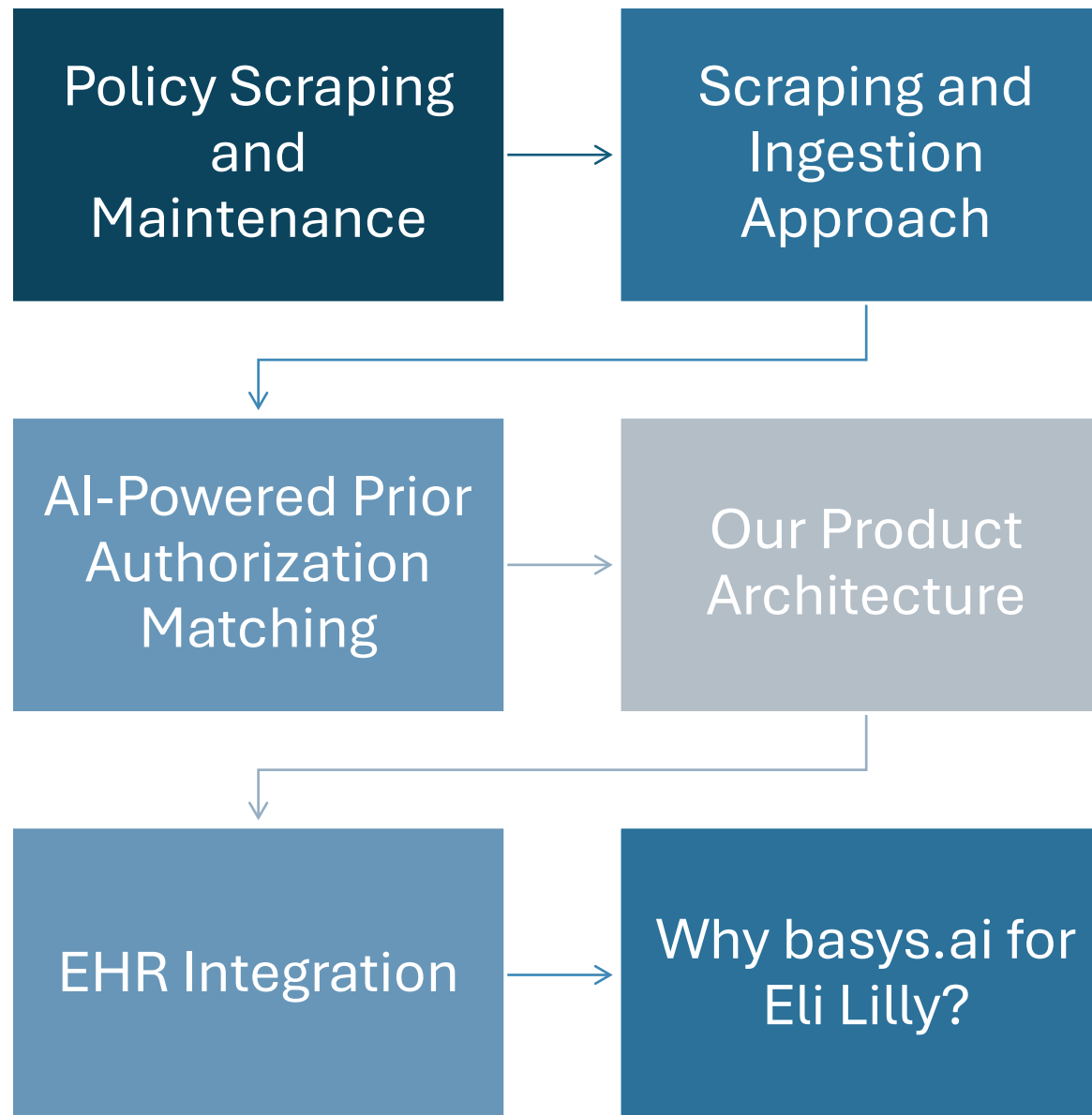




Streamlining prior authorization using generative AI

Agenda



Policy Scraping and Maintenance



Publicly Available Policies:
Automated web scraping at a
defined cadence



API-Based Policies: Direct
ingestion through API
integrations



Small Plans Without Public
Policies: Triangulation and
approximation using existing
data from similar plans



Ensuring Accuracy: AI-
powered text extraction and
standardization ensure high
data integrity

Scraping and Ingestion Approach

Update Frequency:

- Configurable based on policy release schedules

Repository & URL Definition:

- Automatic detection of policy sources

Policy Categorization:

- Classification by policy type and associated service codes (CPT, HCPCS, etc.)

Business Line Segmentation:

- Differentiation for commercial, Medicare Advantage, and Medicaid policies

Automation:

- Cron jobs execute ingestion and processing at defined intervals

AI-Powered Prior Authorization Matching



OCR & NLP Processing: Extracts and structures data from PDFs



Contextual Matching Algorithm: Aligns policy language with PA requests



Decision Support System: AI predicts PA success likelihood based on historical approvals



Model Accuracy Metrics:

Policy encoding validation scores

Success prediction benchmarks

Confidence scores for AI recommendations

Product Architecture

Scalability:

- Microservices architecture ensures adaptability for new policies and increased data volume.

Data Ingestion Layer:

- Scraping, API ingestion, and policy normalization

ML Decision Engine:

- Policy Encoding Model (LLMs fine-tuned on policy language)
- Pharma Model (specialized for medication PAs)
- Clinical Decision Model (context-aware PA recommendations)

Explainability & Trust:

- XAI techniques provide transparency in AI-driven decisions

EHR Integration



Current Sandbox Integrations:

Epic & Cerner: Fully integrated test environments



Flexible API Connectivity:

Athena, Allscripts, and other EHRs require minimal setup

Supports FHIR & HL7 standards for interoperability



Real-Time Data Exchange:

AI-driven pre-authorization checks directly within provider workflows

Continuous syncing with PA policy updates.

Why basys.ai for Eli Lilly?

Automated Policy Intelligence:

- Reducing manual workload through AI-driven extraction

Seamless EHR and Contract Matching:

- Ensuring faster, more consistent PA processing

High-Accuracy AI Models:

- Trained on vast PA datasets for better decision support

Scalable & Compliant:

- Adapts to evolving policy landscapes and integrates easily into pharma workflows

Thank You for Listening!

Any Questions?