FRONT MATTER
FM 5 – OVERVIEW OF MITA INITIATIVE

CMS
CENTERS for MEDICARE & MEDICAID SERVICES

MITA
Medicaid Information
Technology Architecture

Table of Contents

List of Figures

List of Tables

Introduction

This section provides an overview of the Medicaid IT Architecture (MITA) initiative designed by the Centers for Medicare & Medicaid Services (CMS) to serve the Medicaid Enterprise in the States, the territories, and the District of Columbia (hereinafter referred to as States). This overview covers the following topics:

- Medicaid Enterprise
- MITA Explained
- Medicaid Enterprise Mission and Goals
- MITA Mission, Goals, and Objectives
- Federal Initiatives, Programs, and Legislation
- Guiding Principles
- Key Technical Architecture Features
- Challenges MITA Addresses
- Benefits to Stakeholders
- Using MITA
- Evolution of the MITA Initiative

Purpose

The purpose of this chapter is to provide an understanding of the MITA Initiative. The MITA Framework incorporates the Medicaid goals and mission to define a Medicaid Enterprise vision for all States.

Scope

The MITA Initiative defines the boundaries of the Medicaid Enterprise and the MITA missions, goals, and objectives. The MITA Initiative also defines guiding principles and key technical architecture features to apply to the Medicaid Enterprise. This chapter outlines the MITA Initiative benefits to Medicaid stakeholders, including the public, States, and the federal government.

Medicaid Enterprise

The MITA Initiative focuses on the Medicaid Enterprise. The Medicaid Enterprise is defined in the MITA context as three (3) spheres of influence:

- The domain where federal matching funds apply.

- The interfaces and bridges between the State Medicaid Agency (SMA) and Medicaid stakeholders, including providers, beneficiaries, other state and local agencies, other payers, CMS, and other federal agencies.
- The sphere of influence that touches, or is touched by, MITA (e.g., national and federal initiatives, including the Office of the National Coordinator for Health IT (ONC), Development Standards Maintenance Organizations (DSMO) and other federal agencies such as the Internal Revenue Service (IRS)).

Figure 5-1 illustrates the Medicaid Enterprise in the context of these three (3) spheres of influence. The illustration is a high-level representation of the primary stakeholders and is not all-inclusive of the Medicaid Enterprise, which is maturing at a very rapid pace.

The core of the Medicaid Enterprise is found in the first interior sphere – the business processes that support the SMA and where federal matching funds are available. This also includes the Health Insurance Exchange (HIX), the Health Information Exchange (HIE), and the CMS Registration and Attestation (R&A) System to enhance the exchange of information intrastate, interstate, and across national boundaries.

The second sphere represents the SMA exchange of information with key stakeholders through interfaces that are supported by federal matching funds (shown as narrow arrows in **Figure 5-1**). The MITA Initiative seeks to influence its data trading and sharing partners, although federal funding is usually not available for stakeholder operations.

The third outermost sphere is characterized by the exchange of information or influence without involvement of any federal matching funds for the SMA. An example of this type of relationship includes:

- MITA adopts guidelines and standards promulgated by the ONC, the Federal Health Architecture (FHA), the Federal Enterprise Architecture (FEA), and Standards Development Organizations (SDO). In turn, MITA proposes standards and guidelines to these organizations on behalf of the SMA. For example, a collaborative CMS and state workgroup could propose a National Provider Identifier (NPI) standard for atypical providers common to many Medicaid Programs.

With other entities such as the state unemployment agency, Medicaid may agree to provide access to certain data. An organization could move from the third sphere to the second, if CMS enters into agreement with the organization for an exchange of information that could in the future receive federal matching funds (e.g., in the event that the Centers for Disease Control and Prevention (CDC) requires certain messaging from the SMA related to bioterrorism or pandemic notifications).

