

Integrating projects of Digital Marketing and Secure Communications to customers through encrypted API or Systems to eliminate hacking and Scams.

Name: Md Masud Rana

Student Number: 2206988

Integrating project [ACHA-4008]

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Abstract:

Digital marketing and secure communications are crucial aspects of modern business operations. However, they also come with risks such as hacking and scams that can compromise customer data and trust. To address these challenges, implementing encrypted APIs (Application Programming Interfaces) or Systems can be a cost-effective way to enhance security and protect against cyber threats.[1]

Data is encoded throughout the encryption process so that it can only be read by someone with the proper decryption key [3]. Sensitive client data can be protected during transmission and storage by using encrypted APIs or apps, which lowers the possibility of unauthorised access or data breaches. Strong authentication and authorisation techniques should be used to make sure that only authorised users may access the APIs or apps [4]. This may entail the application of safe authentication protocols like OAuth, multiple-factor authentication (MFA), or other accepted authentication techniques [5]. Conduct routine security audits and updates on your APIs or apps to find and fix any potential issues [6]. To make sure that your APIs or apps are secured against known security vulnerabilities, stay up to date with the most recent security patches and updates [7]. Inform our clients about the value of secure communications and how to spot phishing or scam attempts. Raise awareness of potential security hazards in digital communications and provide clear instructions on how to use your encrypted APIs or apps securely [8]. Implement monitoring and logging systems to instantly identify and react to any suspicious activity or security events. This can assist you in identifying and minimising any security breaches before they seriously impact your organisation [9]. To preserve customer data and uphold legal compliance, make sure that your digital marketing and communications plans abide by pertinent laws like the GDPR, CCPA, or other data privacy and security legislation [10].

We can create a more secure and reliable digital marketing and communications environment for our consumers by adopting encrypted APIs or systems in terms of cost-effective way as this project planned and implemented. To effectively respond to changing threats and guard against hacking and frauds, it's crucial to regularly review and upgrade your security measures.

Chapter One: The Problem /Introduction

Introduction:

Digital marketing has revolutionized the way businesses communicate with customers, but it also presents risks such as hacking and scams that can compromise sensitive information [11]. To mitigate these risks, a secure communications system that leverages encrypted APIs and systems can provide robust protection [12]. This project aims to develop such a system to ensure secure communications in digital marketing, safeguarding customer data and building trust in a cost-effective way for a new start up business or SME [13]. It is not an issue for big company as they have resources including Finance and Human resources / Marketing department. But the new startup and small company like us has neither enough money nor staff to do the job [1]. In this situation, Startup or SME need to introduce a project where it can be done with free resources.

Aim:

The Aim of the project is to create value for the Startup and SME with Digital Marketing and make the secure presence in online through encrypted API or system to eliminate hacking and Scams.

Objectives:

The project success depends on the below objectives in terms of cost effective and deliver the goals of the business.

Develop an encrypted API and system that enables secure communications between businesses and customers in digital marketing.

Implement state-of-the-art encryption techniques to protect against hacking and scams, ensuring confidentiality, integrity, and authenticity of data.

Create a seamless and user-friendly interface that enables businesses and customers to communicate securely without compromising usability.

Conduct comprehensive testing to identify and address any vulnerabilities or weaknesses in the system, ensuring its reliability and security.

Chapter Two: Review of Related Literature

Methodology:

Research and Analysis: Conduct a thorough analysis of current digital marketing practices and identify potential vulnerabilities and threats that can be exploited by hackers and scammers. Research encryption technologies and best practices for secure communications in digital marketing. Also, we have to conduct a thorough analysis of our target audience before starting to develop our digital marketing strategy, it's essential to understand who our ideal customer is and where they spend their time online. This will help you create targeted campaigns that resonate with our audience and drive conversions.[14]

Develop a comprehensive digital marketing plan: Once we have a clear understanding of the target audience, we can start developing a digital marketing plan that includes a mix of channels such as search engine optimization (SEO), pay-per-click (PPC) advertising, social media marketing, email marketing, and content marketing.[15]

User Interface Design: Create an intuitive and user-friendly interface for the API and Syetem that prioritizes security without sacrificing usability. Consider aspects such as ease of navigation, clear messaging, and user authentication to enhance the user experience.[16]

System Development: Develop an encrypted API and app that implements robust encryption techniques, to protect communications between businesses and customers. Implement authentication and authorization mechanisms to ensure secure access.[17]

Testing and Evaluation: Conduct rigorous testing, including penetration testing and vulnerability assessments, to evaluate the security and reliability of the encrypted API and app. Identify and address any weaknesses or vulnerabilities discovered during testing.[18]

Documentation and Deployment: Document the system's architecture, encryption methodologies, and deployment guidelines to ensure proper implementation and configuration. Deploy the system in a secure environment, following industry best practices and standards.[19]

Monitor and analyse the results: To ensure that your digital marketing efforts are paying off, it's crucial to regularly monitor and analyse your results. Use tools like Google Analytics to track website traffic, engagement rates, and conversions. Use this data to optimize your campaigns and improve your ROI.[20]

By following these steps, it can create value for your SME through digital marketing and establish a secure online presence that helps to protect our business and our customers.

Chapter Three: Design & Implementation

Project:

Integrating projects of Digital Marketing and Secure Communications to customers through encrypted API or System to eliminate hacking and Scams.

Project Objectives:

Digital Marketing and Secure Communications to customers through encrypted API or system to create value and eliminate hacking and Scams in a cost-effective way.

Resources:

4 Employees including Director and Manager.

2 Hours in Day * 4 Person = 8 Hours in Day

2 Desktop, 2 Laptop and 1 Office mobile phone.

Microsoft 365, Google workplace.

Facebook and WhatsApp.

Free training from Google and LinkedIn.

