



# The Hidden Power of Coding in Transforming Revenue Cycle Management

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E-BOOK

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# Health Systems Are Walking a Financial Tightrope

In the U.S., healthcare is a \$4 trillion business. Most hospitals and health systems, however, struggle with profitability, posting negative to low single-digit operating margins. Challenges include evolving payer and insurance mixes, increasing regulatory demands, and rising costs. These financial pressures strain health systems ability to effectively recruit and retain staff, provide high-quality care, and ensure patient satisfaction.

To combat the financial pressures, health systems *must optimize revenue recognition*. While health systems typically aim to keep A/R below 40 days, the reality is that for many, a large percentage of their A/R exceeds 90 days, significantly hurting cash flow and profitability.

By accurately billing for services rendered and ensuring timely payments, health systems can achieve smoother cash flow, enhanced financial stability, and increased profitability.

# Targeted Revenue Cycle Optimization Maximizes Financial Impact

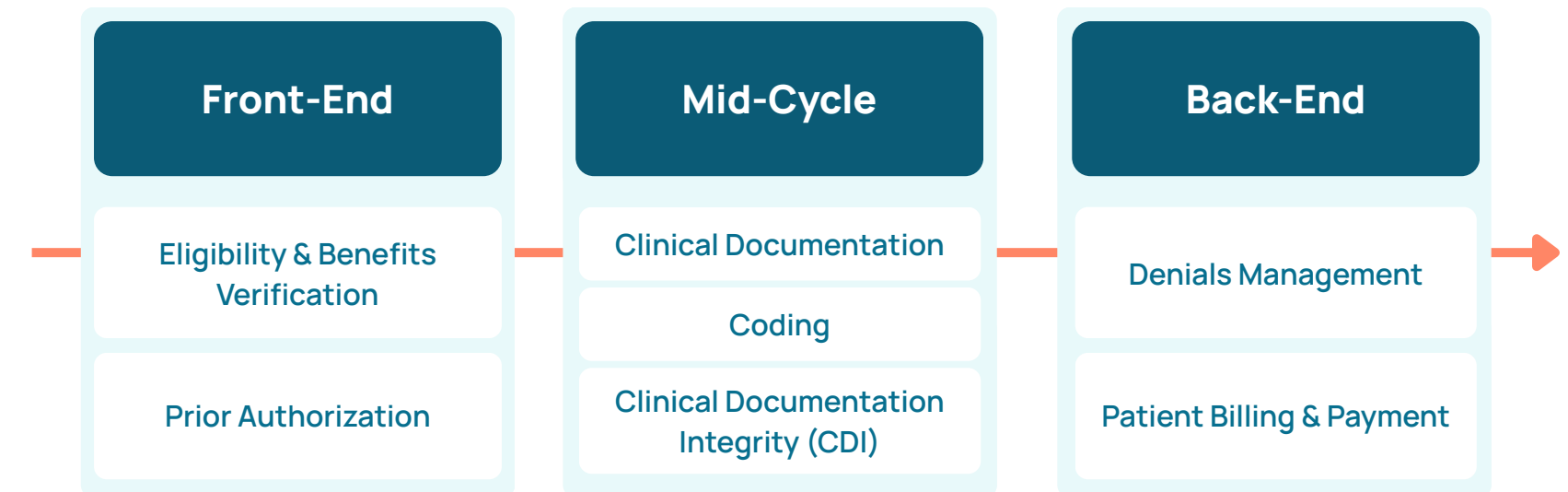
Optimizing revenue recognition requires streamlined revenue cycle management (RCM). The revenue cycle is a multifaceted process involving multiple interconnected steps, technologies, and internal teams, each responsible for managing specific aspects of the workflow. Each step in the revenue cycle process plays a role in revenue recognition and profitability:

Emerging technologies, especially GenAI, have resulted in new solutions for improving various stages of the revenue cycles. Some solutions such as scribing focus primarily on improving productivity, others, such as those related to coding and denial management primarily focus on maximizing revenue capture.

RCM leaders understand the importance of streamlining the revenue cycle, but often work in high-stress environments with limited budgets and personnel bandwidth.

So the *question is*, "where should health systems prioritize their efforts to improve RCM?" The answer: Automating Coding

## The Revenue Cycle Management Process



Coding plays a pivotal role and has an extensive impact on the efficiency and effectiveness of RCM –making it a natural starting point for optimizing RCM.



# Coding's Outsized Impact on RCM and Revenue Recognition

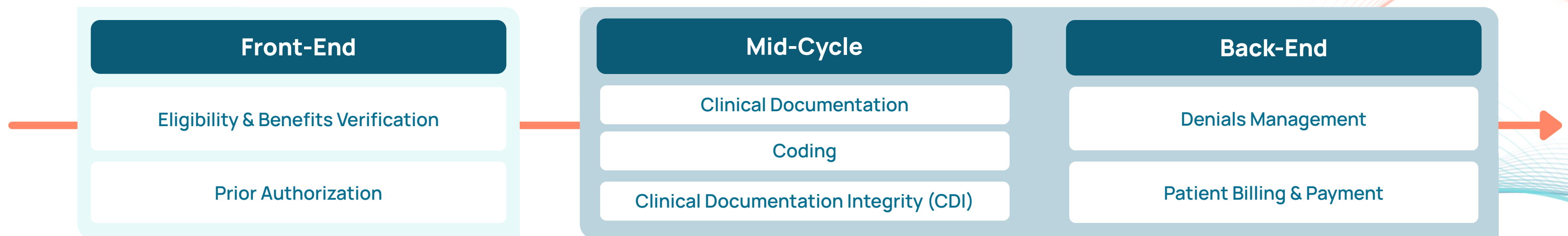
Coding—the process of translating a patient's medical history and treatment into a standardized set of alphanumeric codes—is at the *heart of revenue recognition*. These codes are the keys that unlock reimbursement from insurance providers and government programs, and are essential for tracking patient care, disease patterns, and treatment outcomes.