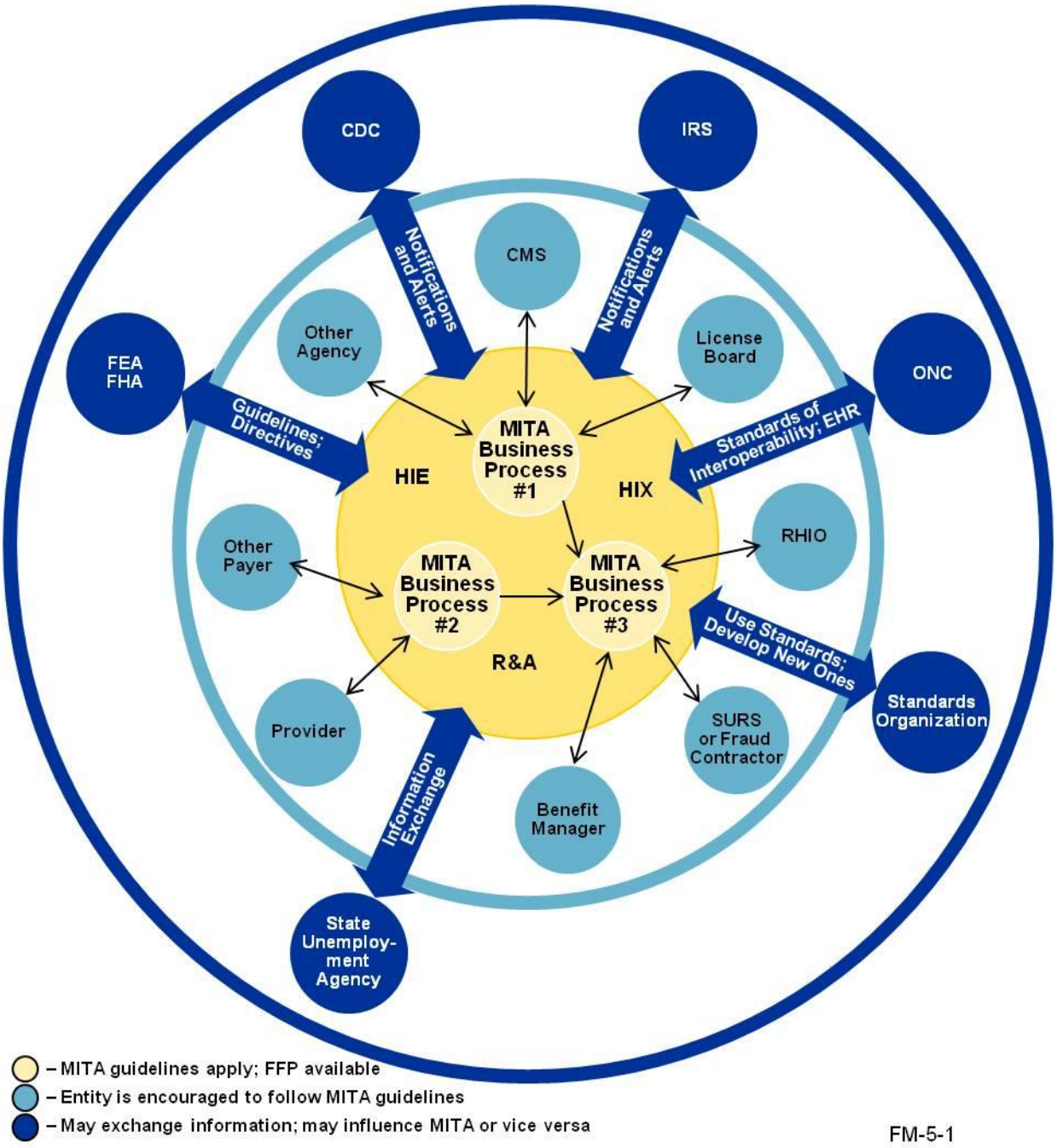

Figure 5-1. The Medicaid Enterprise Three Spheres of Influence

MITA Explained

MITA is both an initiative and a framework. As an initiative, MITA is a plan to promote improvements in the Medicaid Enterprise and the systems that support it through agreements between state agencies and its partners, including collaboration amongst intrastate and federal agencies. As a framework, MITA is a blueprint consisting of models, guidelines, and principles for States as they implement enterprise solutions.

MITA is an Information Technology (IT) initiative to stimulate an integrated business and IT transformation affecting the Medicaid Enterprise in all States. It improves Medicaid Program administration by establishing national guidelines for technologies, information, and processes. The MITA Initiative includes an architecture framework, processes, and planning guidelines for the State Medicaid Enterprise to foster national-level coordination of Medicaid transformation while supporting unique local needs.

- The MITA Framework is a consolidation of principles, business and technical models, and guidelines that create a template for States to use to develop their individual enterprise architectures.
- The MITA processes provide guidance to the State Medicaid Enterprise on how to adopt the MITA Framework through shared leadership, collaboration, and reuse of solutions.
- The MITA planning guidelines help States prepare the MITA State Self-Assessment (SS-A) and Roadmap to develop enterprise architectures to align to and advance increasingly in MITA maturity for business, architecture, and data. MITA guidelines support States' requests for appropriate Federal Financial Participation (FFP) for their Medicaid Management Information Systems (MMIS) as well as the Medicaid IT system(s) projects related to eligibility determination and enrollment activities.