Grant / Loan and resources from GOV UK and local council etc.

Deliverables:

Establish the secure communication through email, WhatsApp Business by 28th February 2023

Setup the automated digital marketing by 31st March 2023

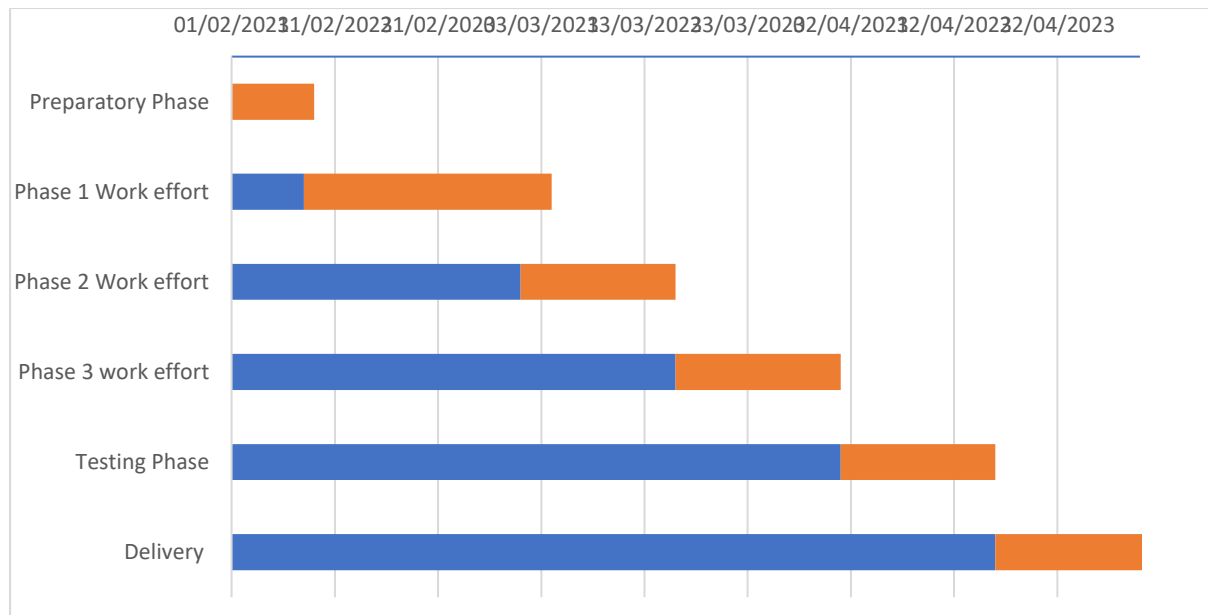
Finished the integrating project of digital marketing with secure communication by 30th April 2023.

Project roadmap and timeline:

Generally, the startup or small business has no dedicated staff for marketing and communication, so we are taking 2 hours from 4 employees including director and manager.

Also, we design the project in terms of budget, Human resources, and time schedule as below.

GAANT CHART:



Setup project for 3 months – one months for design, one month for implementation and one month to review.

Month 1:

Phase	Start Date	End Date	Duration (Days)
Preparatory Phase	01/02/2023	08/02/2023	8

We decided to do brainstorming for one weeks, after one week we the project described as below.

Phase 1 Work effort	08/02/2023	28/02/2023	20
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We build up WhatsApp business profile using office dedicated mobile number and setup the email with Google and Microsoft. WhatsApp business profile give you all the information a new customer needs and to communicate with existing client efficiently. We will automate the customer queries with automation and integrate with AI to boost customer service. Because more than 1.6 billion people uses WhatsApp through mobile, so it is very convenient to communicate and free [21]. Beside this, we can call and message to any WhatsApp user in anywhere in the world. What can expand our customer base not in the local area but around the world. Not only fulfil the goal with provide excellent customer services but also fulfilled objectives of reduce customer wait time to one minute. In addition, we can send documents to dedicated customers with end-to-end encryption. And getting acknowledge when open it instantly. We also send our invoices and any file through messaging. We set up the WhatsApp to our desktops and laptop to collaborate the team and to provide the excellent customer's service.[22]

We made a group for all the employees inside the WhatsApp, so we can group call, briefing set the goal for daily and review. As every employee and most customer uses WhatsApp, so there is no cost to communicate and also easy to use with end-to-end encryption.

Month 2:

Phase 2 Work effort	01/03/2023	15/03/2023	15
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Make a website from free site builder like google site [23] or it can be done in wix.com [24].

Then build up site within one month and integrated with WhatsApp business number (free of subscription) and email like Gmail so can use all the powerful tools with free of cost and strong security.

Then we broadcast the marketing poster and website to new and existing client.

Phase 3 work effort	16/03/2023	31/03/2023	16
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In the meantime, we create a Facebook profile [25] and business page with our WhatsApp number. And join into group and publish our advertising for marketing.

Month 3:

Testing Phase	01/04/2023	15/04/2023	15
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It is just connecting the dot, because everything to do it but Knowledge and impletion was missing to make a delicate communication channel what can turn a startup to multinational company.

Delivery	16/04/2023	30/04/2023	15
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By the end of the month 3, we reviewed our project; it seems customer is very satisfied with quick reply and easy to access the documents in the palm of hand.

Out of scope:

Server system

Sophisticated website with high SEO rating.

