

# IT6506 - e-Business Technologies

9. e Customer Relationship Management

Level III - Semester 6





#### **Overview**

This section will discuss theories behind e Customer Relationship Management and Search marketing.

A brief guide on how to use Google Analytics and Google Business Profile is also included in this section.

### **Intended Learning Outcomes**

At the end of this lesson, you will be able to;

- Describe theories behind CRM
- Discuss CRM applications, their features, and functionalities
- Describe Search Marketing
- Setup Google Analytics and Google Business Profile

# List of sub topics

- 9.1 CRM applications and their features and functionalities
- 9.2 Search Marketing
- 9.3 Google Analytics
- 9.4 Google My Business

### 9.1 CRM applications and their features and functionalities

#### What is CRM?

- The term CRM was first introduced in the mid-1990s.
- CRM was commonly known as the software that businesses used to handle and take care of their customer relationships.
- Sales force automation software (SFA), which emphasized managing customer contacts, along with integrated knowledge management solutions, played a pivotal role in establishing the early fundamentals of CRM.
- CRM can be defined as "An approach to building and sustaining long-term business with customers."
- A good CRM software should be able to manage customers throughout the customer lifecycle

# **Customer life cycle**

- The customer life cycle can be defined as the stages each customer will pass through in a long-term relationship through acquisition, retention, and extension.
- There are 4 stages in the customer lifecycle
  - 1. Customer selection
  - 2. Customer acquisition
  - 3. Customer retention
  - 4. Customer extension

#### **Customer selection**

Customer selection involves determining the specific customer groups that a company intends to focus its marketing efforts on. This includes identifying various customer segments for which the company will develop offerings and targets throughout the stages of acquisition, retention, and expansion.

Different approaches to segmenting customers based on their value and their specific life cycle with the company are examined. In the context of digital business, there is a strategic interest in selectively targeting customer types who have embraced e-channels.

### **Customer Acquisition**

Customer acquisition involves marketing initiatives aimed at establishing connections with new customers while minimizing acquisition costs and focusing on high-value customers.

It emphasizes the significance of service quality and the strategic selection of appropriate channels for different customer segments

#### **Customer Retention**

Customer retention pertains to the marketing efforts undertaken by an organization to retain its current customer base.

It involves identifying suitable offerings tailored to their individual requirements and considering their specific position in the customer life cycle, such as the number or value of their purchases.

This personalized approach plays a crucial role in maintaining customer loyalty.

### **Customer Extension**

Customer extension involves expanding the scope or variety of products that a customer buys from a company. This is commonly known as "customer development," as it aims to foster further engagement and increase the customer's purchasing involvement with the company.

There are several customer extension techniques for CRM that are particularly important to eBusinesses.

- Re-sell Selling similar products to existing customers particularly important in some B2B contexts as re-buys or modified re-buys.
- <u>Cross-sell</u> Sell additional products which may be closely related to the original purchase.
- <u>Up-sell</u> A subset of cross-selling, but in this case, selling more expensive products.
- Reactivation Customers who have not purchased for some time, or have lapsed, can be encouraged to purchase again.
- <u>Referrals</u> Generating sales from recommendations from existing customers

### Marketing applications of CRM

- <u>Salesforce automation (SFA)</u> Sales representatives are supported in their account management and phone-based sales through tools to arrange and record customer inquiries and visits.
- <u>Customer service management</u> Representatives in contact centers respond to customer requests for information by using an intranet to access databases containing information on the customer, products, and previous queries.
- Managing the sales process This can be achieved through e-commerce sites, or in a B2B context by supporting sales representatives by recording the sales process (SFA).
- <u>Campaign management</u> Managing ads, direct mail, email, and other campaigns.
- Analysis Through technologies such as data warehouses and approaches such as data mining, which are explained later in the chapter, customers' characteristics, purchase behavior and campaigns can be analyzed to optimise the marketing mix.

### e CRM

#### What is e-CRM?

- Using digital communications technologies to maximize sales to existing customers and encourage continued usage of online services.
- Some of the functionalities of eCRM are
  - Using the website and online social presences for customer development from generating leads through to conversion to an online or offline sale using email and web-based content to encourage purchase.
  - Managing customer profile information and email list quality (coverage of email addresses and integration of customer profile information from other databases to enable targeting).
  - Managing customer contact options through mobile, email, and social networks to support up-sell and cross-sell
  - Data mining to improve targeting.

#### e CRM ...contd.

- Providing online personalization or mass customization facilities to automatically recommend the 'next-best product'.
- Providing online customer service facilities (such as frequently asked questions, call-back, and chat support).
- Managing online service quality to ensure that first-time buyers have a great customer experience that encourages them to buy again.
- Managing the multichannel customer experience as they use different media as part of the buying process and customer life cycle.

