**Hackathon Categories**

1. **Code Re-use**:
   * Innovate faster, reduce waste, and create new products by reusing code, microservices, and solutions.
2. **Engineering Excellence**:
   * Automate development processes and improve developer experience by reusing standard engineering tools and solutions.
3. **Operational Excellence**:
   * Detect incidents faster and reduce recovery time through automation by reusing operational tools, services, and solutions.

**Key Technologies**

* **GenAI**
* **InnerSource – opensource code within experian**
* **Common Platforms** (such as Ascend)

**Suggestions for Participants**

* **Show Reusability**: Demonstrate what you have reused and/or created that others can now use.
* **Engage Customers**: Use posters to bring your customer to life and show how your solution impacts them.
* **Demo Your Build**: Present what you built during the hackathon.
* **Explain Your Idea**: Clarify what you were able to prove or how you will use your idea.

**Video Requirements**

* **Length**: Maximum 5 minutes
* **Content**: Teams will submit a pitch video explaining their idea and demonstrating their build.

**Submission Process**

1. **Submit Idea**: Teams will explain their idea through the submission page.
2. **Build It**: Teams will share their build via Bitbucket (code, visual prototype, experiment, etc.).

**Example Projects**

* **Code Re-use**:
  + **Ascend Ops, Activate & Feature Eng**: Reusing microservices to extend Ascend Ops globally.
  + **Data Hub**: Extending DataHub capabilities to add new data sources to the Ascend Tech Platform.
* **Engineering Excellence**:
  + **DevMate**: A GenAI-powered tool designed to revolutionize the developer lifecycle by automating key tasks.
  + **Apollo 11**: An integrated set of tools combining CI/CD pipeline, infrastructure, and standards.
* **Operational Excellence**:
  + **AIOps**: Using advanced ML and reusable prompts to find root causes faster and prevent future incidents.
  + **Observability**: Building a single pane of glass to measure and alert on business, application, and system metrics.

**Important Points**

* **Engage with Learning Sessions**: Gain insights on best practices and strategies for reusing technology assets.
* **Focus on Reusability**: Highlight how your solution reuses existing assets to create value.
* **Prepare a Clear Pitch**: Ensure your pitch video is concise, engaging, and clearly demonstrates your solution.
* **Meet Deadlines**: Submit your idea and pitch video on time to be considered for judging.

**Judging Criteria**

* **Problem**: Did your team identify an important, relevant problem to solve?
* **Build**: Did your team envision a solution and build it?
* **Reusability**: Did your team effectively reuse existing work to build and contribute for potential reuse?
* **Demo**: Did your team create interest and excitement about your idea?
* **GenAI**: Did your team intelligently and innovatively leverage GenAI technologies in your project?

Each criterion carries a 20% weight.

**Enhanced Script with Focus on GenAI, Reusability, and Workflow Automation**

**Introduction (30 seconds)**

**[Start with a Hook]** " Companies like Experian, banks, and financial institutions can now save countless hours and resources by automating the processing of cover letters. Today, I'm excited to introduce you to a solution that makes this possible. “

**[Problem Statement]** " Currently, BAs and the ADO team manually review client cover letters, validate requirements, and input data into products. This process is time-consuming, error-prone, and dependent on the availability of BAs and tools. Today, I'll show you how automation can solve these issues and bring significant improvements”

**Problem Definition (1 minute)**

**[Current Process]** Let's take a closer look at the current process and how the Ascend access platform works. When a client submits a cover letter, a Business Analyst (BA) manually reviews it, collects the requirements, and uses different tools to key in the inputs. The BA then logs into specific products (like sandbox, quest, etc.). Afterward, the user submits the program, which needs to be monitored and validated. If there are any issues, the BA must correct them and resubmit. This dependency on BAs and tool availability often results in bottlenecks, making it difficult to meet tight deadlines and increasing the overall turnaround time.

Let's take a closer look at the current process and how the Ascend access platform (AAP) works. The platform includes onboarded products for data ingestion such as GVAP, Sandbox, ADS Analytics, and Marketing, as well as self-service products like Quest and Prescreen Archives.

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**Solution Overview (1 minute)**

**[Ascend Robo Platform]** "Introducing the Ascend Robo Platform – an innovative solution that automates the entire process. By stitching various tasks into a pipeline based on the cover letter.