Chapter Four: Presentation and Analysis of Results (with screen dumps)

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Aim of the Project

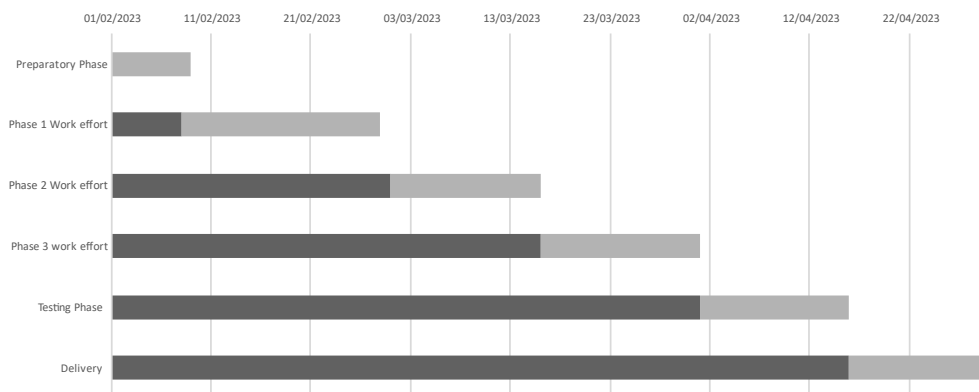
- The Aim of the project is to create value for the SME with Digital Marketing and make the secure presence in online through encrypted API or system to eliminate hacking and Scams.

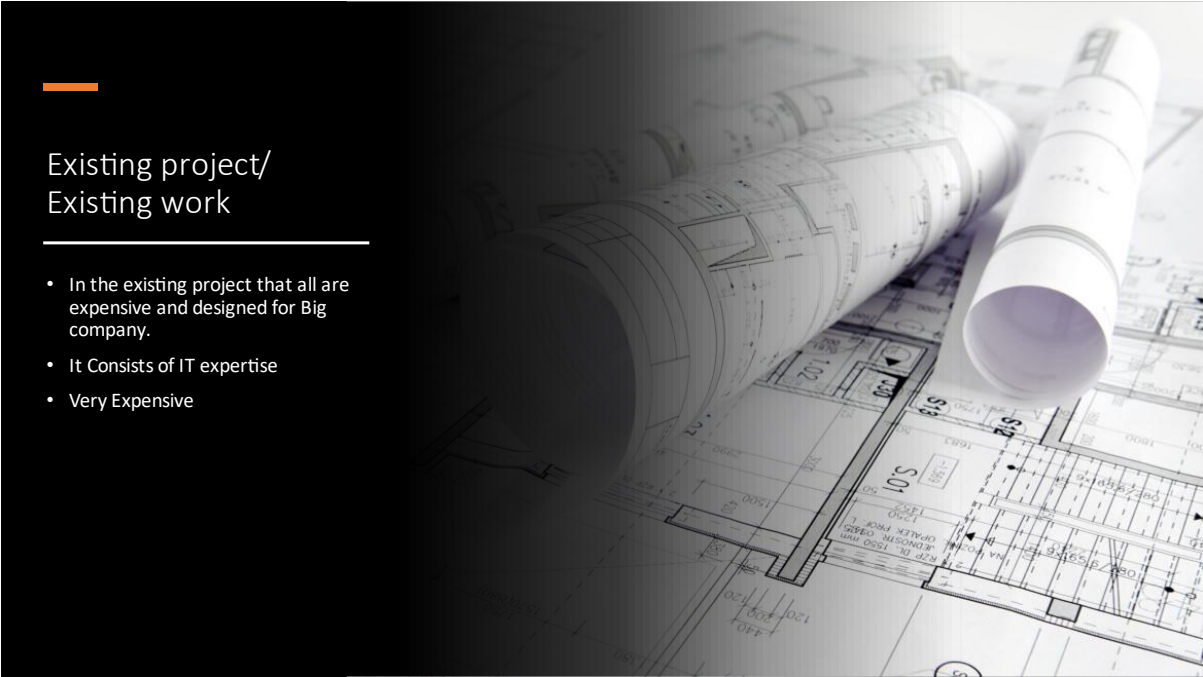
Objectives of the project

- Develop an encrypted API and system that enables secure communications between businesses and customers in digital marketing.
- Implement state-of-the-art encryption techniques to protect against hacking and scams, ensuring confidentiality, integrity, and authenticity of data.
- Create a seamless and user-friendly interface that enables businesses and customers to communicate securely without compromising usability.
- Conduct comprehensive testing to identify and address any vulnerabilities or weaknesses in the system, ensuring its reliability and security.



Gantt Chart



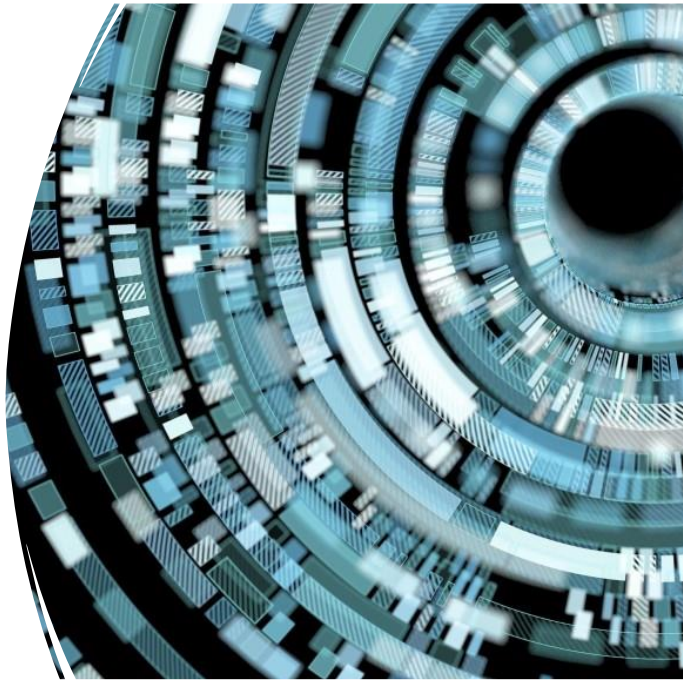


Existing project/ Existing work

- In the existing project that all are expensive and designed for Big company.
- It Consists of IT expertise
- Very Expensive

Proposed Project

- The idea of this project is to Digital Marketing and Secure Communications to customers through encrypted API or Apps to eliminate hacking and Scams.
- The Challenges which are seen in the exiting is unawareness of online sales through popular app, afraid of hacking and expensive and it can be fixed by popular and friendly user app and API
- Advantages of this project is Cheap, user friendly and military grade security.