#### **Social CRM**

- Social CRM can be defined as the process of managing customer-to-customer conversations to engage existing customers, prospects, and other stakeholders with a brand and so enhance customer relationship management
- CRM tools are integrated with social media sites such as Facebook, Twitter, and Linkedin to create Social CRM
- Social CRM provides deep insight into customer's lives, likes and dislikes, wants and needs, and also helps to connect with potential customers

### **Scope of Social CRM**

- Marketing Monitoring, analysis, and response to customer conversations through social listening tools.
- Sales Understanding where prospects are discussing the selection of products and services offered by you and competitors and determining the best way to get involved in the conversation to influence sales and generate leads.
- Service and support Customer self-help through forums provided by you and neutral sites
- Innovation Using conversations to foster new product development or enhance online offerings
- Collaboration Digital business collaboration within an organization through an intranet and other software tools to encourage all forms of collaboration which support business processes
- Customer experience use of social CRM to enhance the customer experience and add value to a brand

### 5Ms

- Implementation of the social CRM strategy can be reviewed using the 5Ms framework. 5Ms are,
  - Monitoring
    - Reviewing the method of social listening and deriving insights from these.
  - Mapping
    - Finding relationships between individual customers or grouped segments using different social platforms
  - Management
    - Processes for implementing and reviewing strategy.
       More report detail on campaign management would be helpful here.
  - o Middleware.
    - The software tools and APIs are used to monitor and gather insight.
  - Measurement
    - The measures used to assess social marketing effectiveness and ROI.

#### **Benefits of e-CRM**

#### Some of the benefits of e-CRM are

- Targeting more cost-effectively
  - Traditional targeting methods, like direct mail, often rely on mailing lists that may not accurately represent the target market.
  - Poor targeting can result in low response rates, potentially less than 1%.
  - The internet offers the advantage of self-selecting or prequalified contact lists.
  - Online customer acquisition focuses on building relationships with visitors who have shown interest in products by registering their information.
  - Attracting customers to the website and providing offers to encourage registration is a fundamental aspect of acquiring new customers and building relationships.

### Benefits of e-CRM ...contd.

- Achieve mass customization of the marketing messages
  - Technology makes it possible to send tailored emails at much lower costs than is possible with direct mail and also to provide tailored web pages to smaller groups of customers
- Increase the depth, breadth, and nature of the relationship.
  - The Internet medium allows for the provision of more information to customers as required.
  - Customer contact frequency can be increased due to the capabilities of the Internet.
  - Customers have control over the frequency of contact through their personalized pages.
  - Companies can also contact customers via email based on their communication preferences.

### Benefits of e-CRM ...contd.

- A learning relationship can be achieved using different tools throughout the customer life cycle.
  - Customers' behavior before buying a product can be analyzed and used for recommendations
  - Feedback about the product can be gathered using online feedback forms
  - Data can be gathered from questions asked through forms or emails
- Lower cost
  - Contacting customers by email or through their viewing web pages costs less than using physical mail
  - Information only needs to be sent to those customers who have expressed a preference for it, resulting in fewer mailouts
  - Contacting customers with personalization can be done automatically

# Uses of New Technologies to Enhance CRM

- Artificial Intelligence/ Machine Learning
  - Artificial Intelligence (AI) encompasses systems or machines that imitate human intelligence to carry out various tasks and have the ability to enhance their performance through iterative learning from the data they gather.
  - Some examples of the use of AI/ML in CRM
    - Natural language processing
    - Identifying new market opportunities
    - Predicting user behavior
    - Sentiment analysis
    - Personalized customer service
    - Predictive lead scoring
  - Some benefits of using AI/ML in CRM are
    - Effective data management
    - Increased customer satisfaction
    - Increased customer engagement
    - Facilitating lead management

# **Uses of New Technologies to Enhance CRM ...contd.**

#### Chatbots

- A chatbot is a computer program or an AI-powered application designed to simulate human conversation and interact with users through text-based channels.
- Users can ask questions and receive an instant response.
- Some use cases for chatbots are
  - Answering frequently asked questions
  - Check account information
  - Guiding customers on product selection
  - Making purchases
- Benefits of chatbots
  - Faster response times for user queries
  - Cost-effective
  - Increased customer satisfaction
  - Better insights on customers' requirements

### **Uses of New Technologies to Enhance CRM ...contd.**

- Virtual Reality and Augmented Reality
  - Virtual Reality (VR) is a technology that creates a simulated, computer-generated environment that can be experienced and interacted with by an individual. By wearing a VR headset or using other specialized equipment, users are fully immersed in a virtual world that can replicate real-world environments or be entirely fictional
  - Augmented Reality (AR) is a technology that overlays digital information or virtual elements onto the real-world environment. Unlike VR, AR does not create a fully immersive virtual world but enhances the real world by adding computer-generated visual, auditory, or haptic elements. AR can be experienced through various devices, such as smartphones, tablets, smart glasses, or headsets, which use cameras and sensors to blend the real and virtual elements seamlessly.