- When coding is done in a timely manner, claims are submitted promptly, helping reduce A/R days..
- When coding is accurate, claims are more likely to be approved the first time around, reducing denials.

Coding practices thus impact the mid-cycle and the back-end of the revenue cycle, especially 'denial management'. Reducing denials minimizes the need for claim resubmissions and follow-ups, thereby lowering costs and freeing up valuable time and resources.

Automating coding streamlines both the mid-cycle and the back-end of the revenue cycle

## The Revenue Cycle Management Process



# Current Coding Practices Are Costing More Than You Think

## 1 Coding inaccuracies and blind spots reduce revenue and increase denials

In ambulatory care and specialties with high volume and low \$ value per chart, *less than 30% of charts* are typically coded or reviewed by a professional coder. The rest of the charts are passed through to billing with only the physician's input. But physicians are not professional coders, and especially in complex specialties like primary care, they can produce suboptimal coding. This creates a blind spot in coding accuracy.

Industry data shows that coding inaccuracies, incorrect modifiers and missing or inaccurate claim data are among the top reasons for denials. This negatively impact revenue and profitability, and increases compliance risks.

## 2 Managing denials increases costs

Inaccurate coding leads to denials or requests for information which increases costs to health systems. Data shows that *nearly 15%* of all claims submitted are initially denied by payers. More than half of denied claims (51.7%) are eventually overturned and paid. But the process adds cost: hospitals and health systems that fight denials do so at an average cost of *about \$45 per claim*. Many denials are not appealed at all, resulting in health systems having to absorb the cost and write off the potential revenue.

## 3 Denials increase A/R days and negatively impact cash flow

Denials also delay payments. On an average, health systems need to conduct three rounds of reviews with insurers, with each review cycle taking between 45 and 60 days. They are often unable to get payments for up to *six months after delivering their services*. This extended cycle wreaks havoc on cash flow and accounts receivable performance.



# Current Coding Practices Are Costing More Than You Think

- 4 Coding requirements drain physician time and income potential**  
Coding is part of the administrative burden on physicians. Physicians spend an average of 15.5 hours per week on paperwork and administration. This 'pajama time' is often completed outside of normal hours and contributes to physician stress and burnout. Moreover, when the coding is inaccurate, it can result in physicians facing payment delays and even underpayment for services rendered.
- 5 Coding practices can create excessive burden on coders**  
Coders, especially in high-volume specialties such as ambulatory care, operate in a high-stress work environment owing to the volume of work and the frequent updates in guidelines. This workload means that coders are not working at the top of their license. In fact, a lot of their work is reactive and repetitive. The volume of work also limits their time and ability for professional development and upskilling.
- 6 Unclear coding undermines patient satisfaction**  
Ineffective coding can lead to patients receiving unclear or incorrect statements for the services they've received. This can result in billing disputes, delays in payment, and contribute to a negative patient experience.
- 7 Inaccurate coding creates compliance and reputational risks**  
When coding is inaccurate, it can lead to compliance issues including allegations of fraud and abuse. Persistent inaccuracies can raise red flags for insurance companies or regulatory bodies, leading to heightened scrutiny and more frequent audits. This increases costs, strains resources, and adds reputational risk for the health system.

# Addressing the Coding Challenge

The coding pitfalls outlined above are not new, and given their significant impact on revenue and compliance, RCM leaders have long been searching for ways to optimize coding and the revenue cycle.

Hiring more coders isn't a practical solution.

- Medical coders require specialized and ongoing training, and aren't interchangeable across specialties.
- Healthcare leaders report that among all the revenue cycle roles, medical coders are the most difficult to hire.
- In specialties that generate a high volume of charts with low-dollar values, the cost and scarcity of coders makes it inefficient for coders to review every chart, especially as the practice grows and chart volume increases.

Technology could help, but prior attempts at using technology, i.e. Computer-assisted coding (CAC), have been ineffective because of the limitations of technology itself.

- CAC provides suggested codes, but requires a coder to work on the charts. It hence does not reduce the coding backlog.
- CAC technologies cannot interpret free-flowing subjective text, severely limiting its ability to provide accurate coding suggestions.
- CAC coding recommendations are a black box, making it difficult to judge accuracy or provide an explanation in case of an audit or denial.

What has changed? Recent technological advances, especially in GenAI, have removed the limitations of the prior generation of tools.

Recent breakthroughs in GenAI have made it technologically feasible to automate coding, even from unstructured and ambiguous case notes.



# Automated Medical Coding: A Game Changer for Health Systems

**Autonomous medical coding** is a new category of solutions for optimizing medical coding. These GenAI powered platforms are proving to be a game changer, especially in high-volume specialties. Health systems can now code and bill the vast majority of charts without any human intervention, significantly increasing revenue and reducing coding backlogs and A/R days while ensuring coding accuracy compliance. Leading health systems are effectively leveraging autonomous medical coding to streamline their revenue cycle and improve profitability.

**Arintra**, the industry leading autonomous medical coding platform, combines the latest advances in GenAI with deep clinical knowledge, and works directly within customers' EHRs to automate medical coding. With Arintra, RCM teams free up coders from repetitive manual work to focus on higher level value added work, reduces burden on physicians and ensures compliance with clear explanations for every single coding decision. Customers using Arintra have achieved a 7% revenue uplift, while reducing A/R days by 12%, and decreasing denials by 43%.



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