The MITA Initiative and the MITA Framework evolve with the participation and help of Medicaid stakeholders and partners. MITA matures with insights from various working groups and States who have undertaken the MITA Framework, each providing feedback to enhance the Framework, processes, and planning guidelines.

The MITA Framework is the primary product of the MITA Initiative.

Architecture Framework

The MITA Framework consists of three (3) parts:

1. Business Architecture (BA)
2. Information Architecture (IA)
3. Technical Architecture (TA)

BUSINESS ARCHITECTURE

The BA provides the framework for improvements in the Medicaid Enterprise operations that result in better outcomes for all stakeholders. The BA contains models of typical Medicaid business processes and describes how these processes improve over time. A maturity model defines how business capabilities evolve to higher levels of maturity. States use the BA to assess their current business capabilities and determine future targets for improvement.

INFORMATION ARCHITECTURE

The IA is a companion of the BA. Business processes and capabilities map to a conceptual data model and a logical data model. The information requirements of the Medicaid Enterprise can impose change on the business model, and new business process requirements can require new information. The IA also includes a data management strategy and reference to data standards.

TECHNICAL ARCHITECTURE

The TA includes business, technical, and data access services; an application architecture; and technology standards. Collectively, these elements define a set of services and guidelines that States use to plan and specify their future systems.

Medicaid Enterprise Mission and Goals

The MITA Initiative originates with the Medicaid Enterprise mission and goals (see

Table 5-1). These statements are from surveys and interviews of State Medicaid Program directors, CMS division directors, industry leaders, and other federal agencies. They provide the foundation for the business-driven MITA Framework.

Table 5-1. Medicaid Enterprise Mission and Goals

Medicaid Mission and Goals	
Mission & Goals	***Description***
Medicaid Mission	To provide quality health care to members by providing access to the right services for the right people at the right time for the right cost.
Medicaid Goals	To improve health care outcomes for Medicaid members. To ensure efficient, effective, and economical management of the Medicaid Program.

MITA Mission, Goals, and Objectives

The MITA team developed the following mission, goals, and objectives statements in response to the Medicaid Enterprise mission and goals. Through the realization of these goals and objectives, MITA provides principles and guidance to assist States in achieving their State Medicaid Enterprise mission and goals.

MITA Mission

The MITA mission is to establish a national framework of enabling technologies and processes that support improved program administration for the Medicaid Enterprise and for stakeholders dedicated to improving health care outcomes and administrative procedures for Medicaid beneficiaries.

MITA Goals

The MITA Initiative seeks to accomplish the following goals:

- Develop seamless and integrated systems that communicate effectively to achieve common Medicaid goals through interoperability and common standards.
- Promote an environment that supports flexibility, adaptability, and rapid response to changes in programs and technology.
- Promote an enterprise view that supports enabling technologies that align with Medicaid business processes and technologies.
- Provide data that is timely, accurate, usable, and easily accessible in order to support analysis and decision making for health care management and program administration.
- Provide performance measurement for accountability and planning.
- Coordinate with public health and other partners, and integrate health outcomes within the Medicaid community.

MITA Objectives

The goals translate into the following MITA objectives:

- Adopt industry standards for data exchange.
- Promote reusable components through standard interfaces and modularity.
- Promote efficient and effective data sharing to meet stakeholder needs.
- Provide a beneficiary-centric focus.
- Support interoperability, integration, and an open architecture.
- Promote secure data exchange.
- Promote good practices (e.g., the Capability Maturity Model (CMM) and data warehouse).

- Support integration of clinical and administrative data to enable better decision making.
- Break down artificial boundaries between systems, geography, and funding (within the Title XIX Program).

Federal Initiatives, Programs, and Legislation

The Medicaid Enterprise is undergoing significant change. Examples that affect the MITA Framework include the following:

- Health Information Privacy
  - Administrative Simplification provisions
  - National standards for electronic health care transactions
  - National identifiers for providers
  - Health plans
- Health Information Technology
  - Electronic Health Records
  - Health Information Technology for Economic and Clinical Health (HITECH) of 2009
  - Health IT Standards and Certification
  - ONC Initiatives
- Medicare/Medicaid
  - Affordable Care Act of 2010
  - Electronic Health Records (EHR) Incentive Programs
  - Children's Health Insurance Program (CHIP)
  - Children's Health Insurance Program Reauthorization Act (CHIPRA) of 2009
  - American Recovery and Reinvestment Act (ARRA) of 2009
  - Health Information Exchange (HIE)
  - Health Insurance Exchange (HIX)
  - Medicaid Eligibility

Guiding Principles

The following key guiding principles underlie the MITA Framework:

- Business-Driven Enterprise Transformation
- Commonalities and Differences
- Standards First

- Built-in Security and Privacy
- Data Consistency Across the Enterprise

Business-Driven Enterprise Transformation

The MITA Framework uses established enterprise architecture principles. It defines a business transformation over a short- and long-term timeframe and defines a Technical Architecture and transition strategy to enable the business transformation. This approach is common today across industries as diverse as finance, transportation, and defense allowing States to align IT solutions with their common and unique business needs.

