aws startups

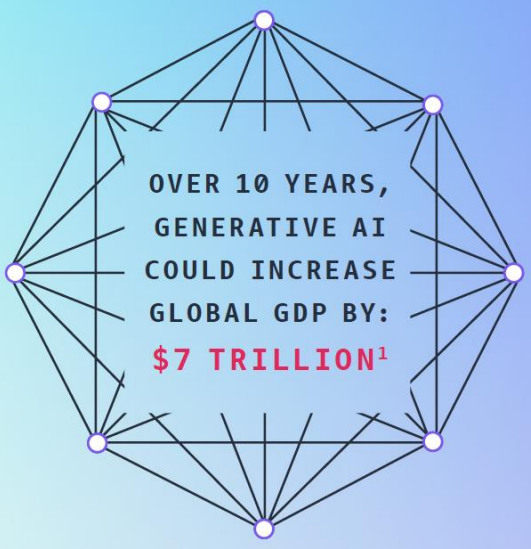
6 questions startup founders ask about generative AI

Discover how generative AI can transform your startup

Generative AI is here, and it's already transforming businesses across industries—with new use cases, products, and services emerging daily.

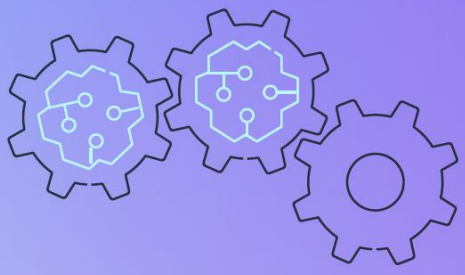
Startup founders are racing to unlock the technology's potential to improve innovation, enhance customer experiences, and boost productivity. But often, the path to realizing these benefits is unclear.

This infographic is designed to help you forge ahead—and start improving business outcomes with generative AI today.



IN THE US, GENERATIVE AI IS PREDICTED TO ENHANCE

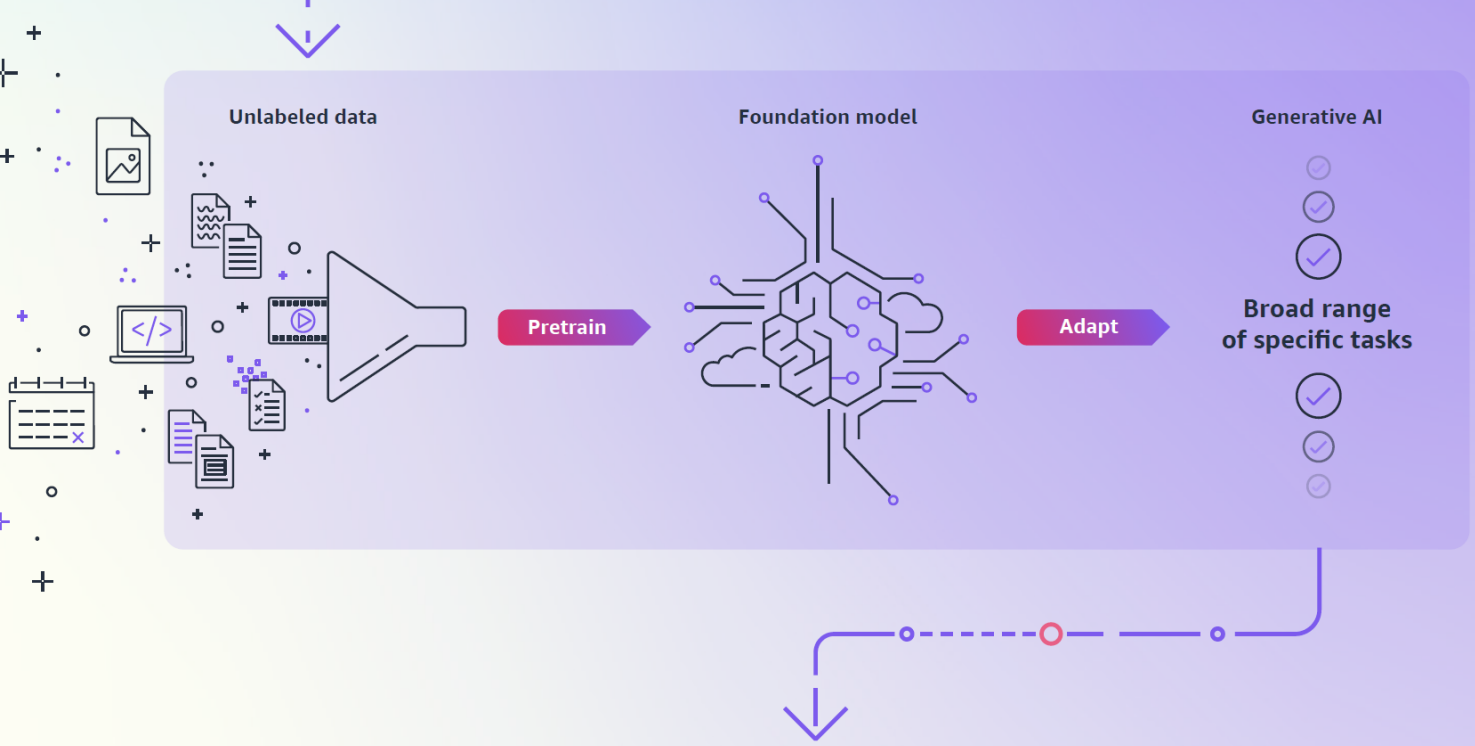
2 OUT OF 3 OCCUPATIONS[1]



