

# AudienceLake on AWS

## A serverless, low-code data lake enabling clean room enrichment, ID resolution, audience segmentation, and media measurement

Agencies, AdTech platforms, and Measurement providers must anticipate consumer preferences, keep up with high-volume data flows, and maximize return on ad spend (ROAS) while adopting best practices for maintaining audience integrity in today's privacy landscape. Firms with a modern AWS infrastructure significantly boost their ability to integrate, analyze, automate, and act on petabytes of audience and media data leading to greater operational efficiency and campaign performance. Caylent's premier AWS cloud practices, with experience modernizing infrastructure, migrating data platforms, and implementing generative AI, address these challenges with an agile, data-centric strategy.

Caylent's data experts partner with customers to build a modern, unified data platform that enables data clean rooms, audience segmentation, media measurement, campaign optimization, and personalized recommendations with AI/ML. Our AudienceLake solution improves time to value and data platform scalability by ingesting sources through low-code solutions.

## Key Activities

### Discovery & Planning

Through a discovery workshop, we'll discuss your data sources, data lake foundation, and data exploration needs, then capture your requirements on data integration and access patterns

### Design & Implementation

Based on your requirements, we'll design the baseline infrastructure, data ingestion routines, and security model; build a data lake in your production account; and import up to 3 single schema sources

### Enablement

We'll then conduct an exploratory data analysis (EDA) lab so your team can gain hands-on experience using AWS Glue DataBrew and Lake Formation for data exploration, cataloging, and governance

## Engagement Details

### Initial Deliverables

- Data landscape educational workshop and requirements documentation
- Architecture diagram of data lake and data workflow designs
- MVP Serverless Data Lake
- EDA enablement lab on data wrangling and data stewardship
- All diagrams and documentation developed during the engagement including source code, scripts, templates, and other technical artifacts

### Future Enhancements

- Audience Analytics Platform - analytics platform using database engines to store data and provide audience insights.
- Content Consumption Analysis Tool - analyze content consumption patterns to provide viewer insights.
- Advertising Analytics System - analyze advertising data for business intelligence and visualization.
- 360 Audience View - integrate various data sources (social, streaming, media) to create a 360-degree view of the consumer.