



WHITE PAPER

Integration Framework: Connecting to EHR/EMR Systems

API specifications, data formats, FHIR compatibility, and deployment models (cloud/hybrid) for seamless EHR integration.

Published:	May 2025
Document ID:	WP-2025-003
Classification:	Public
Author:	ClinixSummary Research Team

This document is provided for informational purposes only. ClinixSummary is a product of GATMEDI. The information contained herein is proprietary and confidential. Reproduction or distribution without prior written consent is prohibited. For the latest version, visit clinixsummary.ai.



1. Executive Summary

Clinical documentation does not exist in isolation. For AI-generated notes to deliver value, they must flow seamlessly into the clinician's existing workflow — specifically, into their Electronic Health Record (EHR) or Electronic Medical Record (EMR) system. ClinixSummary's Integration Framework is designed to make this connection as frictionless as possible.

This white paper details the technical specifications, supported standards, deployment options, and security considerations for integrating ClinixSummary into existing healthcare IT infrastructure.

2. Integration Architecture

ClinixSummary offers three integration tiers to accommodate different infrastructure maturity levels:

- Tier 1: Manual Export — Copy-paste or document download. Zero integration overhead, suitable for solo practitioners or initial evaluation.
- Tier 2: API Integration — RESTful API with FHIR-compatible endpoints. Notes are pushed to the EHR/EMR via standard clinical document resources.
- Tier 3: Deep Integration — Bidirectional data exchange including patient context import (demographics, medication lists, problem lists) and note push-back. Requires EHR vendor cooperation or open API access.

3. FHIR Compatibility

3.1 Supported Resources

ClinixSummary generates and consumes FHIR R4 resources including:

- DocumentReference — Clinical notes as structured documents.
- Composition — Assembled clinical documents with section-level structure.
- Encounter — Visit context for note association.
- Patient — Demographics import for note pre-population.
- Condition, MedicationStatement, Procedure — Extracted clinical entities mapped to FHIR resources.

3.2 Terminology Bindings

Clinical entities are mapped to standard terminologies: ICD-10-CM/PCS for diagnoses and procedures, SNOMED-CT for clinical findings, RxNorm for medications, and LOINC for laboratory observations. Mapping accuracy is validated as part of the Clinix QM process.

4. API Specification

The ClinixSummary API follows RESTful conventions with OAuth 2.0 authentication:

- POST /api/v1/sessions — Create a new documentation session.



- POST /api/v1/sessions/{id}/audio — Stream audio to an active session.
- GET /api/v1/sessions/{id}/note — Retrieve the generated clinical note.
- PUT /api/v1/sessions/{id}/note — Submit clinician edits.
- POST /api/v1/export/{id} — Push finalised note to configured EHR endpoint.
- GET /api/v1/templates — List available note templates for the authenticated user's specialty.

Full API documentation with interactive sandbox available at: docs.clinixsummary.ai/api

5. Deployment Models

5.1 Cloud (SaaS)

Default deployment model. ClinixSummary handles all infrastructure, scaling, and maintenance. Data is processed in the customer's chosen geographic region (US, EU, UK, or AU). Suitable for most practices and organisations.

5.2 Hybrid

Audio processing and ASR run on-premises or in the customer's private cloud; NLP and document assembly are processed in ClinixSummary's cloud. Reduces data transmission while maintaining access to the latest model updates. Suitable for organisations with strict data residency requirements.

5.3 On-Premises (Enterprise)

Full ClinixSummary stack deployed within the customer's data centre or private cloud. Requires dedicated infrastructure and a ClinixSummary deployment engineering engagement. Model updates are delivered as signed packages. Available for Plan Enterprise customers.

6. Security Considerations

All integration pathways enforce the same security standards:

- TLS 1.2+ for all data in transit.
- OAuth 2.0 with short-lived tokens and refresh rotation.
- IP whitelisting and mutual TLS available for Tier 2/3 integrations.
- Audit logging of all API calls with tamper-evident log storage.
- BAA (Business Associate Agreement) executed for all US healthcare customers.

7. Conclusion

ClinixSummary's integration framework is designed to meet organisations where they are — from solo practitioners who need simple copy-paste to health systems requiring deep, bidirectional EHR integration with FHIR compliance. Our tiered approach ensures that integration complexity scales with organisational needs, not the other way around.