

Project Design Phase-II Technology Stack (Architecture & Stack)

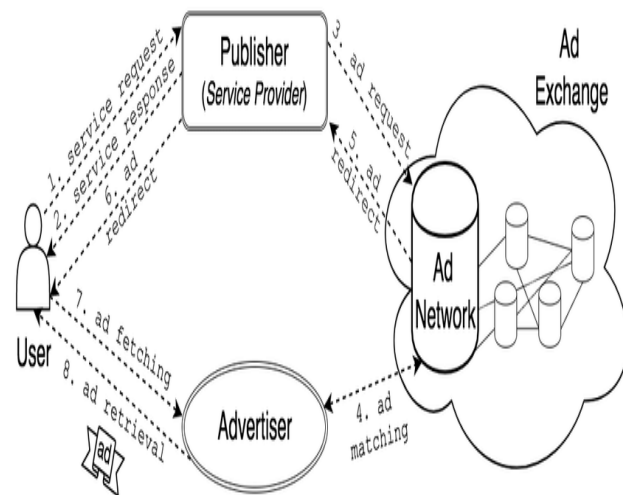
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| Date | 02 November 2023 |
| Team ID | NM2023TMID02803 |
| Project Name | Project - How to Create a Google Ads Campaign for your brand |

Technical Architecture:

The Deliverable shall include the architectural diagram as below and the information as per the table1 & table 2

Example: High-level architecture of online advertising

Reference: <https://www.researchgate.net/figure/High-level-architecture-of-traditional-online>



Guidelines:

- Include all the processes (As an application logic / Technology Block)
- Provide infrastructural demarcation (Local / Cloud)
- Indicate external interfaces (third party API's etc.)
- Indicate Data Storage components

Table-1 : Components & Technologies:

| S. No | Component | Description | Technology |
|-------|---------------------|---|---------------------|
| 1. | User Interface | Go to the Google Ads website (https://ads.google.com) and sign in to your Google account. | Google Ads Platform |
| 2. | Application Logic-1 | Define the goal or objective of your advertising campaign. Common objectives include increasing website traffic, generating leads, driving sales, or promoting brand awareness | Google Ads Platform |
| 3. | Application Logic-2 | Start by creating a new campaign within your Google Ads account, specifying the campaign type based on your advertising goals (e.g., Search, Display, Video, Shopping, App, etc.) | Google Ads Platform |
| 4. | Application Logic-3 | Set individual bids for each keyword or ad group, depending on your bidding strategy. You can manually adjust bids or use automated bidding strategies. | Google Ads Platform |
| 5. | Database | use databases to store user data obtained from your website or landing pages. This data can be used for retargeting or creating custom audience segments for your Google Ads campaigns | Google Ads Platform |
| 6. | Cloud Database | Google Ads campaign data can be stored and managed using cloud databases provided by major cloud service providers like Google Cloud Platform (GCP), Amazon Web Services (AWS), and Microsoft Azure | Google Ads Platform |
| 7. | File Storage | campaign data, assets, and settings are stored and managed within the Google Ads platform itself. | Google Ads Platform |
| 8. | External API-1 | Google Ads campaigns, you may use external APIs to enhance your campaign management, data analysis, or reporting | Google Ads Platform |
| 9. | External API-2 | External APIs can play a significant role in enhancing and extending the capabilities of Google Ads campaigns | Google Ads Platform |

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|-----|---------------------------------|---|---------------------|
| 10. | Infrastructure (Server / Cloud) | Need reliable and scalable resources to handle various aspects of your advertising efforts. | Google Ads Platform |
|-----|---------------------------------|---|---------------------|

Table-2: Application Characteristics:

| S. No | Characteristics | Description | Technology |
|-------|--------------------------|--|---------------------|
| 1. | Open-Source Frameworks | Google provides open-source client libraries for different programming languages (e.g., Python, Java, Ruby, PHP) to interact with the Google Ads API | Google Ads Platform |
| 2. | Security Implementations | The security of your Google Ads campaign is essential to protect your advertising investment, prevent unauthorized access, and maintain the integrity of your ads and user data. | Google Ads Platform |
| 3. | Scalable Architecture | when you plan to expand your advertising efforts or handle a large volume of data and traffic | Google Ads Platform |
| 4. | Availability | Google Ads campaign is essential to minimize downtime, maintain user engagement, and maximize the effectiveness of your advertising efforts | Google Ads Platform |
| 5. | Performance | The performance of your Google Ads campaign is crucial to achieve your advertising goals and maximize the return on your investment | Google Ads Platform |

References:

<https://searchengineland.com/a-look-at-the-new-google-ads-adwords-interface-303231>
<https://www.wordstream.com/adwords-campaign>