QUESTION 1

What is generative AI?

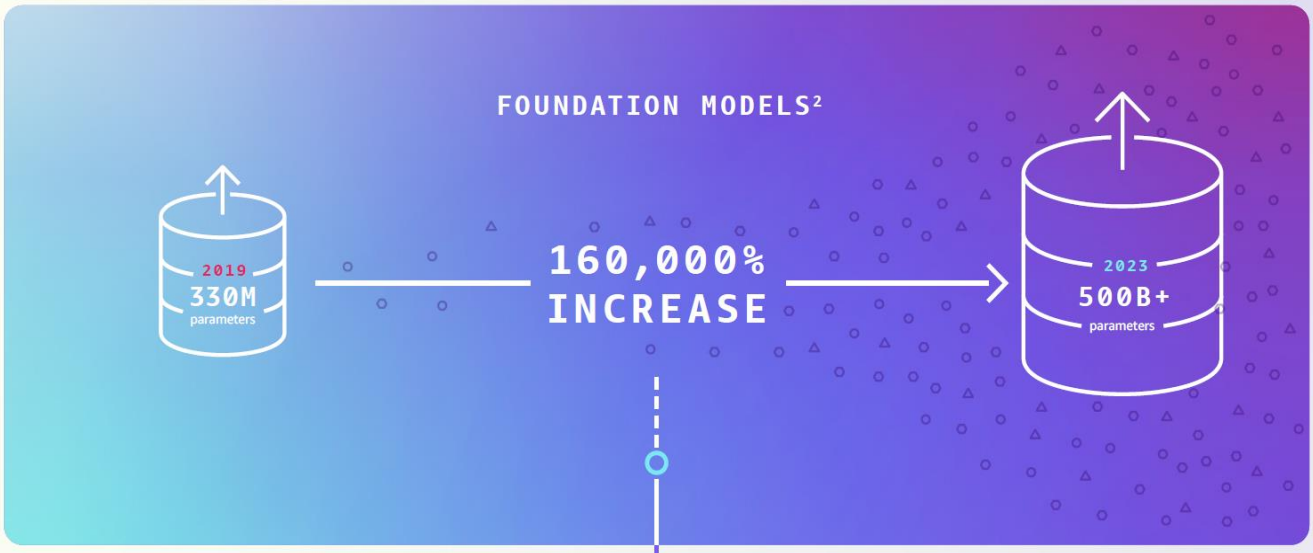
Generative AI is a type of artificial intelligence (AI) that can create new content and ideas, including conversations, stories, images, videos, and music. Generative AI uses foundation models (FMs), which are machine learning (ML) models pretrained on extensive data for adaptability across various tasks.