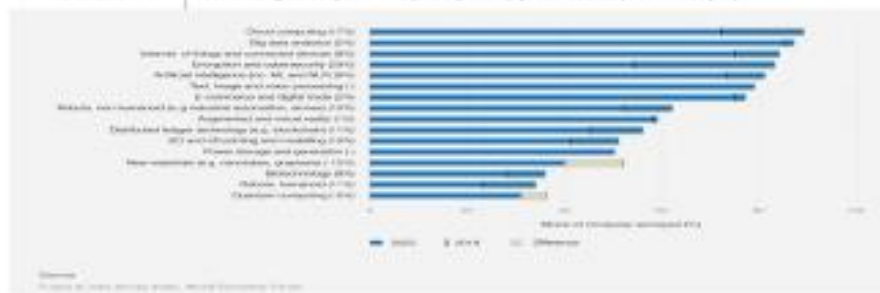


ARE YOU READY FOR THE FIFTH INDUSTRIAL REVOLUTION?



Ref: Regenesys Business School (2022) The Fifth Industrial Revolution & www.ncbi.nlm.nih.gov

FIGURE 1.8 Technologies likely to be adopted by 2030 (by share of companies surveyed)



Get Ahead in your career with an Apprenticeship in the below sector:

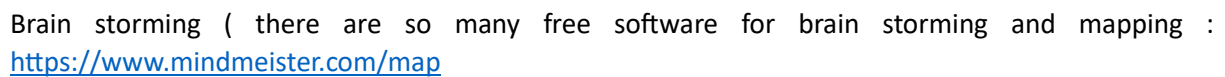
Cyber Security

2022 is a highly formative year for the cybersecurity profession. We estimate the size of the global cybersecurity workforce at 4.7 million people. To adequately protect cross-industrial enterprises from increasingly complex modern threats, organizations are trying to fill the worldwide gap of 3.4 million cybersecurity workers; REF: *Cybersecurity Workforce Study* (2022). The average Salary for Cyber Security Jobs is £62,500; REF: *CS salaries on CWJobs*. (2022). The Global Cybersecurity market is expected to be worth USD 266.2 billion by 2027: REF: *MarketsandMarkets* (2022) *Cyber Security Market Share, Size, Trends - [2022 - 2027]*.

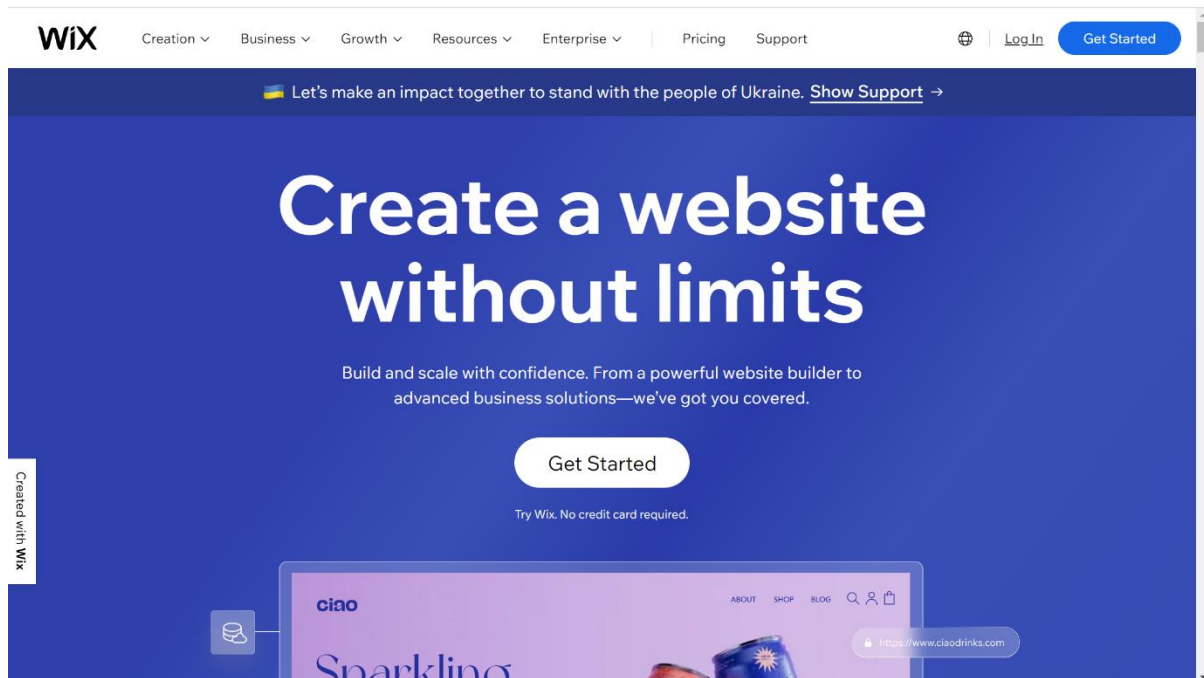
Also, we are offering funded Digital skills training to unemployed people in your area. Funding is limited so apply early to avoid disappointment.