**[Automation Capabilities]** " Once the user inputs the cover letter, it automatically triggers the entire workflow from submission to validation to completion by creating executable JSON script. The platform then notifies the user via email, indicating whether the process has completed successfully or if specific user attention is required."

**Technology Demonstration (1 minute)**

**[Live Demo/Video]** "Now, let's see the Ascend Robo Platform in action. [Show demo or video] As you can see, the platform automates the entire process, from extracting information to executing tasks."

**[Reused Components]** " We've leveraged existing components from AAP, including UI components, DAGs, File Tracker, REST APIs, AWS infrastructure, PII Detection, and more."

**GenAI Integration (1 minute)**

**[GenAI and RAG Model]** "One of the most exciting aspects of our solution is the integration of GenAI. We use a Retrieval-Augmented Generation model to automate the conversion of cover letters into JSON format. Here's how it works:

1. **Input**: The input is a cover letter in various formats (Excel, JSON, PDF, XML).
2. **RAG Model**: The cover letter is fed into our RAG model, which has been trained on a dataset of cover letters and their corresponding JSON outputs.
3. **Training**: The model is fine-tuned to recognize patterns and extract relevant information, converting it into the required JSON format.
4. **Output**: The JSON output is then used to trigger REST APIs, automating the entire workflow.

This model is highly efficient and can handle different types of cover letters, ensuring accuracy and consistency."

**[Efficiency and Usefulness]** "The RAG model significantly reduces the time and effort required to process cover letters. It ensures that the data is accurately extracted and formatted, making the entire process seamless and error-free."

**Reusability and Innovation (1 minute)**

**[Reusability Focus]** "Based on the concept of this hackathon, which is reusability, the only new solution we built is extracting JSON from cover letters using the RAG model. The rest of the components are reusable. The entire DAG API, Airflow, pre-processing validation, ML detection code, regex patterns, file tracker, and all existing components are reused."

**[Reused Elements]** "Below elements are reused as part of this initiative:

1. Ascend Access UI components (Analytics - Charts, Audit trail - Events, Reports, Views)
2. Data Ingestion DAGs
3. File Tracker Service
4. Self Service DAGs
5. Platform REST APIs
6. AWS infrastructure
7. PII Detection & Uniqueness using Deep Learning & Regex patterns

Reusability Contributions include REST APIs, Airflow DAG operators, sensors, and artifacts."

**[Re-use Percentage]** "Our solution achieves a re-use percentage of 91% - 100%."

**[Time and Cost Savings]** "We estimate time savings of 91% - 100% and significant cost savings for Experian and our clients."

**Impact and Benefits (1 minute)**

**[Time and Cost Savings]** "By automating the process, we achieve significant time and cost savings for both Experian and our clients. The platform's efficiency and scalability ensure that we can handle large volumes of cover letters without delays."

**[Enhanced Experience]** "Moreover, the platform enhances the customer and developer experience by reducing manual intervention and minimizing errors, leading to faster and more reliable outcomes."

**Conclusion (30 seconds)**

**[Summary]** "In summary, the Ascend Robo Platform automates the manual processing of cover letters, saving time and costs, enhancing efficiency, and improving the overall experience."

**[Memorable Takeaway]** "Imagine the impact of this solution on the industry – a future where manual processes are a thing of the past, and automation drives success. Thank you for your time, and I look forward to your questions."

**Automated Cover Letter Processing**

**The process starts with the user uploading a cover letter in any format through the AAP UI. The system then uses the Retrieval-Augmented Generation model, enhanced by a Large Language Model , to gather relevant content from both internal and external sources. Once the content is retrieved, it's cleaned, normalized, and prepared . The system identifies patterns and structures within the data and extracts the necessary information**This extracted information is used to create a JSON script. This functionality can be exposed as a REST API or Artifact, enabling reuse and integration with other systems or applications for seamless processing and further execution.

**To ensure accuracy, we train the RAG model using sample cover letters and expected output formats. This training involves data augmentation and fine-tuning to improve the model's performance. The training results are stored in a database and used to continually enhance the system's efficiency and accuracy in processing cover letters.**

Feel free to adjust the script and slide content to better fit your style and the specific details of your project. Good luck with your presentation! If you need any more help, just let me know.  
  
  
  
**comments:**

"In conclusion, By automating the process, we achieve significant time and cost savings.. The platform's efficiency and scalability ensure that we can handle large volumes of cover letters without delays."