# **Uses of New Technologies to Enhance CRM ...contd.**

- Some use cases for VR/AR in CRM are
  - Virtual reality tours
  - Virtual showrooms
  - Virtual fitting rooms
  - Guided tours
- Some benefits of VR/AR in CRM are
  - Increased customer satisfaction
  - Increased customer engagement
  - Cost-effective

### 9.2 Search Marketing

- In search marketing companies seek to improve their visibility in search engines for relevant search terms by increasing their presence in the search engine results pages
- There are 2 main techniques for search marketing
  - 1. Paid search marketing
  - 2. Organic search marketing
- In paid search marketing, a company pays for text adverts to be displayed on the search engine results pages when a specific key phrase is entered. The marketer pays for each time the link in the ad is clicked on. (Pay-per-click)
- In organic search marketing, the company improves the position of its web content using Search Engine Optimization. (SEO)

### Paid search marketing

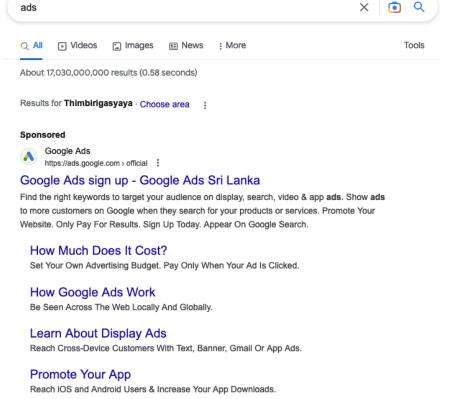
- Paid search marketing, also known as paid listings, resembles traditional advertising.
- When a user enters a specific phrase in a search engine, a relevant text ad with a link to a company page is displayed.
- These text ads, often labeled as "sponsored links," appear on the right, above, or below the natural search engine listings.
- Unlike traditional advertising, the advertiser is only charged when the ad is clicked, resulting in a visit to the advertiser's website. This payment model is known as "pay-per-click marketing."
- The ranking of these paid performance placements is typically determined by the highest bid cost-per-click value for each key phrase.

### Paid search marketing ...contd.

- The highest bidder does not automatically secure the top position in paid search listings.
- Search engines consider the relative clickthrough rates (CTRs) of ads based on their position.
- Ads in lower positions generally have lower CTRs, and this is taken into account when ranking sponsored links.
- Ads that appear less relevant, resulting in fewer clicks, may drop down or even be removed from the listings.
- Clickthrough rate analysis and its impact on position is part of the quality score, initially introduced by Google and now integrated into the Microsoft Live and Yahoo! search networks.
- Google Ads, (formerly Google AdWords) is a popular paid search marketing tool.

### Google Ads

 Google Ads is Google's online advertising program. Through Google Ads, you can create online ads to reach people exactly when they're interested in the products and services that you offer



https://support.google.com/google-ads/answer/6319?hl=en

# Ad formats available in Google Ads

- Ad formats available will depend on the campaign type and campaign goal. The main types of ad formats are
  - Text
    - Only text can be used. Maintaining ads is quick and easy. Displayed to the customer when they search on Google
  - Responsive
    - Responsive ads automatically adjust their size, appearance, and format to fit available ad spaces.
       They can transform into text or image ads.
  - Image
    - Can use static images (JPG, PNG) or animated GIFs.
       Helps to reach customers by showcasing the product in a visual way.
  - App promotion ads
    - Can be used to drive app downloads and engagement

### Ad formats available in Google Ads ...contd.

- Video
  - Can be used to deliver a rich and engaging experience to customers
- Shopping ads
  - Show users a photo of the product, a title, price, store name, and more details about the product.
- Call only ads
  - Can be used to drive phone calls to the business with ads that include a phone number. People can click on these ads and then call the business directly. These ads will only appear on devices that can make phone calls

### Organic search marketing

- Organic search marketing refers to the practice of optimizing a website's visibility and driving traffic through unpaid, natural search engine results. It involves implementing various strategies and techniques to improve a website's search engine rankings, making it more visible to users searching for relevant keywords or phrases.
- Search Engine Optimization (SEO) can be used to drive traffic to the website.