For more information,
please call us on 0123436789.
Email: info@mr9consultancy.com
www.mr9consultancy.com

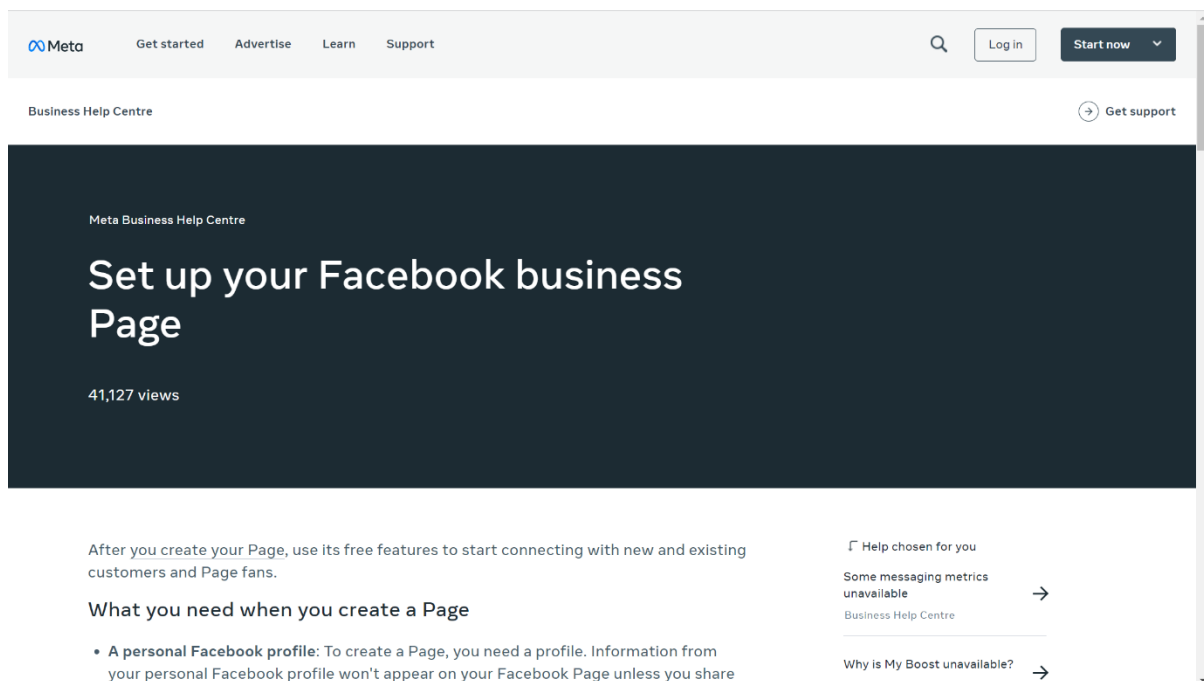
Free Poster like above can be created by free tools and website.