MITA supports the following categories of business needs facing State Medicaid Agencies:

- Individual state needs
  - Align with state strategic goals.
  - Align with the Medicaid Enterprise Architecture.
- Interstate Medicaid goals
  - Align state approaches among States.
  - Align state approaches with national direction.
- National Medicaid goals
  - Align with national initiatives and international standards for data and interoperability.

Commonalities and Differences

MITA defines processes, data, and technical solutions that are common to many State Medicaid Enterprises. The MITA Framework is adaptive and extendable in order to meet state-specific needs. Identifying common business processes enables the definition and reuse of common solutions, that in turn enables States to share development costs. The structure of the models and templates also incorporates organizational differences and accommodates commonalities that can result in States sharing common solutions.

State participation in the development of the models and templates ensures the proper representation of commonalities and differences among States. CMS encourages States to work together to agree on common approaches where suitable, such as the need to share data, develop end-to-end processes that connect organizations, and reuse or repurpose technical solutions. They may agree to differ where appropriate, such as on state-specific needs or in ways to promote creativity and innovation. The MITA Initiative encourages States to collaborate to create technical solutions that support variations, such as adapting or extending solutions. For example, there should be one (1) set of data validity edits and one (1) set of standardized business rules definitions for processing transactions used by multiple input sources (e.g., point of service, Internet, direct data entry, key entry, electronic media claim). All business rules and adjudication logic should be easy to modify or extend, such as with table-driven design or business rules engines.

This approach seeks to achieve a balance between commonalities and differences that will enable standard mechanisms for interoperability and data exchange. The goal is to

maximize the benefit across the Medicaid Enterprise, while promoting innovation and creativity in local implementations.

Standards First

The MITA Initiative promotes the use of nationally recognized data and technical standards to improve the cost effectiveness of IT development. The use of data standards ensures better access to data by promoting data consistency and enhanced sharing through common data access mechanisms. The use of technical standards (e.g., open standards) facilitates the integration of Commercial Off-the-Shelf (COTS) products and the reuse of solutions within and among States, resulting in lower development costs and risks.

To the greatest extent possible, MITA relies on both recognized national standards for health and data exchange and open standards for technical solutions. The Framework uses data standards produced by DSMO, whenever available. If such standards are not available, CMS supports collaboration efforts with industry groups across standards organizations where appropriate. CMS continues to collaborate with other federal agencies and industry groups in harmonizing data standards across disparate groups. Because data standards are quite dynamic, States will need to conduct a periodic review of the available data standards and versions to keep the data standards current.

Some specific opportunities for applying standards in State Medicaid Enterprise include:

- Functional modules designed for component reuse and interoperability. An equivalent functional module from another vendor could then easily replace a given module (e.g., a data warehouse module) from one (1) vendor.
- All systems use open, nonproprietary file structures that any other application or reporting system can access.
- States use a System Development Life Cycle (SDLC) type model that includes life-cycle phases and transition stage gate reviews for such items as business service descriptions/definitions, requirements specifications, system design specifications, data models, interface control documents, and integration test cases.
- One universal data directory with clear, unambiguous definitions and formats for each data element (e.g., names, addresses, dates, and special code sets for sex, location, eligibility category, patient status, and procedure/diagnosis).
- Data structures and system architecture have conceptual and logical data models.
- To the extent possible, multiple databases with similar data from different sources that feed the Medicaid Enterprise are standardized and incorporated into master records (e.g., multiple sources of eligibility information are consolidated around a single, permanent identification number in an eligibility hub). The same holds true for multiple sources of accounts receivables (e.g., adjustments, Third-Party Recoveries (TPR), Surveillance and Utilization Review (SUR) recoveries, and drug rebates).

Built-in Security and Privacy

The MITA Initiative key security and privacy principles include the following:

- The architecture contains security and privacy capabilities. Business processes have access requirements, data models, and technical models that address security and privacy capabilities.
- Technical capabilities protect the Medicaid Enterprise against known threats and, as it evolves, respond to new threats.
- Security in the data models includes the following:
  - Access rights specified by role and by data element
  - Tagging private data
  - Linking use of data with data query definition
- Security uses the following:
  - Configuration tools
  - Business application functionality linked to common security mechanisms
- Alignment with Federated Identity Credential and Access Management (FICAM)/State Identity Credential and Access Management (SICAM) initiatives to systems that support the Medicaid Enterprise.