QUESTION 2

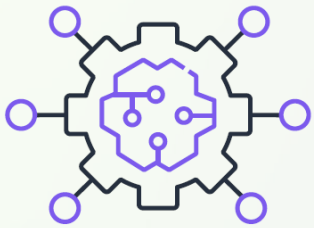
How is generative AI different from previous generations of AI?

Recent advancements in ML have given rise to models that contain billions of parameters (variables)—a massive increase from the most sophisticated models of just a few years ago. Generative AI models are trained on internet-scale datasets, which allows them to learn and apply their knowledge across a wide range of contexts.



QUESTION 3

Why are leading startups choosing AWS for generative AI?

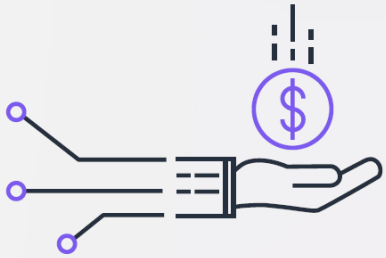


The easiest place to build with FMs

Amazon Bedrock is the easiest way for startups to build and scale generative AI-based applications using FMs, democratizing access for all builders. Amazon Bedrock makes FMs from Amazon and leading AI startups including AI21 Labs, Anthropic, Cohere, and Stability AI accessible via an API. Bedrock supports secure customization—keeping customers' data private and secure. You can readily integrate and deploy FMs into your applications and workloads using the familiar controls and functionality of services like Amazon SageMaker and Amazon Simple Storage Service (Amazon S3).

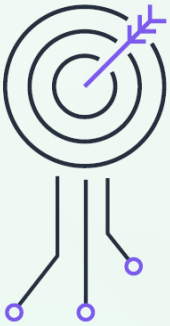
The most price-performant infrastructure for machine learning

AWS also makes it easier for startups to gain the high throughput needed for generative AI—while still keeping costs under control. Over the last five or more years, AWS has been developing its own silicon to push the envelope on performance and price performance for ML workloads. The result: AWS Trainium and AWS Inferentia, which deliver breakthrough performance and the lowest costs for training models and running inference in the cloud. Amazon Elastic Compute Cloud (Amazon EC2) instances powered by these chips can deliver up to 50 percent savings on training costs[3] and up to 40 percent better price performance for inference.[4]



50%

SAVINGS ON TRAINING COSTS[3]



57%

INCREASE IN PRODUCTIVITY[5]

Game-changing generative AI applications

Startups can count on AWS to continue driving generative AI innovation forward across our own services, solutions, and technology. Amazon CodeWhisperer, an AI coding companion, uses an FM under the hood to improve developer productivity by up to 57 percent.[5] It does this by generating intelligent, real-time code suggestions based on natural language developer comments and previously written code.

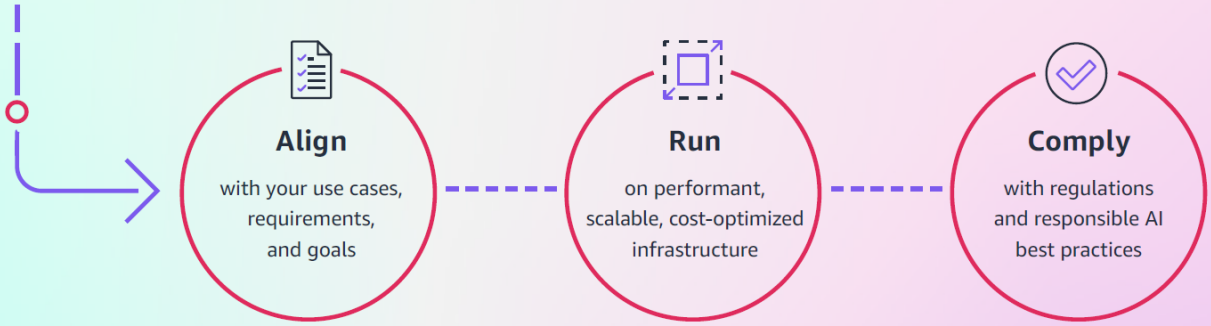
The flexibility to work with open-source models or build your own FMs