Google site: Free website builder

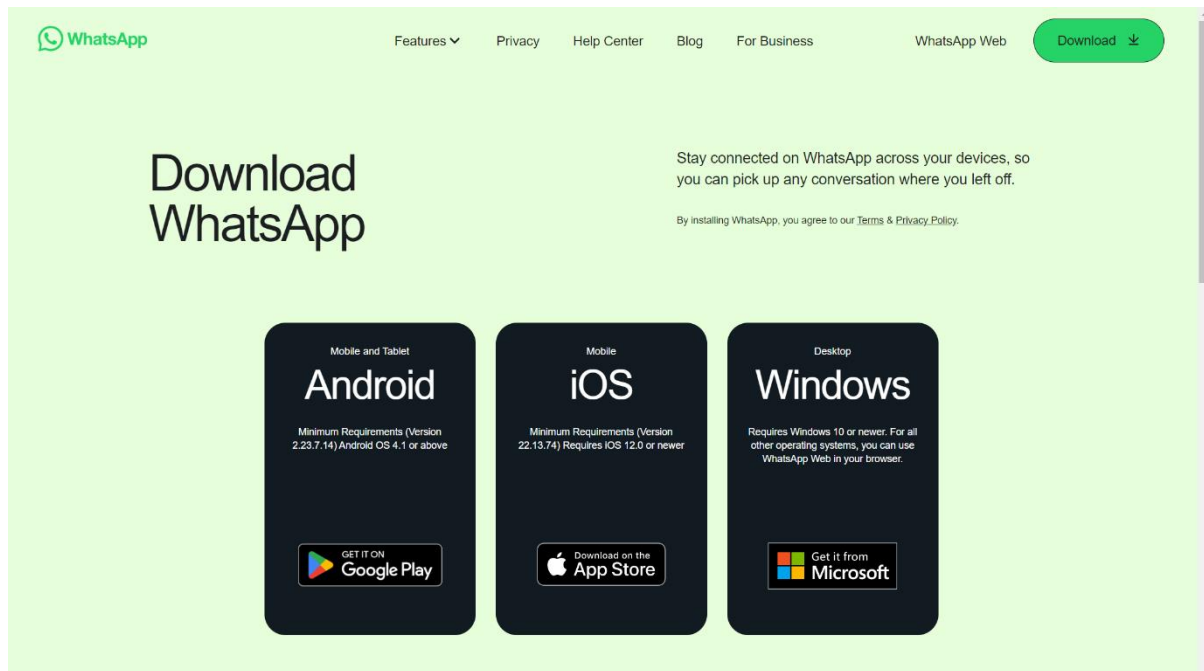


Wix.com

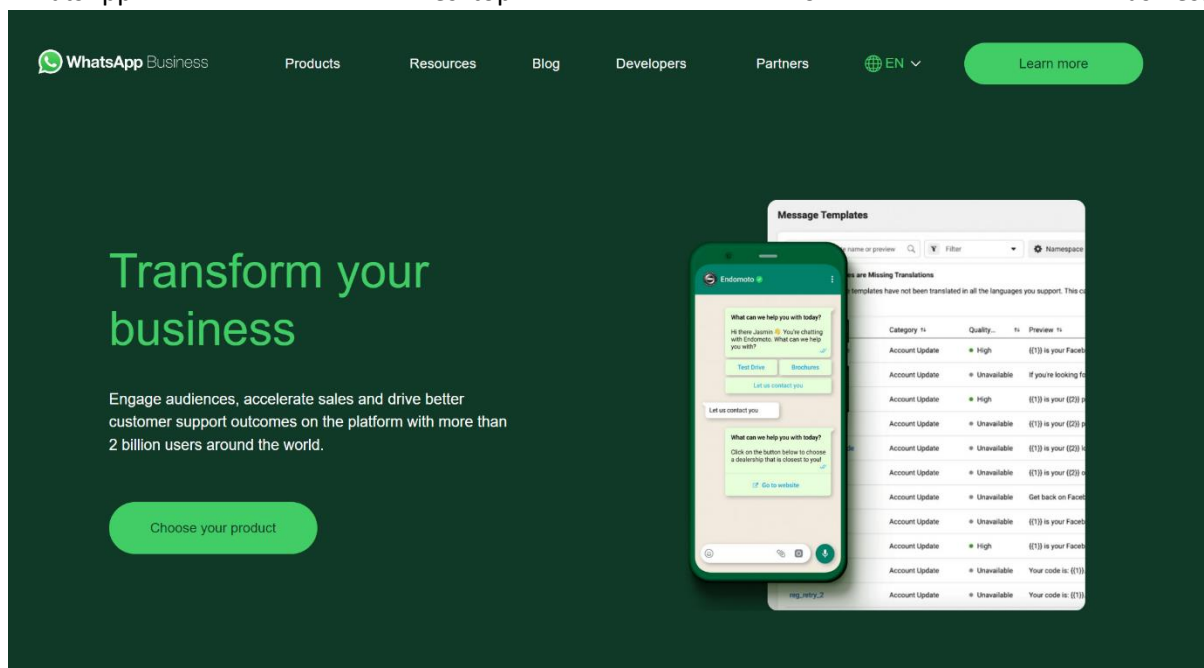


Facebook Business pages.

WhatsApp For Business:



WhatsApp Desktop for Business



WhatsApp Business for any company size

WhatsApp Business products support businesses from large to small, see which product best fits your needs.



WhatsApp Business Platform

For medium to large businesses communicating with customers at scale through programmatic access

[→ Get started](#)



WhatsApp Business App

For small businesses who personally manage conversations with customers

[→ Download app](#)

WHATSAPP BUSINESS APP BROADCAST FEATURES



Free

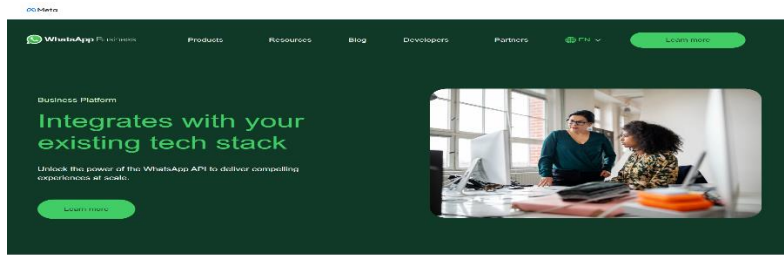


One Phone and
One Device Max



Built-in Broadcasting
Functionality

WhatsApp Business App Broadcasting Features



Put messaging to work for your business

Reach customers almost anywhere

Makes it easy for people to connect with your business by meeting them where they already are: on WhatsApp.

Connect through conversations

Drive marketing, sales and support outcomes with two-way conversations that engage across the customer journey.

Create memorable experiences

Leverage the API to deliver compelling conversational flows with interactive CTAs, dynamic product lists, rich media and more.

Discover common WhatsApp Business Platform use cases that help drive customer and business growth



Share important updates with customers

NOTIFICATIONS

- Send order confirmations and shipment updates
- Place appointments weekly/daily and other reminders with your customers

[See Customer use case](#)

Make promotions feel more personal

PROMOTIONS

- Drive upsell and cross-sell opportunities
- Re-engage after cart abandonment
- Maximize the ROI of your marketing spend with hyper-relevant promotions

[See Customer use case](#)



Build a friction-free buyer journey

COMMERCIAL

- Make it easy for customers to browse products and place an order, right from within WhatsApp

[See Customer use case](#)



Optimize support costs and increase efficiency

CUSTOMER CARE

- Deploy automated conversational flows to mitigate high volume inbound support requests
- Implement smart routing from conversations only when live agent support is needed
- Integrate with popular back-end systems like CRM and marketing automation platforms

[See Customer use case](#)



Provide account access and password support

VERIFICATIONS

- Enable multi-factor authentication or one-time passwords to verify accounts and users

[See Customer use case](#)



Create your own one-of-a-kind experiences

CUSTOM FLOWS

- Deliver interactive conversational experiences that engage and delight

[See Customer use case](#)



Take the next step

WhatsApp Business offers a more personal customer experience so you can run your business better.

[Learn more](#)

[Get started](#)

Why choose WhatsApp?



Meet customers where they already are

WhatsApp's business solutions give you the power to connect with customers through messaging.

Drive business outcomes

Use conversations to deliver personal experiences that accelerate the buyer journey.

Build long-lasting customer relationships

Keep prospects and customers on the path to purchase and satisfied with your services with rich messaging experiences. Engage and retain your customers.

WhatsApp BUSINESS

Products

Resources

Blog

Developers

Partners

EN

Learn more

Trust & Safety

Learn about our privacy, security and compliance practices, and how the WhatsApp Business Platform keeps your data secure.