#### SEO

- Search Engine Optimization is a structured approach used to improve the position of a company or its products in search engine natural or organic results listings for selected key phrases.
- It also involves controlling index inclusion or ensuring that as many pages of a site as possible are included within the search engine
- Each search engine has its algorithm, which changes and adapts with time. While it's impossible to know the exact algorithm, there are common factors that influence the ranking in a search engine. Some of these factors are
  - Keyword Density
  - Number of inbound links
  - Title HTML tag
  - Meta-tags
  - Alternative graphic text

# **Keyword Density**

- The number of times the key phrase is repeated in the text of the web page is a key factor in determining the position of the site for a key phrase. A page with higher keyword density will normally rank higher in a search result.
- However, using keywords repeatedly to manipulate the ranking, which is known as "keyword stuffing", will result in a lower rank as the search engine algorithms can detect this.
- The relevance of a keyword can be increased by including it in a heading using HTML heading tags. (<h1>,<h2>)
- Using the keyword in an anchor text will also improve the relevance of a keyword.
- Using the keyword at the start of the webpage will also help with the ranking.

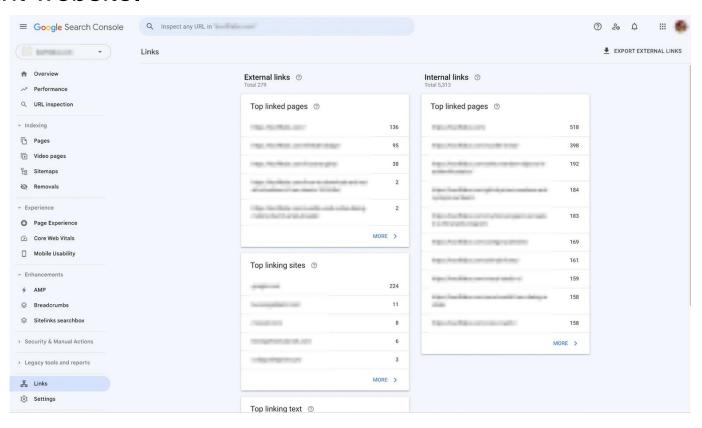
#### Number of inbound links

- The more links you have from good-quality sites, the better your ranking will be. Evaluation of inbound links or backlinks to determine ranking is one of the key reasons Google became popular.
- Google utilizes a ranking assessment called "Page Rank" that considers each link from another site as a vote. The importance of a vote varies as Google gives more weight to links from high page rank pages with relevant contextual content.
- Hyperlink anchor text and adjacent text containing relevant keywords also contribute to the ranking weight.
- Another key aspect of linking is the architecture of internal links within the site. Key phrases that occur within the hypertext of different forms of navigation are important to Google in indicating the context of a page.

#### Number of inbound links ...contd.

You can view the external links recognized by Google by visiting <a href="https://search.google.com/search-console/links">https://search.google.com/search-console/links</a>.

Note: You need to have set up Google Search Console for the relevant website.



# Title HTML tag

- The keywords in the title tag of a web page that appears at the top of a browser window are indicated in the HTML code by the <title> keyword.
- In search engine listings, the presence of a keyphrase in the title of a page increases the likelihood of higher ranking compared to it being only in the body text.
- It is important for each page on a website to have a specific title that includes the company name and the featured product, service, or offer.
- Keyphrases positioned towards the left of the title tag and those with higher keyphrase density receive greater weighting.
- The title HTML tag plays a vital role in search marketing as it appears as underlined text in search results and forms a hyperlink to the website.
- A relevant and compelling title tag can lead to more clicks and visits to the website.
- Google monitors click-through rates to determine relevance and may adjust the position accordingly based on user interaction.

### **Meta-tags**

- Meta-tags are snippets of code embedded in the HTML source file of a webpage, added by web page creators.
- Search engine spiders or robots read these meta-tags, even though they are hidden from users, as part of indexing the web page.
- In the past, search engines placed more importance on metatags containing keyphrases for assessing their relevance, but this led to search engine spamming.
- Google has reported that it does not assign relevance to metatags anymore.
- However, other search engines like 'Yahoo! Search' still consider meta-tags to some extent.
- The best practice is to incorporate meta-tags and customize them for each page with distinct content.

#### Meta-tags ...contd.

- Two of the important meta tags are
  - keywords meta tag
    - This is used to highlight the key topics covered on a web page
  - description meta tag

BIT

■ This meta tag contains the information which will be displayed on the search results page so is very important to describe what the website offers to encourage searchers to click through to the site.

(UCSC) and offered by the University of Colombo (UoC).

BIT is a degree programme conducted by the University of Colombo School of Computing

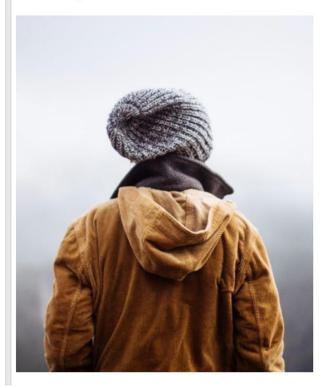
## Alternative graphic text.