In addition to models in Bedrock, Amazon SageMaker JumpStart is an ML hub offering algorithms, models, and ML solutions. With SageMaker JumpStart, startups can discover, explore, and deploy open-source FMs that are not available in Bedrock, AWS is continuously adding more models. For startups who want to create their own FMs, Amazon SageMaker provides managed infrastructure and tools to accelerate scalable, reliable, and secure model building, training, and deployment.

QUESTION 4

What are the business considerations for generative AI?

When evaluating the growing list of generative AI models, look for options that:



QUESTION 5

Where can I use generative AI?

Generative AI can improve outcomes across many industry-specific use cases. Here are just a few examples:

Life sciences

- Accelerate drug discovery
- Design novel protein and synthetic gene sequences
- Create synthetic patient data

Healthcare

- Generate clinical documentation
- Match patients to trials
- Analyze multi-modal data
- Interpret medical images

Fintech

- Improve experiences
- Enhance knowledge-worker efficiency
- Analyze market sentiment
- Innovate and automate business processes

Media and entertainment

- Accelerate content creation
- Enhance music compositions
- Upscale, interpolate, and restore images and video

Ecommerce

- Enhance customer support
- Automate order processing and inventory management
- Personalize customer journeys and product recommendations
- Create virtual shopping assistants

Education

- Summarize texts
- Automate testing and grading
- Personalize and invent new learning experiences

QUESTION 6

How can you add business value with generative AI?

Content generation

Assist with creating essays, reports, emails, concept art, and designs.

Personalization

Personalize customer experience with highly relevant content and product recommendations.

Conversational AI

Make chatbots and virtual assistants more conversational, and leverage speech-to-text and translation capabilities.

Software development

Generate code snippets, comments, and documentation from natural language inputs to improve efficiency and accuracy.

Chatbots

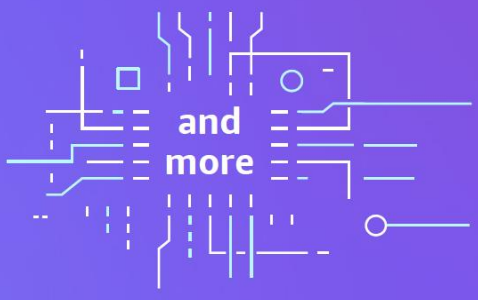
Create natural language-based conversational interfaces that provide more human-like interactions.

Question answering

Find and synthesize information quickly using natural language prompts from a large body of data, such as the internet.

Search

Find information in documents to improve search accuracy and quickly unlock insights to make data-driven decisions.



Unlock the power of generative AI for your startup with AWS

With the most cost-effective cloud infrastructure, a deep portfolio of AI solutions, and years of responsible AI expertise, Amazon Web Services (AWS) can help you unlock the business value of generative AI today.

Learn more about AWS generative AI for startups

Contact us

[1] "Generative AI could raise global GDP by 7%," Goldman Sachs, April 2023

[2] Sivasubramanian, S., "Announcing New Tools for Building with Generative AI on AWS," AWS Machine Learning Blog, April 2023

[3] Amazon EC2 Trn1 instances, powered by AWS Trainium, can deliver up to 50% savings on training costs over any other Amazon EC2 instance.

[4] Amazon EC2 Inf2 instances, powered by AWS Inferentia2, deliver up to 40% better price performance than other comparable Amazon EC2 instances.

[5] In a productivity challenge conducted by AWS during the preview, participants who used Amazon CodeWhisperer completed tasks 57% faster than those who did not use Amazon CodeWhisperer.