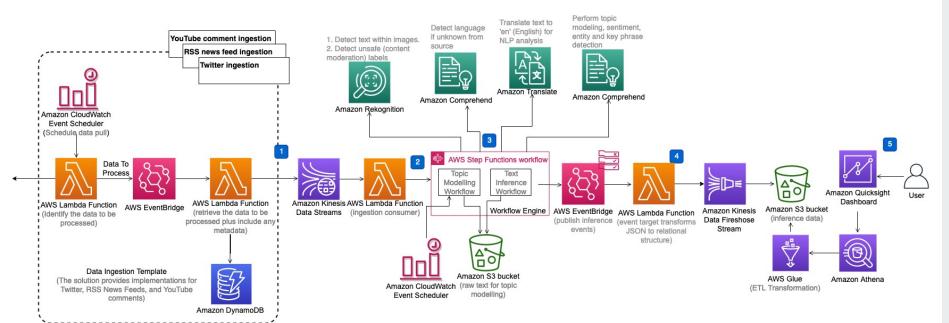
Discovering Hot Topics Using Machine Learning

This solution helps brand-conscious customers understand the most popular topics being actively discussed by ingesting digital assets and performing near real-time inferences and analytics. To deploy this solution using the available AWS CloudFormation template, select **Deploy with AWS**.



- Ingestion Social media and RSS feed ingestion and management using AWS
 Lambda functions, Amazon DynamoDB, and Amazon CloudWatch Event Scheduler.
 For detailed reference architecture diagrams for Twitter, YouTube comment, and RSS news feed ingestion, refer to the implementation guide.
- Data Stream The data is buffered through Amazon Kinesis Data Streams to provide resiliency and throttle incoming requests. The Data Streams have a configured DLQ to catch any errors in processing feeds.
- Workflow Consumer (Lambda function) of the Data Streams initiates an AWS Step Functions workflow that orchestrates Amazon Machine Learning capabilities including: Amazon Translate, Amazon Comprehend, and Amazon Rekognition.
- Integration The inference data integrates with the storage components through an event-driven architecture using Amazon EventBridge. EventBridge allows further customization to add additional targets by configuring rules.
- Storage and Visualization A combination of Amazon Kinesis Data Firehose, Amazon S3 buckets, AWS Glue tables, Amazon Athena, and Amazon OuickSight.