- Websites that heavily rely on graphics and plug-ins are less likely to achieve high search engine rankings. The reason for this is, the only text that a search engine can be used for indexing is the <title>.
- To enhance indexing, graphical images can be associated with hidden text using the ALT tag. Hidden text within ALT tags is not visible to users (unless graphics are disabled), but search engines can see and index it.
- However, search engines now assign less relevance to this factor, unless the image is also a link. Despite reduced relevance, it is still best practice to use ALT tags as they are also required for accessibility compliance, allowing screenreaders used by visually impaired individuals to read the assigned text.

## Alternative graphic text ...contd.

```
<!DOCTYPE html>
<html>
<body>
<h1>The img element</h1>
<img src="img_girl.jpg" alt="Girl in a jacket" width="500" height="600">
</body>
</html>
```

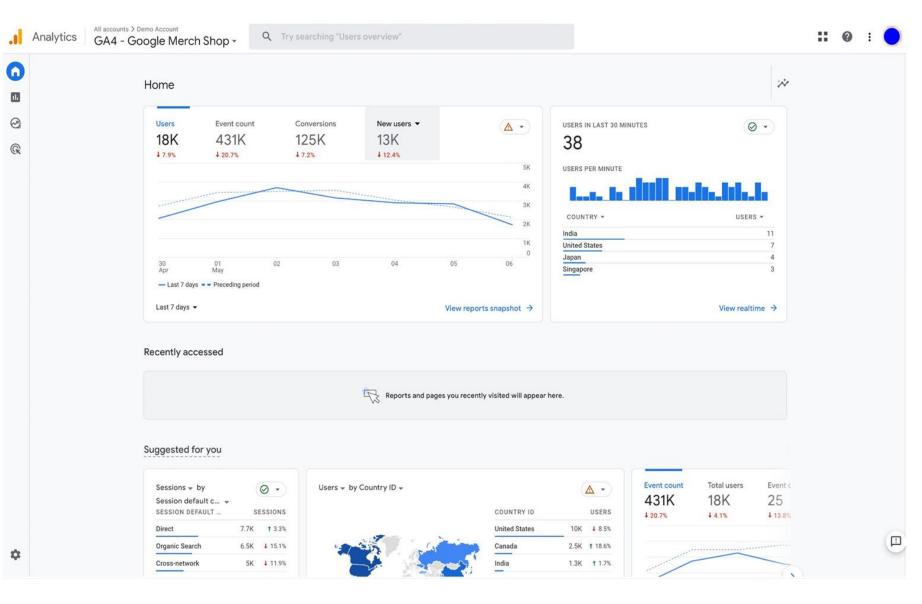
#### The img element



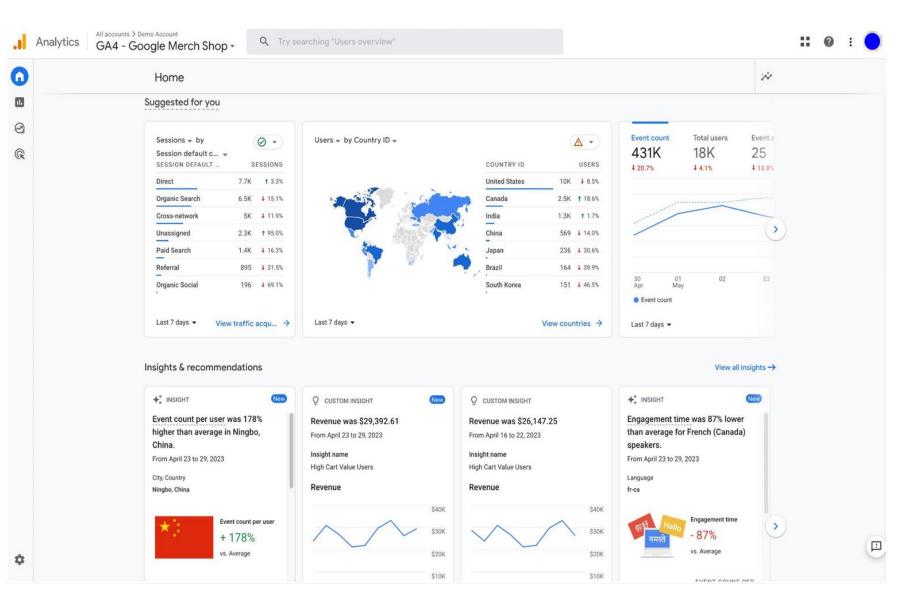
## 9.3 Google Analytics

- Google Analytics is a powerful web analytics platform that provides valuable insights into website performance and user behavior. It allows website owners and marketers to track and measure various metrics, enabling them to make data-driven decisions and optimize their online presence.
- With Google Analytics, businesses can gain a comprehensive understanding of how users interact with their websites. It provides detailed information about visitor demographics, acquisition channels, user engagement, and conversion rates. By analyzing these metrics, businesses can identify strengths, weaknesses, and opportunities to enhance their website's performance and user experience.
- The platform offers a wide range of features, including realtime reporting, audience segmentation, goal tracking, ecommerce tracking, and conversion attribution. These features enable businesses to evaluate the effectiveness of their marketing campaigns, assess website traffic sources, and measure the impact of different marketing channels.

