, marketeers, and others would be interested in what kind of business goes with what age, what gender, what ethnical background. Below one can find an example but more columns would mean more value. Data such as this can be gathered from social media channels, client profiles and internal business overviews.

A	B	C	D	E	F
ID	Gender	Age	Eth_Bg	Business_type	Year of start
1	Male	52	Belgian	Cleaning	2018

DRIVE MKB could sell the data from their web shop or other online businesses. For example;

- What have you browsed before the purchase?
- Do you buy during the day, in the afternoon, or late at night?
- Do you buy on weekdays or weekends?
- How many times you have visited the online store before buying?
- Did you look at similar products or not?
- What colour and pattern were the t-shirt?
- If there were some words printed on the t-shirt, what do they mean?
- How may these words relate to your worldviews?
- Do these words mean that you are single or married or have children?
- Do these words mean that you support a certain NBA team?

- Did you buy the same t-shirt size as the last time, or you have added some weight?

And finally DRIVE MKB could sell the data, or attract investors by showing the demographic and business data of immigrants with a non-Dutch background. The data could provide better insight for humanitarian organisations, the social network of the city or provide statistics researchers might use.

Finally, one of the strategies to make money from your data is email marketing. Email marketing is more beneficial than you would think since, as a direct form of contact, it allows you to engage with your audience through better organization. Moreover, you will be able to increase sales, enhance your existing database, and create trust in order to target your audience. Because using data in your email marketing campaigns allows you to determine who your consumers are, what they want, and when they require it.

8 DASHBOARD

This is a dashboard created in order to simulate the user engagement on an online community platform, that has been integrated with Power BI. The dashboard visualizes many factors that are essential for monitoring a digital community and observing which users are interacting. This is where digitalization will heavily influence DRIVE MKB, if implemented in the correct way and maintained to ensure that KPIs (Key Performance Indicators) are accurate and reliable. In order to prove the importance of data for a community such as the DRIVE MKB project, we created a simple dashboard using mock data to display some visuals which could provide additional insight to how the community is running.

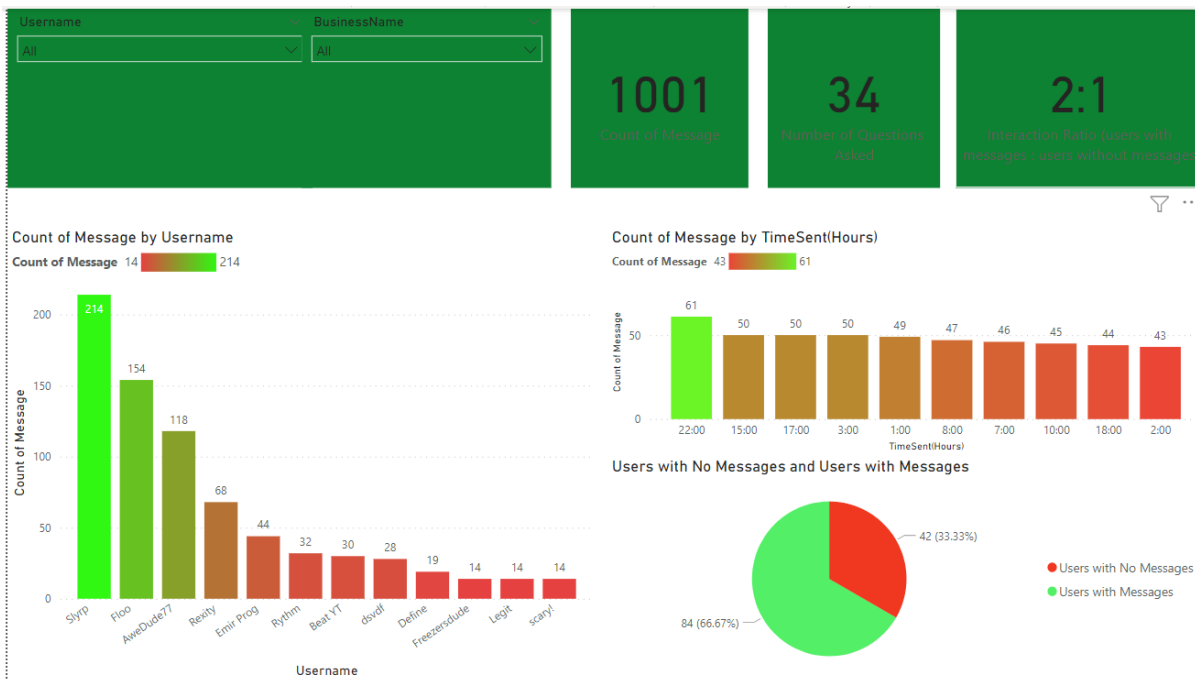


Figure 1; Mock Dashboard (General)

The picture shown above display the general look of the dashboard with no filters applied to display how the community is operating at a quick glance. The first two slicers (filters) on the top left of the dashboard can select specific users or businesses to show the data for that specific entry. Furthermore, the three cards on the top right display (from right to left) the total number of messages sent in the community, how many messages sent contained questions, and finally the engagement ratio. This ratio shows how many are interacting in the community compared to the number of member's who are not active as a ratio, which in this example is a 2 to 1 ratio. This means that every two people who engage in the community there is one person who is not engaging. The visual on the bottom left displays the top 10 users in terms of messages sent, which gives an idea on the most active users. The visual on the middle-right side of the dashboard shows which times are the most common among users to send messages during that time. By knowing this information, DRIVE MKB can understand what time their users are mostly active in, and as a result can publish announcements or events

during these times to get the most interactions. Finally, the bottom right visual displays a pie chart that compares the number of users with at least one message sent to the users who have not sent any messages.



Figure 2; Mock Dashboard (Username filter applied)

This dashboard shows the same visuals as the previous image, however there is a filter applied for one specific username. This functionality could help DRIVE MKB view the engagement statistics for one specific user to see the times they send messages and how many questions they ask. This provides a good overview if a more specific analysis is required. The process of selecting a filter is as simple as clicking on the top left dropdown menu and selecting the desired user. The card on the top right showing the interaction ratio remains unchanged as it is independent from all applied filters.



Figure 3; Mock Dashboard (Business name filter applied)

Once more, the image above shows the same visuals as the general dashboard however, they are filtered on a specific business name. This filter utilizes the same logic as the previous image, which provides a more detailed overview on any

desired restaurant or retail store registered with DRIVE MKB. Using this filter DRIVE MKB are able to see all the employees of this business and how are they interacting on the community with the same KPIs, such as number of questions asked, time slots of the messages, and much more. The same process is applied here to select a specific business by clicking the dropdown menu for the business name and selecting any option.

The idea of the dashboard shown above is to show the numerous possibilities DRIVE MKB could do if they collect sufficient data that can be displayed in a dashboard. There are additional features and functionalities that can be added using real data, as the data used here was mock data. Additional features could include analysing the response time from a message being sent to a reply coming in. Additionally, to have access to the digital community's data on Power BI an app integration is required between the two software in order to receive the live data to create the required analytics.

Discord is a third-party application. Currently, Power BI does not support interactions using Discord directly. However, there are many automation options available, often free. Automate.io, PowerApps and Mendix are strong examples.

Furthermore, such a solution can help them keep track of their community and monitor different user's interaction to observe any possible problem areas, which need to be addressed. By utilizing their data in this manner, DRIVE MKB can begin to show some good visualizations as well as providing additional insights on the general status of the community, thus proving the importance of data collection through digital transformation on a digital community.