Data Consistency across the Enterprise

The principle of data consistency across the Medicaid Enterprise seeks to ensure, to the greatest extent possible:

- Copies of a data element are minimal.
- Synchronization of multiple copies, when necessary.
- The official data of record is always available.

Key Technical Architecture Features

The key features of the Technical Architecture are the following:

- Adaptability and extensibility
- Business Rules Engines
- Cloud Computing
- Common interoperability and access services
- Enterprise architecture
- Hub architecture
- Performance monitoring
- Service-Oriented Architecture (SOA)

Adaptability and Extensibility

Adaptations allow States to change the specifics of processes, data, or technical solutions using configuration files to meet their specific needs. Extensions allow States to add new functionality and capabilities. Both characteristics build in the capabilities to accommodate both common and state-specific needs.

Business Rules Engines

Since the Medicaid environment is frequently dealing with changing legal regulations and mandated policies, the use of standardized business rules definitions and rule engines is an effective way to make rapid changes to the logic of the system. The main benefit is that rule engine statements are not embedded within the system application program (i.e., programming code). Business rules engines also provide a manner for externalizing business rules from applications and empower the business users of the Medicaid systems. Simplified business rules are business-oriented statements that encode business decisions. These rules are often phrased simply in an if/then conditional form, but also offer matching algorithms that can determine which rules need to be run and in what order.

States should ensure the use of business rules engines to separate business rules from core programming, and should provide information about the change control process that will manage development and implementation of business rules. States should be able to accommodate changes to business rules on a regularized schedule and on an emergency basis.

Cloud Computing

Cloud Computing is a design methodology for delivering IT solutions. The National Institute of Standards and Technology (NIST) provides a concise and specific definition:

> Cloud Computing is a model for enabling convenient, on-demand network access to a shared pool of configurable computing resources (e.g., networks, servers, storage, applications, and services) that can be rapidly provisioned and released with minimal management effort or service provider interaction.

Cloud Computing allows for the sharing of established web services across the intrastate or interstate to reduce development time and enhance cost-efficiencies. States should pursue a service-based and cloud-first strategy for system development. States will identify and discuss how they will identify, evaluate, and incorporate commercially or publicly available off-the-shelf or open source solutions, and discuss considerations and plans for cloud computing.

Common Interoperability and Access

Utility services make it possible to implement common interoperability and access. Interoperability refers to the ability of a system to work with or use the parts or equipment of another system. Systems must also be built with the appropriate architecture and using standardized messaging and communication protocols in order to preserve the ability to efficiently, effectively, and appropriately exchange data with other participants in the health and human services enterprise.

Access refers to the ability of a person to access business functions regardless of which system(s) are responsible for the activity. For example, a mobile device can be used for processing, receiving, and sending data without the need to maintain a wired connection with the internet. On the other hand, a single application can allow access from multiple media (e.g., Web interfaces, mobile devices, kiosks, or voice response systems).

Enterprise Architecture

Given the expansion and enhancement of the Medicaid systems (i.e., exchanges, Cloud Computing, near real-time transaction processing, etc.) and the move by many States to consolidate agency systems, there is a real need for an encompassing architecture plan to span the U.S. Department of Health & Human Services (HHS) Enterprise Architecture. The FEA describes Enterprise Architecture (EA) as establishing the agency-wide roadmap to achieve an agency's mission through optimal performance of its core business processes within an efficient information technology environment. The MITA Framework 3.0 utilizes the National Association of State Chief Information Officers (NASCIO) definition of EA that states an "Enterprise Architecture defines an enterprise-wide integrated set of components that incorporates strategic business thinking, information assets, and the technical infrastructure of an enterprise to promote information sharing across agency and organizational boundaries." Since the Medicaid Enterprise systems are large and often comprise of custom software of diverse components. They require effective enterprise application architectures to handle the transactional workloads and scale to support the ever-changing business realities.

Enterprise architectures are blueprints for systematically and completely defining an organization's As-Is operations or To-Be environment. Many organizations use common Enterprise Architecture frameworks and methodologies to assist in the gathering and organizing of the abundant systems information involved in a state HHS agency. A few of the more popular frameworks include the Federal Enterprise Architecture Framework (FEAF), Gartner Methodology, The Open Group Architecture Framework (TOGAF), and the Zachman Framework for Enterprise Architectures.

Hub Architecture

The data hub architecture facilitates the exchange and sharing of data, while allowing each organization to have control and ownership of its own information. Data hubs, unlike data marts and data warehouses, do not require a central location for data. Standard definition formats describe data and map to standard data elements where appropriate. The definitions also provide the data descriptions when the data elements are nonstandard. Definition formats also represent security and privacy access rules for each data element in a standard way. Collections of data access services use data descriptions, security, and access rules to expose the data to authorized users.