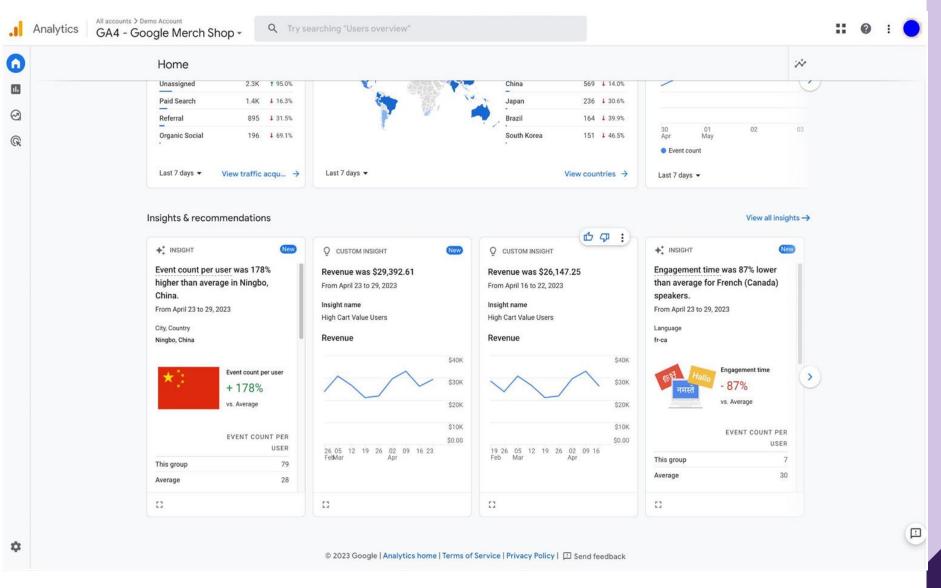
## **Screenshots from Google Analytics**



# Screenshots from Google Analytics ...contd.



# **Screenshots from Google Analytics ...contd.**



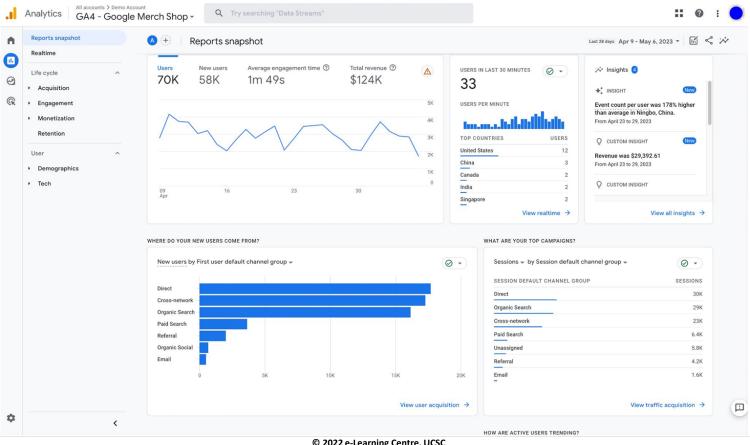
## Insights available in Google Analytics

While Google Analytics provides a range of insights, the following are some of the key insights that can be obtained

- Website Traffic
- Audience Demographics
- User Behavior
- Conversion Tracking
- E-commerce Analytics
- Mobile Analytics

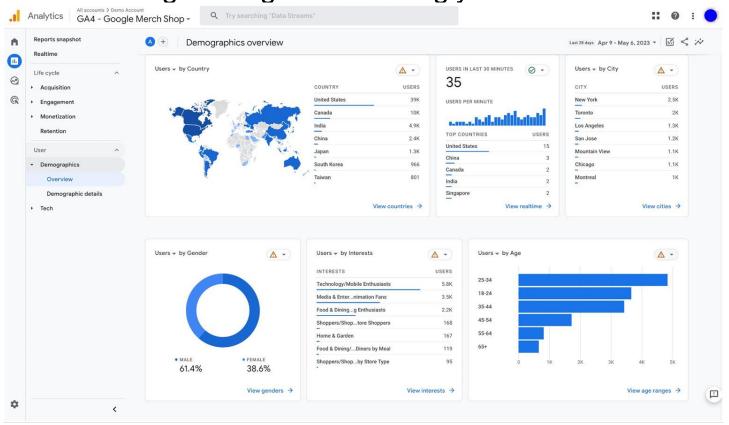
#### Website Traffic

You can analyze the number of visitors to your website, including unique visitors, returning visitors, and new visitors. You can also track the sources of traffic, such as organic search, paid advertising, social media, referrals, and direct traffic.



