AdTech Key Performance Indicators (KPIs) with Formulas

Listed below are key performance indicators (KPIs) for measuring the success of ad campaigns, platforms, tracking performance, revenue, engagement, effectiveness, etc, and the corresponding formulas are added along with notes.

Campaign Performance KPIs

• Click-Through Rate (CTR): CTR = (Total Clicks / Total Impressions) * 100

Note: Measures how well ads capture user attention, indicating engagement levels.

• Conversion Rate: Conversion Rate = (Conversions / Clicks) * 100

Note: Used when you want to measure the effectiveness of a campaign or webpage in turning users into customers or completing a desired action.

• Cost Per Click (CPC): CPC = Total Ad Spend / Total Clicks

Note: Measure how much you pay each time a user clicks on an ad, helping assess the efficiency and value of paid traffic.

• Cost Per Acquisition (CPA): CPA = Total Ad Spend / Total Conversions

Note: Measure the total cost required to acquire a customer or complete a desired action, helping evaluate the overall efficiency of a campaign in driving conversions.

• Cost Per Thousand Impressions (CPM): CPM = (Total Ad Spend / Impressions) * 1000

Note: The goal is to increase brand awareness by maximizing the number of times an ad is seen, rather than focusing on clicks or conversions.

• Video Completion Rate (VCR): VCR = (Completed Video Views / Total Video Views) * 100

Note: A high VCR indicates strong engagement/attention with video content.

• Video Viewability: Video Viewability = Percentage of a video ad that is visible to the user.

Note: Ensures that video ads are being served in viewable positions.

Revenue and Profitability KPIs

• Return on Ad Spend (ROAS): ROAS = Revenue from Ads / Cost of Ads

Note: Evaluating the revenue generated from a digital advertising campaign relative to its cost, to assess the effectiveness of ad spending.

• Return on Investment (ROI): ROI = ((Revenue - Cost) / Cost) * 100

Note: Used when evaluating the efficiency or profitability of an advertising campaign by comparing the net profit to the total cost of the investment.

• Revenue Per User (RPU): RPU = Total Revenue / Total Users

Note: Measures the average revenue generated per individual user to assess the overall profitability of a user base.

• Customer Lifetime Value (CLV or LTV): CLV = Average Value per Customer * Average Customer Lifespan

Note: Estimates the total revenue a business can expect from a customer throughout their relationship to evaluate long-term profitability and guide customer acquisition strategies.

Engagement KPIs

• Engagement Rate: Engagement Rate = (Engagements / Impressions) * 100

Note: Measures the level of interaction (likes, shares, comments, etc.) with content to assess its effectiveness and audience interest.

• Average View Time: Average View Time = Total Time Viewed / Total Views

Note: Measures how long, on average, viewers engage with video content, helping to assess content quality and viewer retention.

• Ad Recall: Ad Recall = (Number of Users who Recall Ad / Total Users) * 100

Note: Measures the effectiveness of an ad campaign by determining how well viewers remember the ad after seeing it.

• Frequency: Frequency = Total Impressions / Unique Users

Note: Measure how often an individual is exposed to an ad within a specific time period.

• Viewability Rate: Viewability Rate = (Visible Impressions / Total Impressions) * 100

Note: Ensure that ads are being seen by users and are delivering value.

Reach and Audience KPIs

• Unique Reach: Unique Reach = Number of Distinct Users who Viewed the Ad

Note: Measures the total number of distinct individuals who have been exposed to an ad or campaign within a specified period.

• Frequency Cap: Frequency Cap = Limit Number of Exposures per User

Note: Frequency Cap to limit the number of times an individual sees the same ad within a specific time frame to avoid ad fatigue.
Example: Hefty campaign has a frequency of 2 ads per 1hr.

• Unique Impressions: Unique Impressions = Number of Distinct Users Who Viewed the Ad

Note: Measure reach and ensure ads are not shown multiple times to the same users.

• Audience Segmentation Performance: Audience Segmentation Performance = (Conversions per Segment / Total Conversions) * 100

Note: Measure how well different audience segments perform with ads.

• Ad Slot Occupancy: Ad Slot Occupancy = (Filled Ad Slots / Total Ad Slots) * 100

Note: A higher occupancy rate indicates better utilization of available inventory.

• Time on Site/Page Views: Time on Site = Total Time Spent on Site / Total Visits
Page Views = Total Pages Viewed / Total Visits

Note: High time on site or page views indicates strong audience engagement. GA4 (Google Analytics).

Retargeting KPIs

• Retargeting Conversion Rate: Retargeting Conversion Rate = (Conversions from Retargeting / Total Retargeted Users) * 100

Note: Measure the effectiveness of ads shown to users who have previously interacted with a brand, indicating how well you're converting past visitors into customers.

• Bounce Rate: Bounce Rate = (Single Page Visits / Total Visits) * 100

Note: High bounce rates may indicate poor ad placement or poor relevance of content.

Attribution and Tracking KPIs

• Attribution Models: All credit is given to the first, middle, last touchpoints, linear, time-decay, position-based, and custom.