With the push to establish SOA Medicaid Enterprise systems and the prescribed move to Cloud Computing where possible, the creation of web service hubs is highly desirable to maximize efficiency and promote interoperability. Unlike the data hubs, the web service hubs house the web service applications for use by the State Medicaid Enterprise systems. Cloud Computing or externally hosted environments conducts the required computing. For discovery purposes, a service registry is established to inventory and track the numerous services that exist. CMS will provide more direction and future guidance about registries.

Performance Monitoring

The use of standards on a set of common business processes and data sets make it possible to develop performance standards, measurement techniques, conformance criteria, and corresponding utility services. Performance standards make it possible to measure business performance across the Medicaid Enterprise and State Medicaid Enterprise, including trending activity in programs and policies, modeling utilization of services, and evaluating corresponding changes in health outcomes.

The MITA Framework supports the expansion of performance standards, performance measures, and performance metrics, as they are defined by CMS in future guidance or as defined by an individual state. CMS intends to provide additional guidance concerning performance standards—both functional and non-functional, and with respect to Service Level Agreements (SLA) and Key Performance Indicators (KPI). We expect to consult with States and stakeholders as we develop and refine these measures and associated targets.

Service-Oriented Architecture

SOA is a software design strategy that packages common functionality and capabilities with standard, well-defined service interfaces. This describes formal functionality that a published service contract can invoke. Service users are not aware of the technological solution; however, they do know when a task is completed. State Medicaid Enterprise can build a service using new applications, legacy applications, COTS software, or a combination of all three (3). Services are an ideal solution to support state-specific implementations.

The MITA team is aware that the technical term, service, can cause confusion with the common business term as in medical services, professional services, physician services, category of service, or type of service. The context determines the use of the word service.

Challenges MITA Addresses

Most State Medicaid Enterprises are highly complex, multi-million dollar enterprises. They are major economic engines that, collectively, draw billions of dollars in federal funding each year to local economies. Medicaid is the largest or second largest budget item in each state and has high political visibility. The MMIS contract is typically the largest services contract let by state government and, in many cases, also attracts intense public scrutiny.

The Medicaid Enterprise includes the MMIS that is a mechanized system of claims processing and information retrieval used in state Medicaid programs under title XIX of the Social Security Act (the Act). The SMA uses the system to process Medicaid claims from providers and to retrieve and produce utilization data and management information about medical care and services furnished to Medicaid beneficiaries. The Medicaid Enterprise also includes eligibility determination systems that may be external to the MMIS and includes systems that run on multiple hardware and software platforms.

Historically, as Medicaid functions (e.g., managed care, data analysis) became automatic; they were added as separate systems or, in some cases, were hard coded into the MMIS. As a result, these dispersed systems do not necessarily communicate directly and often exchange information with difficulty. Medicaid administrators are unable to easily get information for program integrity reporting.These special-purpose, "best-of-breed" systems might have a dozen different servers and user support systems (e.g., separate applications and call centers). Each separate platform having its own unique, and usually proprietary architecture, data standards, update cycles, and workflow requirements. This makes it increasingly difficult and expensive to maintain.

A state's MMIS might process most claim types under one (1) architecture and one data standard, but process other claim types (e.g., dental and pharmacy claims) through stand-alone systems. Again each of which might have its own architecture and data standards. For example, formats for gender code may be stored in different ways in the separate claims-processing systems (e.g., a gender code might be 1, 2, or 3 in one system and M, F, or U in another). It can be difficult to translate various data formats to a single standard that populates a data warehouse used for reporting, profiling, trending, analyzing, and pattern recognition. The results may be severe compromises in data quality and usability.

MITA provides the principles and guidelines to support the entire State Medicaid Enterprise to integrate information that it receives and coordinate business operations. A universal data dictionary and industry standard definitions of common data elements allows the state to transcend technological platforms. Using best-of-breed systems for special purposes requires that those systems be compatible with the data and architecture standards so organizations can communicate directly with meaningful data.

Benefits to Stakeholders

The MITA Initiative provides significant benefits to Medicaid stakeholders, including the public, States, and the federal government. The MITA principles and guidelines achieve the following benefits.

Benefits to the Public

One-stop shop for financial assistance – The MITA Framework includes the Health Insurance Exchange (HIX) to provide a seamless experience for the beneficiaries to acquire Medicare, Medicaid, and CHIP or Basic Plan Program assistance. Application of consistent business rules that respond with eligibility determination near-real time.