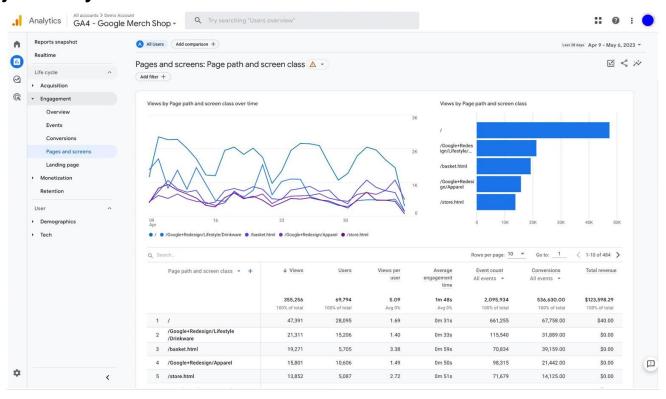
#### **Audience Demographics**

Google Analytics provides demographic data about your website visitors, including their age, gender, and geographic location. This information helps you better understand your target audience and tailor your marketing strategies accordingly.



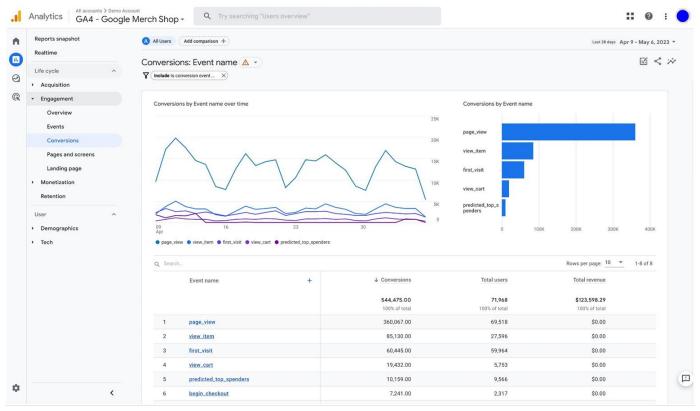
#### **User Behavior**

You can gain insights into how users navigate through your website, which pages they visit, how long they spend on each page, and the actions they take. This data helps you identify popular content, engagement levels, and potential bottlenecks in the user journey.



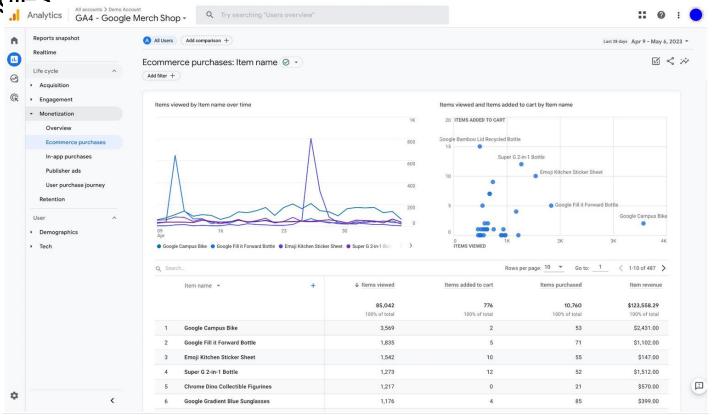
## **Conversion Tracking**

Google Analytics allows you to set up and track goals, such as form submissions, purchases, or newsletter sign-ups. You can measure conversion rates, identify high-performing landing pages, and analyze the effectiveness of marketing campaigns in driving conversions.



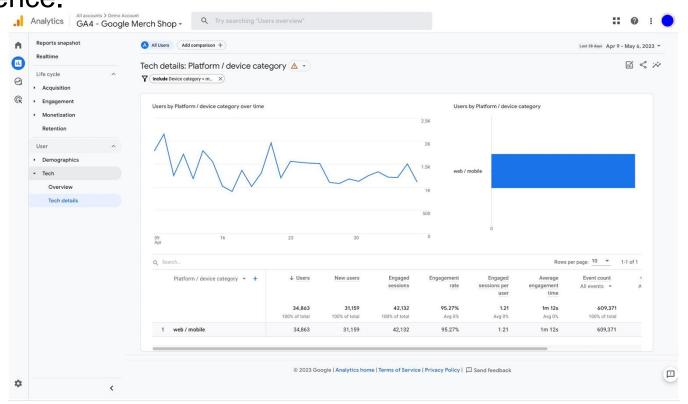
## **E-commerce Analytics**

If you run an online store, Google Analytics offers detailed ecommerce tracking. You can track revenue, transactions, average order value, and product performance. This information helps you optimize your product offerings, pricing, and marketing strategies



## **Mobile Analytics**

With the increasing use of mobile devices, Google Analytics provides insights into mobile traffic, user behavior, and mobile-specific conversion rates. You can assess the mobile-friendliness of your website and optimize it for a better mobile user experience.