Learn more

Data privacy & security by design

Privacy

Every WhatsApp message, including messages between people and businesses, is protected by the same industry-leading, Signal encryption protocol, that protects messages from before they're sent until they're delivered to the intended recipient.

Security

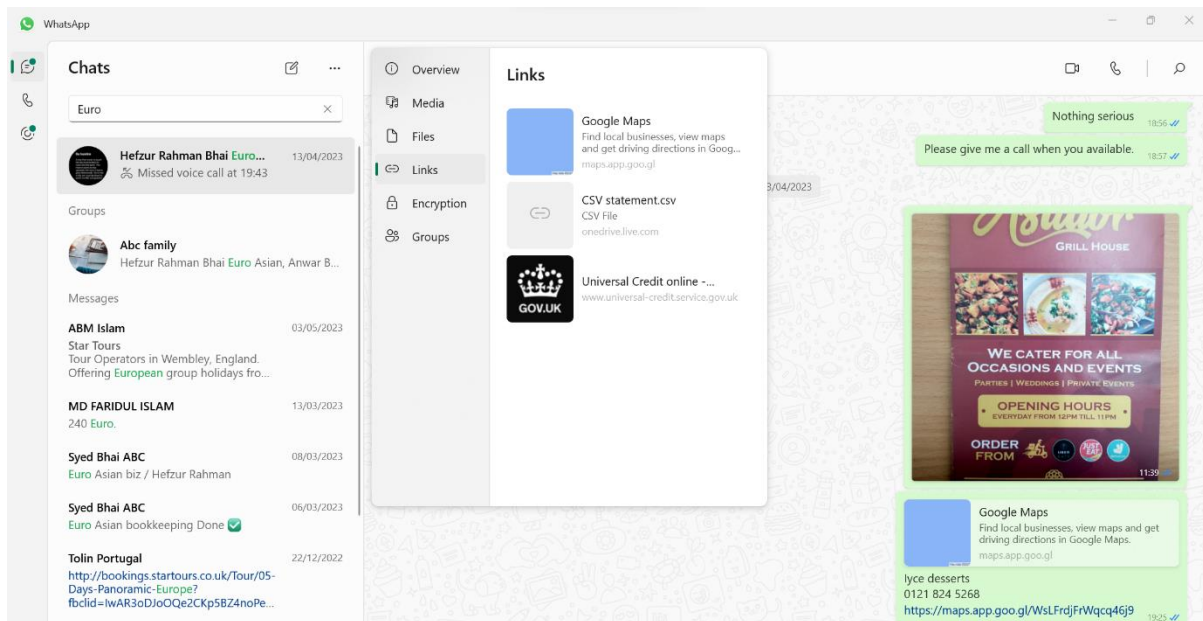
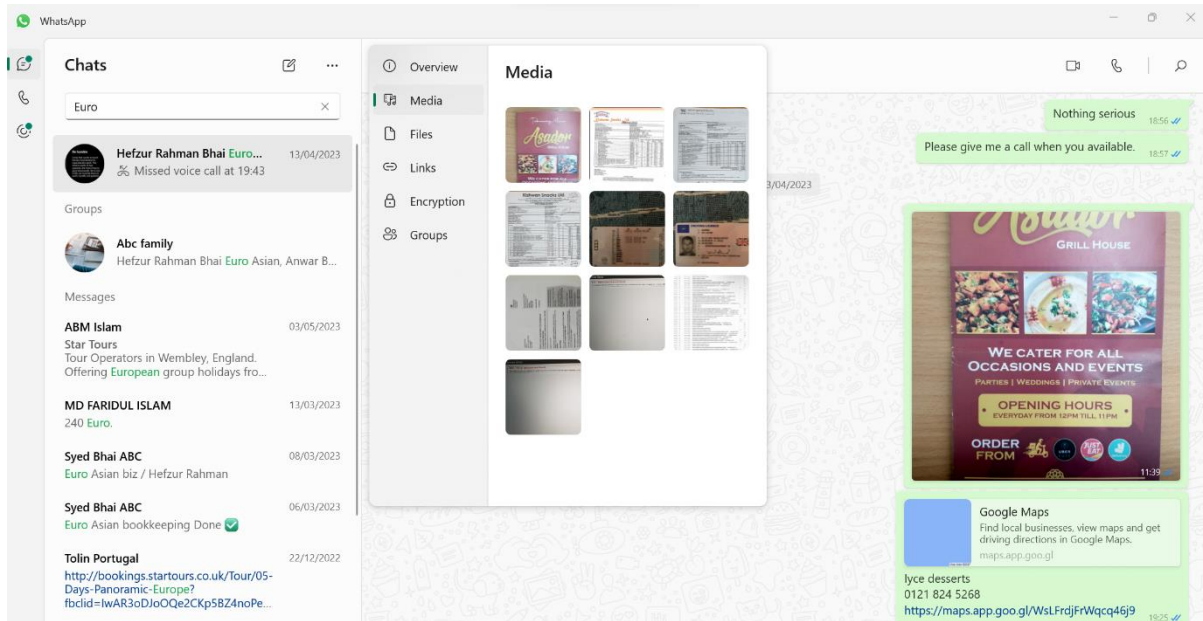
The WhatsApp Business Platform is protected by a combination of people, processes, and technology security systems that keeps customer data private and secure. The Cloud API is hosted by Meta. Meta uses [Defense in Depth](#), meaning we layer a number of protections to make sure we prevent and address vulnerabilities in our code from multiple angles. We care deeply about protecting customer data and we are building the Cloud API with security in mind.

