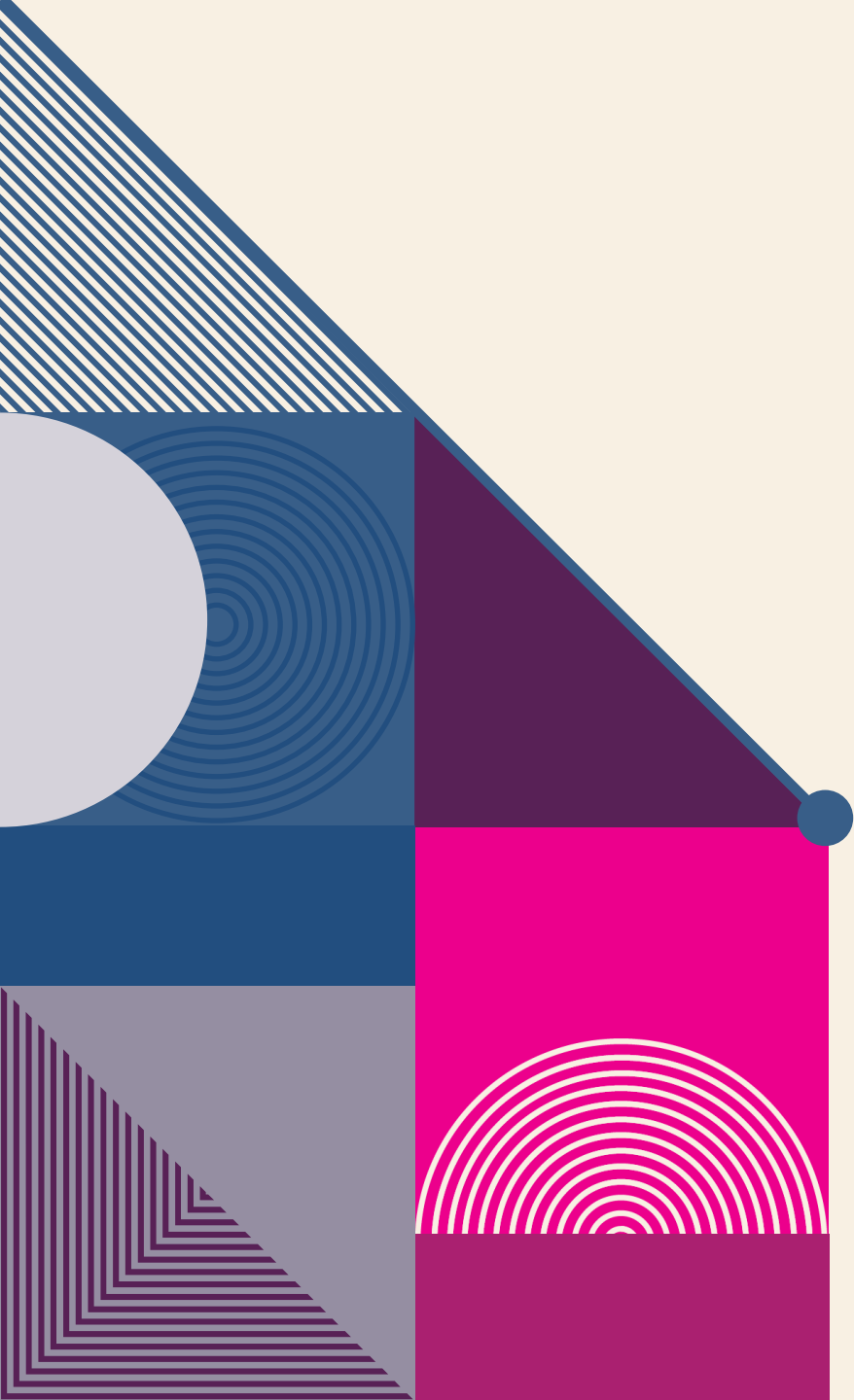


The background features a diagonal split from the top-left to the bottom-right. The upper-left triangle is dark blue and contains a white dot with a thin white line extending from it. The lower-left triangle is divided into several colored sections: a magenta section with concentric circles, a light grey section with a semi-circle, a magenta section with diagonal lines, a solid magenta section, a solid blue section, a solid grey section, and a solid dark blue section. The right half of the image is a solid dark blue background.

# EVENT DRIVEN ARCHITECTURE



# TOPICS

What is it?

Apache Kafka

AWS Event Bridge

# WHAT IS EVENT DRIVEN ARCHITECTURE?

- Event Driven
- Producer/Consumer Roles
- Highly Scalable
- Common in Distributed Systems





# EVENTS

- Represent change within the system
- Descriptive
- Immutable
- Serializable

A decorative graphic on the left side of the slide, composed of several overlapping geometric shapes and patterns. It includes a blue triangle with white diagonal lines, a light blue circle, a dark blue square with concentric circles, a dark purple triangle, a bright pink square with a white semi-circular pattern, and a grey square with a dark purple diagonal line pattern.

# PRODUCERS & CONSUMERS

- Producers create events, Consumers respond to those events
- Decoupled services via Event Bus/Broker
- Easy to extend
- Asynchronous communication

# APACHE KAFKA

- Distributed Event Streaming Platform
- Supports High Throughput
- Fault Tolerant
- Flexible Event Handling
- Works as a Broker for Publishers & Consumers
- Organizes Data in Event Streams Called Topics



# AWS EVENT BRIDGE

- Fully Managed Bus Service
- Scaling is managed for you
- Integrates with other AWS services
- Compatible with third party SaaS tools

## AWS EventBridge Pipes

- Offers managed integration between AWS Producer & Consumer services
- Pipes simplify connecting event sources with their targets
- Some examples:
  - Filtering
  - Transformation
  - Data Transference



# TUTORIALS

- Apache Kafka Quick Start: [Quickstart | Apache Kafka](#)
  - This quick start guide assumes you are working in a Linux environment.
- AWS EventBridge Getting Started Guide: [What Is Amazon EventBridge? - Amazon EventBridge](#)
  - Following the tutorials for EventBridge requires an AWS account