Widespread use of electronic health records – The MITA Framework includes the Health Information Exchange (HIE) for higher quality, safer, and more effective access to a beneficiary's health records providing better-informed patient care decisions.

Greater beneficiary access to quality care – MITA encourages managers of Medicaid Programs to target at-risk populations and collect point-of-care quality statistics to improve patient safety.

Greater choice and independence for beneficiaries – MITA enhances intrastate analysis of provider performance by beneficiaries improving their quality of care; increasing knowledge promotes choice and independence for beneficiaries.

Improved public health outcomes – MITA promotes greater access to clinical and administrative data. This supports research and analysis, improvement of public health surveillance, and early response to bioterrorism attacks and pandemic outbreaks.

Reduction in fraudulent activity – MITA follows principles and guidelines established by federal regulation to eliminate fraudulent activities to protect providers, beneficiaries, and lower health care costs.

Improved return on state and federal investments – The MITA Framework promotes common business practices and reusable services to provide efficiencies that benefit the public.

Benefits to the States

Participate in Health Reform – MITA provides guidance, principles, and tools so States are able to provide insurance markets and provider networks to meet the needs of their residents in a manner that is flexible, cost effective, and expands Medicaid eligibility.

Alignment with federal grant requirements – MITA includes federal grant requirements that assist States with strategic planning and acquiring the maximum allowable amount for funding.

Improved enterprise architecture documentation – The MITA Framework provides guidelines to document business process models, information models, and technical architecture models for better understanding of business needs.

Support for consumer assistance – MITA includes guidance to strengthen the state's ability to provide consumers with information, enrollment assistance, and track consumer problems for enhanced experiences.

Enhanced prevention and wellness – MITA enables a shift from being primarily, a transaction-based agency to one that is monitoring performance of health care services, a state is able to focus more on prevention and wellness offerings to reduce health costs further.

Increased business relationships – MITA standards encourage the development of business relationships that enhance the sharing of data as well as the reuse of resources for the processing of claims. Collaborations among intrastate, interstate, and federal agencies take advantage of economies of scale to reduce the burden of costly development.

Enhanced performance reporting – MITA provides guidance and principles to establish KPI and continued monitoring for improvement opportunities.

Improvements in the management of the Medicaid Program – MITA gives States better access to a wider range of accurate and timely data. SMA is able to share this data within the Medicaid Enterprise, with other state and federal agencies through efficient and secure data exchange. As the State Medicaid Enterprise becomes more adaptable, States respond more effectively to operational influences such as regulations and technology advancements. They formulate specific policies that support broader analysis of program needs and measurement of health outcomes.

Improved return on state IT investment – MITA provides a common direction for the future development and evolution of a State Medicaid Enterprise. There is an inherent

improvement of return on IT investment through reusable system components, adherence to common standards, improved coordination, and alignment with national health initiatives.

IT alignment with Medicaid priorities – MITA promotes the alignment of each state's individual business goals with its IT strategies through enterprise architecture methodology that is supported by Medicaid priorities.

Benefits to the Federal Government

Improved CMS review of state Medicaid IT plans and systems – MITA establishes criteria for guiding SMA development of an Advance Planning Document (APD) to include components that reflect MITA goals and objectives. CMS Regional Office staff use the same criteria for a consistent review of each SMA APD submissions.

Improved strategic planning and policy formulation – MITA fosters sharing of timely, accurate, usable, easily accessible, and secure information among state and federal agencies, and it provides necessary and important insights into national trends and the needs of the Medicaid-eligible and provider populations.

Alignment with national health information initiatives – MITA supports and incorporates the principles of national initiatives, especially those that support improving the quality of public health data.

Collection of National Resources – MITA encourages States to collaborate with interstate, intrastate, and federal agencies to take full advantage of secure and timely data exchanges. Technology improvements allow for the distribution of best practices and business services to reduce the development costs for Medicaid systems. These resources are available across the nation for all States to utilize for standardization.

Seamless Coordination and Integration – MITA standards offer guidance to States to mature to an environment where there is seamless coordination and integration between intrastate, interstate, and federal agencies. This allows for smooth transaction processing, consistent business rules, access to performance metrics, and more informed decision making.

Using MITA

The Medicaid stakeholders, including CMS, States, vendors, other agencies, and other organizations use the MITA Framework within the Medicaid Enterprise.