Note: Determine how credit for conversions is assigned across different touchpoints in a customer's journey, helping optimize ad spend and campaign strategies.

• Multi-Touch Attribution (MTA): Multi-Touch Attribution assigns value to each touchpoint in a customer's journey, providing a more comprehensive view of how various interactions contribute to conversions.

• View-Through Conversions (VTC): VTC = (Conversions from View-Only Ads / Total Views) * 100

Note: Measures the effectiveness of display or video ads when a user sees the ad but does not click on it, and later completes a desired action (such as a purchase or sign-up).

• User Satisfaction: User Satisfaction = Based on user feedback, surveys, or sentiment analysis.

Note: Monitoring user feedback about ads helps optimize ad formats and placements.

Viewability and Fraud Detection KPIs

• Ad Viewability: Ad Viewability = (Visible Impressions / Total Impressions) * 100

Note: Ad Viewability measures whether an ad had the opportunity to be seen by a user, typically tracking if a specified percentage of the ad was visible on the screen for a certain amount of time. An impression is made when at least 50% of the ad is visible on the screen for a minimum of one second for display ads, or at least 50% of the ad is visible for two seconds for video ads

• Ad Fraud Rate: Ad Fraud Rate = (Fraudulent Impressions / Total Impressions) * 100

Note: Fraudulent impressions can significantly impact revenue. IVT = bots, blocked user agents, etc

Data and Analytics KPIs

• Data Accuracy: Data Accuracy = (Correct Data Entries / Total Data Entries) * 100

Note: Ensures that the data collected and reported in campaigns is accurate, reliable, and correctly reflects, matches the actual performance or user behavior to drive informed decision-making.

• Data Latency: Data Latency = Time Delay between Data Collection and Data Availability

Note: Data Latency is used to understand the delay between data collection and its availability for analysis or reporting, ensuring timely decision-making in campaigns or systems.

Brand Safety KPIs

• Brand Safety Index: Brand Safety Index is a score measuring how safe ads are in context

Note: This helps prevent ads from being shown alongside harmful or inappropriate content.

• Ad Blocker Rate: Ad Blocker Rate = (Users with Ad Blockers / Total Users) * 100

Note: Measure the percentage of users who have ad blockers enabled, helping to assess the impact on ad delivery and campaign effectiveness. Never an issue with SSAI.

Mobile-Specific KPIs

• App Install Rate: App Install Rate = (App Installs / Ad Clicks) * 100

Note: Measure the percentage of users who install an app after clicking on an ad, helping to assess the effectiveness of app promotion campaigns.

• In-App Purchases (IAP): IAP = Revenue from In-App Purchases

Retention and Loyalty KPIs

• Churn Rate: Churn Rate = (Customers Lost / Total Customers) * 100

• Customer Retention Rate (CRR): CRR = ((End Customers - New Customers) / Start Customers) * 100

Note: A high retention rate indicates that the content is resonating with the audience, which can influence ad performance.

Social Media KPIs

• Social Shares: Social Shares = Total Number of Times Ad is Shared on Social Media

Note: Measures how often content is shared on social media, indicating its resonance, engagement potential, and organic reach.

• Social Sentiment: Social Sentiment is a score based on positive, neutral, or negative reactions from social media users.

Note: Measures public perception and emotional response to a brand or campaign by analyzing positive, negative, or neutral mentions across social media platforms.

Technical Performance KPIs

• Ad Load Time: Ad Load Time = Time taken for ad to load after request. Also, how quickly an ad renders on a webpage or app directly impacts user experience and viewability rates.

• Latency: Latency = Delay time between ad request and ad delivery. Also, measuring the delay between a user action and the system response, particularly in ad delivery or data transfer, to ensure optimal performance and user experience.

Publisher-Specific KPIs (for AdTech Platforms)

• Fill Rate: Fill Rate = (Filled Ad Slots / Available Ad Slots) * 100

Note: Publisher demand: High is >75% is excellent. Good is < 75%-55% is average. Poor is <55% needs investigation

• Impressions: Impressions = Total Number of Times Ad is Displayed

Note: Impressions reflect the scale of ad exposure.

• Revenue Per Thousand Impressions (RPM): RPM = (Total Revenue / Total Impressions) * 1000

Note: RPM measures how much revenue a publisher earns for every 1,000 impressions.

• Ad Revenue: Ad Revenue = Total income generated from ad placements, including audio, display, video, and native ads.
Note: Total revenue is crucial for understanding overall ad monetization.

• eCPM (Effective Cost Per Thousand Impressions): eCPM = (Total Ad Spend / Total Impressions) * 1000

Note: eCPM helps publishers evaluate the overall performance of their ad inventory, combining both direct and programmatic ad revenues.

• Ad Request: Measures how often an app, website, or stream sends a call to an ad server to fetch an ad, helping to track demand and fill opportunities.

• Ad Allocation/Opportunity: When evaluating how available ad inventory is distributed among competing demand sources to maximize revenue and ensure optimal delivery.