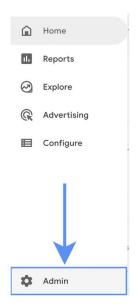
## **Connecting Google Analytics to a Website**

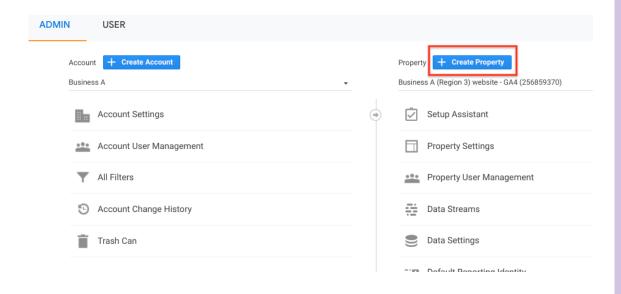
#### **Activity**

How to connect Google Analytics to a Website?

The following slides contain a guide on how to connect Google Analytics to a Website.

- 1. Create a new Google Analytics 4 property
- In Admin, look at the Account column to make sure that you've selected the right account. Then, in the Property column, click Create Property.



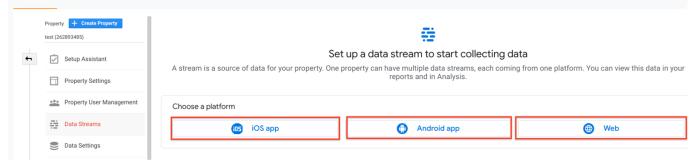


https://support.google.com/analytics/answer/9304153

- Enter a name for the property and select the reporting time zone and currency
- Click Next. Select your industry category and business size.
- Click Next. Select how you intend to use Google Analytics.
- Click Create and (if you are setting up a new account) accept the Analytics Terms of Service and the Data Processing Amendment.
- Continue to Add a data stream to start collecting data.

#### 2. Add a data stream

Click the iOS and Android and or Web



- Select Web
- Enter the URL of your primary website and a Stream name.
- Select enhanced measurements
- Click Create Stream.

- 3. Set up data collection for websites
  - There are 3 main ways to set up data collection. If you are using a Content Management System such as WordPress you will be able to use integrations provided by the CMS.
  - If not you will be able to directly copy and paste the Google Tag to your web page.
  - You can also add the Google Tag using Google Tag Manager.
  - Here we will discuss how to directly add the Google Tag to an HTML page.

#### How to add the Google Tag directly to a web page

- Sign in to the Google Analytics account.
- Click Admin.
- At the top of the Property column, select your property.
- In the Property column, click Data Streams > Web.
- Click the data stream for your website.
- Under Google tag, click View tag instructions.
- On the Installation instructions page, select Install manually:
- On the screen, you'll see the JavaScript snippet for your account's Google tag. Your Google tag is the entire section of code that appears, beginning with:

```
<!-- Google tag (gtag.js) -->
and ending with
</script>
```

Copy and paste your Google tag immediately after the <head>
 on each page of your website.

## How to add the Google Tag directly to a web page ...contd.

#### An example Google Tag is shown below

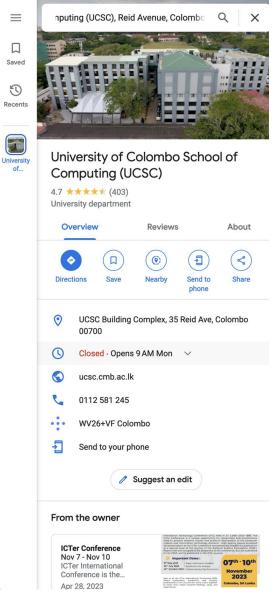
## 9.4 Google My Business

Google Business Profile (formerly Google My Business) is a free tool that allows you to take charge of the way your business appears on Google Search and Maps. With your Business Profile, you can connect with customers, post updates, list your products and services, accept online orders, and more.

#### Steps to Create a Google Business Profile

- 1. Sign in to the Google Account
- 2. Go to create a profile (https://business.google.com/create)
- 3. Enter the name of your business.
- 4. Search for your business category, select it, and click Next.
- 5. Choose whether you have a location customers can visit.
- 6. Enter the service area of your business.
- 7. Enter a phone number, and website URL, and click Next.
- 8. Click Finish.
- 9. Select a verification option.

## A Screenshot of a Google Business Profile



## **Benefits of Google Business Profile**

- Make your business visible to a large audience
- Displays useful and correct information about the Business.
- Improves authenticity and trust.
- Improves SEO
- Can respond to customer reviews
- Can get customer insights.

