Alfresco
Tech Talk Live #153

December 20, 2023
Agenda

• Community news
• Use Generative AI to unleash the knowledge in your Alfresco repository
End of year celebrations
Resources

Alfresco

- ACS containers and cgroup v2 in ACS up to 7.2 (Hub)
- Alfresco Upgrade from 7.0 to 23.1 (GitHub)
- Alfresco Transform service with Prometheus (GitHub)
- Script RenditionService2 (GitHub)

Resources to come

- Adapting your logging configuration to log4jv2
- Share to ADF migration guide (thanks Loftux for the feedback!)
- Upgrading your addons to Jakarta EE 10 and Spring 6
- Upgrading to Apache Tomcat 10
- Using Control Center App with Community Edition
- Deploying Alfresco with Helm in Kubernetes
- What else? >> Share your ideas with us!
Collaboration

Video Recordings

• Hack #02 – Alfresco Architecture and News – Hacking ECM CWB by @ambientelivre

Contributions

• https://github.com/aborroy/alfresco-upgrade-7-to-23 by @ambientelivre
• https://github.com/aborroy/alfresco-transform-service-prometheus by @AOzil
• https://github.com/aborroy/alf-tengine-ocr/issues/16 by @SanjayBandhniya
• https://github.com/aborroy/script-rendition-service-2 by @hi-ko
• https://github.com/aborroy/alfresco-installer by @HervéBolli

Conferences

• https://fosdem.org/2024/ - FOSDEM, 3rd-4th February 2024
TTL
Speakers wanted!

• Take the opportunity to showcase your work with the community
• About Alfresco, Nuxeo, and associated technologies
• Best practices, integration, scaling, cloud, …
Today’s talk
Use Generative AI to unleash the knowledge in your Alfresco repository

WeeMeng Chong, Sr. Partner Solution Architect at Amazon Web Services
Hemant Prasad, CEO at Crest Infosolutions
Alfresco with AWS AI/ML and GenAI
Process flow for intelligent search

Alfresco repository -> Crest Connector -> AWS Lambda text extraction with Amazon Transcribe -> Amazon Kendra -> Crest UI for Alfresco
Process flow for document summarization

1. Alfresco repository
2. AWS Lambda text extraction
3. Amazon Bedrock Inference
4. AWS Lambda metadata decoration
5. Crest UI for Alfresco
6. Alfresco repository
Amazon Bedrock is a fully managed service that offers a choice of high-performing foundation models (FMs) along with a broad set of capabilities that you need to build generative AI applications, simplifying development with security, privacy and responsible AI. With Amazon Bedrock’s comprehensive capabilities, you can easily experiment with a variety of top FMs, customize them privately with your data using techniques such as fine tuning and retrieval-augmented generation (RAG), and create managed agents that execute complex business tasks—from booking travel and processing insurance claims to creating ad campaigns and managing inventory—all without writing any code. Since Amazon Bedrock is serverless, you don’t have to manage any infrastructure, and you can securely integrate and deploy generative AI capabilities into your applications using the AWS services you are already familiar with.

Amazon Bedrock customers can choose from some of the most cutting-edge FMs available today. This includes Anthropic's Claude, AI21 Labs' Jurassic-2, Stability AI's Stable Diffusion, Cohere's Command and Embed, Meta's Llama 2, and the Amazon Titan language and embeddings models.
Why choose Amazon Bedrock?

- Amazon Bedrock offers a wide selection of foundation models from leading AI providers. You can easily try out different models and switch between them using a consistent API.
  - Amazon
  - AI21 Labs,
  - Anthropic
  - Cohere
  - Meta

- Knowledge bases allow secure connections from foundation models to proprietary data sources (not just Alfresco). This retrieval augmentation makes the models more knowledgeable about your specific domain.

- Multiple capabilities in Amazon Bedrock support security and compliance requirements. Bedrock meets standards like SOC, ISO, and HIPAA eligibility for sensitive workloads.
At present Amazon Bedrock is available in the following AWS regions:

- US East (N. Virginia)
- US West (Oregon)
- Asia Pacific (Singapore)
- Asia Pacific (Tokyo)
- Europe (Frankfurt)
- AWS GovCloud (US-West)

Refer to [https://docs.aws.amazon.com/general/latest/gr/bedrock.html](https://docs.aws.amazon.com/general/latest/gr/bedrock.html) for the current availability list.

Refer to [https://aws.amazon.com/bedrock/pricing](https://aws.amazon.com/bedrock/pricing) for current pricing information.
Amazon Bedrock

Security

- Any customer content processed by Amazon Bedrock is encrypted and stored at rest in the AWS Region where you are using Amazon Bedrock.

- Users inputs to Amazon Bedrock and model outputs from Amazon Bedrock are not shared with any model providers.

- Amazon Bedrock is in scope for common compliance standards such as Service and Organization Control (SOC), International Organization for Standardization (ISO), Health Insurance Portability and Accountability Act (HIPAA) eligible, and customers can use Bedrock in compliance with the General Data Protection Regulation (GDPR). Amazon Bedrock is included in the scope of the SOC 1, 2, 3 reports, allowing customers to gain insights into our security controls. Amazon Bedrock is under ISO Compliance for the ISO 9001, ISO 27001, ISO 27017, ISO 27018, ISO 27701, ISO 22301, and ISO 20000 standards. Amazon Bedrock is CSA Security Trust Assurance and Risk (STAR) Level 2 certified. You can use AWS PrivateLink to establish private connectivity from your Amazon Virtual Private Cloud (VPC) to Amazon Bedrock, without having to expose your data to internet traffic.
Amazon Bedrock supports SDKs for runtime services. iOS and Android SDKs, as well as Java, JS, Python, CLI, .Net, Ruby, PHP, Go, and CPP support both text and speech input.

All above SDKs support streaming.