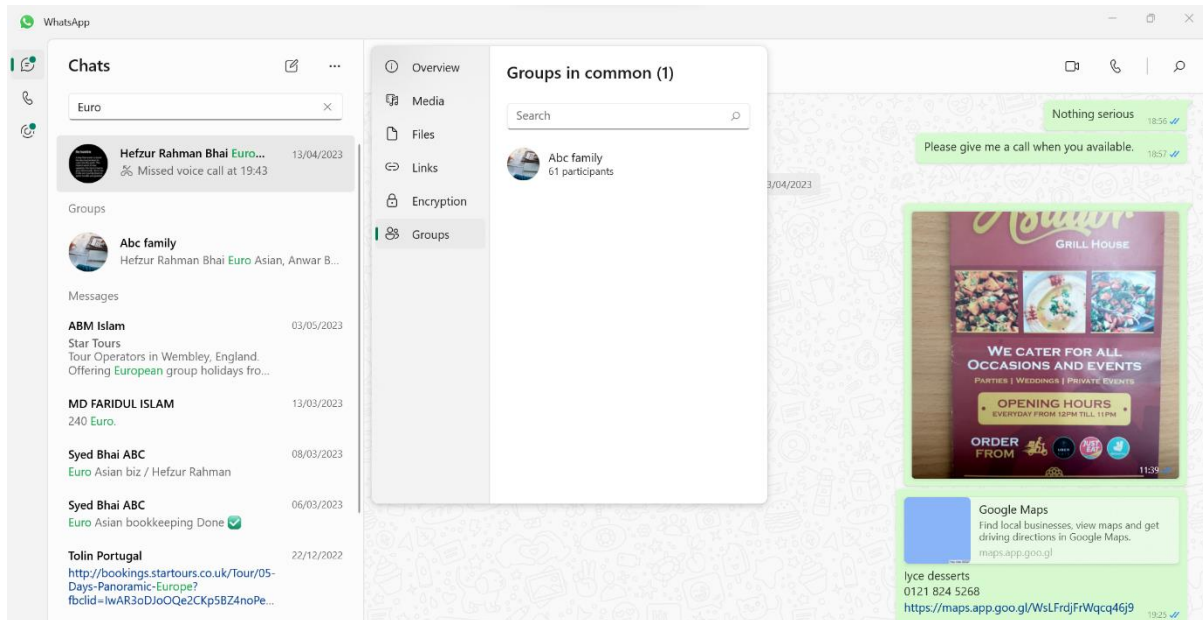
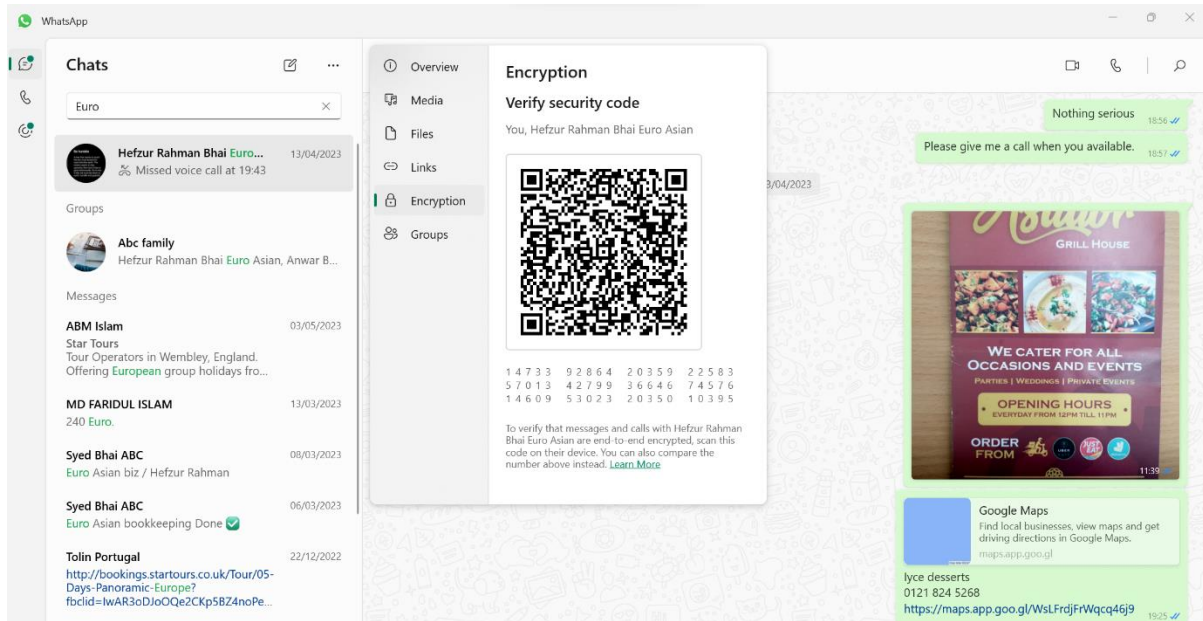
Certifications

The Cloud API is certified under SOC 2 and maintains strict governance to ensure data is handled appropriately. We also conduct regular penetration testing and document our controls through the Cloud Security Alliance Consensus Assessments Initiative Questionnaire.

Compliance

Meta takes data protection and people's privacy very seriously, and we are committed to continuing to comply with data protection laws. The WhatsApp Business Platform allows our customers to continue to meet their obligations under General Data Protection Regulation (GDPR). Meta complies with applicable legal, industry, and regulatory requirements as well as industry best practices. [See more.](#)





Chapter Five: Conclusions and Recommendations

Conclusion:

With the increasing prevalence of hacking and scams in digital marketing, businesses need robust solutions to protect their communications with customers [26]. This project aims to develop an encrypted systems/ infrastructure that ensures secure communications, thereby mitigating the risk of hacking and scams. By prioritizing data security and customer trust, businesses can enhance their digital marketing efforts and build lasting relationships with their customers.[27]

In addition, we can make this project as service pack to the startup and SME to clients to achieve the company goal by increase the revenue and also new product to business portfolio what can do contribute not to the society but also around the world.

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