



CASE STUDY

Twelve 20 Inc

Reinvents Event Planning with an AI-Native Event Agent Built on AWS and Shri Sai Tech

Executive summary

Twelve 20 Inc, based in Bellevue, Washington, is building an AI-native event management platform — one where AI does not merely assist with event software, it is the event software. The platform lets organizers plan any event, from a tech conference to a product launch or trade show, entirely through natural conversation.

Traditional event planning is slow and fragmented: organizers juggle spreadsheets for agendas, separate builders for registration forms, and disconnected systems for attendees, tiers and exhibitors. Even a single event can take days of manual setup, with data scattered across formats that never connect.

To realise its vision, Twelve 20 Inc partnered with Shri Sai Tech (SST) to design, develop and deploy the AI Event Agent on Amazon Web Services (AWS). Leveraging Amazon Bedrock (Anthropic Claude 3.5 Sonnet), Amazon Aurora PostgreSQL and a serverless, cloud-native architecture, SST delivered an intelligent agent that turns a two-sentence brief into a complete, structured event plan in under 30 seconds.

The challenges

➤ Challenge 1 – Manual, Multi-Tool Event Setup

Organizers assembled each event across spreadsheets and disconnected tools, spending days on repetitive configuration instead of designing the experience.

➤ Challenge 2 – Slow Time-to-Launch

Building an agenda, registration forms and requirements by hand delayed every event and made last-minute changes costly and error-prone.

➤ Challenge 3 – Fragmented, Unstructured Data

Event details lived in loose files and JSON blobs rather than a relational model, making the data hard to query, reuse or scale.

➤ Challenge 4 – No AI-Native Experience

Existing tools bolt AI onto legacy workflows; there was no single conversational surface that could gather requirements and generate a complete plan end to end.

➤ Challenge 5 – Security and Multi-Tenancy

Serving many organizers required strict per-user data isolation and modern, passwordless authentication from day one.



About Twelve 20 Inc

Twelve 20 Inc is an event-technology company building an AI-native platform for planning and managing events of every kind — conferences, product launches, trade shows and corporate events.

Twelve 20's mission is to make event planning effortless: describe the event in a sentence, and the AI Event Agent builds the requirements, agenda and registration forms automatically.

Raj More

President / owner

Architecture, Design and Development of smartphone and web based AI integrated solutions that make work and life easy.



Simplify Digital Transformation with AWS

Amazon Web Services (AWS) provided Twelve 20 Inc with a secure, scalable and cost-effective cloud platform to build AI-native event planning from the ground up.

By leveraging managed AWS services, Twelve20 avoided the complexity of building and maintaining large-scale AI infrastructure while gaining access to advanced foundation models, a managed relational database and a serverless application layer.

Why Shri Sai Tech?

Twelve 20 Inc selected Shri Sai Tech for its deep expertise in AI/ML implementation, cloud-native architecture on AWS, conversational agent design and rapid delivery of production-ready solutions:

- **Key reasons Twelve 20 Inc selected SST:**
 - AI and machine learning implementation capabilities
 - AWS cloud architecture and Amazon Bedrock experience
 - Conversational agent and prompt-engineering expertise
 - Relational, AI-ready data modelling on Aurora PostgreSQL
 - Secure, multi-tenant application development
 - Agile delivery methodology
 - Ability to rapidly deliver a production-ready proof of concept

The Solution

SST designed and implemented the AI Event Agent — a conversational platform built on Amazon Bedrock (Anthropic Claude 3.5 Sonnet) and Amazon Aurora PostgreSQL — that turns a natural-language brief into a complete, structured and editable event.

- **AI Event Agent**

Gathers event requirements through natural, guided questions — detecting the event type and extracting dates, duration, venue, audience, goals and attendee tiers — and turns them into a structured plan.
- **AI Agenda Generator**

Generates a realistic, multi-day, multi-tier agenda with session titles, times, descriptions and per-tier access — fully reviewable with approve, regenerate and drag-to-reorder.
- **AI Registration Form Builder**

Context-aware registration forms generated per event type and attendee tier, with add / edit / remove fields, live preview and natural-language edits.
- **Streaming Conversational Experience**

A settings-free chat interface streams the agent’s progress in real time; agendas and forms arrive as editable cards, and every conversation is autosaved and instantly resumable.



➤ **Unified Event Data Model**

Every event — requirements, agenda, tiers, rooms, forms and registrations — is persisted to one relational PostgreSQL schema, replacing JSON blobs with a queryable single source of truth.

➤ **Secure, Multi-Tenant Platform**

Passwordless sign-in and per-user data isolation ensure each organizer sees only their own events and conversation history, with one-click export to PDF and JSON.

AWS Services and AI Models Used

➤ **Foundation Models**

Anthropic Claude 3.5 Sonnet (Amazon Bedrock) Primary reasoning model - Requirement extraction from conversation - Multi-day, multi-tier agenda generation - Registration-form generation and edits	Provider-Agnostic Model Layer Portable by design - Foundation model accessed behind an abstraction layer - Keeps the agent portable across models - Future-proof as new Bedrock models ship
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➤ **AWS Cloud Services**

- Amazon Bedrock — managed foundation-model access - Amazon Aurora PostgreSQL — relational, AI-ready event data model	- Serverless API layer on AWS Lambda and API Gateway - AWS CDK-managed, Well-Architected foundation
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Results

- **Speed**
 - Complete event plan — requirements, agenda and forms — generated in under 30 second
 - Event setup reduced from days to minutes
- **Structure**
 - Every event captured in one unified relational data model — no spreadsheets, no JSON blobs
 - Multiple event types validated — conference, product launch and trade show
- **Experience**
 - Streaming, settings-free conversational UX with editable agenda and form cards
 - Autosaved, resumable conversation history
- **Security**
 - Passwordless sign-in with per-user, multi-tenant data isolation
 - One-click export to PDF agenda and JSON for downstream systems



Benefits

- Minutes-not-days event planning from a single natural-language brief
- One relational source of truth for every event, ready to query and scale
- AI-generated agendas and forms that organizers review, edit and approve
- Multi-tenant security with passwordless authentication
- Autosaved, resumable conversations and one-click PDF / JSON export
- Provider-agnostic model layer — portable and future-proof across foundation models

Next steps

- Add speaker profiles and room / venue layout planning to the agenda
- Introduce attendee registration, badges and check-in flows
- Add CRM and ROI pipeline integrations for lead attribution
- Enable AI-powered attendee matchmaking and recommendations
- Expand export to Word / Excel and shareable public registration pages
- Scale to enterprise SSO (Microsoft Entra) and organization workspaces

About Shri Sai Tech LLC DBA SST

SST is an AWS Partner specializing in AI-driven, cloud-native architecture and secure, compliant solutions across a wide range of industries — including healthcare, finance, education, retail, manufacturing, logistics, energy, government and public sector, telecommunications, and media and entertainment. Partnering closely with our clients, SST rapidly designs and deploys production-ready AI platforms on AWS, bringing AI-powered capabilities to market with speed and confidence.



• Generative AI Consulting Services



- MSP Partner
- SaaS Partner
- Training Partner
- Marketplace Seller
- Network Competency