CMS

CMS uses MITA to communicate a common vision for the Medicaid Program and to provide guidance on achieving that vision. CMS is committed to assisting States to meet relevant federal regulations such as CHIP, ARRA, HITECH, HIPAA, the Affordable Care Act of 2010, and others. In order to comply with the federal regulations, new business procedures and business rules are being defined, information data exchanges (e.g., health information and health insurance) are being developed, and advancement in technology methodologies (e.g., Cloud Computing and SOA) are being applied. The MITA Framework provides the States:

- Documentation that reflects current developments with health reform and health information technology.
- A BA with business models that describe the Medicaid Enterprise and provide flexibility to accommodate state-specific variations and a changing industry.
- An IA with conceptual and logical data models based on industry standards for data and transactions.
- A TA defining solutions that promote sharing, leverage, and reuse of Medicaid technologies and systems within and among States.
- SS-A tools to assist States to align to and advance increasingly in MITA maturity for business, architecture, and data.

All of this activity leads to an APD review process and criteria to ensure that state IT planning meets MITA goals and objectives. The APD includes the following:

- Statement of purpose, including vision, the Roadmap, needs, objectives, and anticipated benefits.
- If applicable, results of activities included in the Planning APD (PAPD), and State Medicaid Health Information Technology (HIT) Plan (SMHP).
- The business need(s) for the system development or modification.
- The state's approach to working with the other entities (e.g., Exchange component).
- Requirements analysis, feasibility study, and alternatives analysis.
- Cost/Benefit analysis.
- Nature and scope of the activities to be undertaken and the methods to be used to accomplish the project including organization, resources, project schedule, major milestones, deliverables, and key dates.
- Procurement and solicitation activities.
- Quarterly and total project budget and cost distribution including budget categories, federal/state shares, and FFP.
- Cost allocation.
- Statement of security interface and disaster recovery requirements.
- Assurances of procurement standards, data access, licensing, ownership of software, safeguarding of information contained within the systems, and if applicable Independent Verification and Validation (IV&V).
- Compliance with assurances associated with all federal stakeholders.
- Compliance with Enhanced Funding Requirements: Seven Conditions and Standards (Seven Standards and Conditions).
  - Modularity Standard

- MITA Condition
- Industry Standards Condition
- Leverage Condition
- Business Results Condition
- Reporting Condition
- Interoperability Condition

States

The goal of MITA is to change the way States design, build, or modify their Medicaid systems as well as the manner in which States perform IT investment planning. States ensure that their business goals and objectives meet the MITA goals and objectives. To adopt the MITA Framework, States choose the elements of the MITA Framework that best meet their strategic and tactical IT goals, and reflect their choices in their APD. CMS recognizes that States have diverse needs and are likely to begin their participation at different points. MITA provides a Framework that a state customizes to meet each their specific needs.

States can help refine the MITA Framework models to ensure that MITA meets the ongoing, changing needs of state Medicaid participants. States can also collaborate on joint projects to develop and implement shareable, reusable IT components and business processes. State participation helps influence the Medicaid Enterprise of the future.

Vendors

CMS encourages vendors to use the MITA Framework to shape their product offerings to meet MITA guidelines, thus leveraging the reuse of solutions across States. Vendors can consult the Framework to determine how well their products and services align with MITA models and principles. They can also develop web services to offer to all States, use the strategies for transformation proposed by MITA to plan their own evolution, and assist their state customers in adopting MITA principles. CMS seeks vendor participation in the development of services that can be exposed to the Medicaid community and to create standard interfaces that conform to MITA standards.

Evolution of the MITA Initiative

The MITA Initiative is a collaborative effort supported by CMS, States, vendors, other agencies, and other organizations within the Medicaid Enterprise. The vision for the MITA Framework cannot be achieved in a short period of time. It is a long-term commitment to seek efficiencies and make improvements along the way. While CMS continues in its role of guidance and maintenance of the MITA Framework, CMS needs collaborative groups of States, agencies, and vendors to perform the following important tasks:

- Refine and revise the models presented in this document as the industry changes.
- Develop shared business services and solution sets.

- Offer training to clarify how to apply the MITA Framework to the State Medicaid Enterprise.
- Set up Communities of Interest (COI).
- Support a repository for all MITA artifacts (e.g., models, services, metadata, state best practices).
- Develop a logical data model as a companion to the business process model.
- Create governance boards.
- Support an architecture board that can test products as they become available.

The combination of all these collaborative efforts continue to advance the goals of MITA. CMS has incorporated the MITA principles in the review and approval of FFP for future State Medicaid Enterprise Design, Development, and Implementation (DDI) activities. Alignment with the MITA Condition is required. Overlapping functionality shared or leveraged between Exchanges, Medicaid, and CHIP guidance documentation aligns to MITA. We are continuing to integrate the standards and conditions into systems certification review criteria as benchmarks to measure progress from the historic legacy Medicaid systems to modern enterprise wide, beneficiary-centric systems that exchange accurate data across the nation.