The $84 million gap: The financial imperative of encounter data completeness

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Executive summary

Executive summary: The revenue leak you can't ignore

Medicaid managed care organizations (MCOs) are currently facing a silent financial crisis. While teams focus on clinical management, millions of dollars in rightful revenue are evaporating due to a clerical disconnect: incomplete encounter data.

The math is unforgiving. Analysis reveals that a single missing claim for a specialty medication can result in an annual revenue loss of $528,840 per member.

This white paper moves beyond compliance to address the financial reality of risk adjustment. We break down how the Chronic Illness and Disability Payment System (CDPS) punishes data gaps and provides an operational roadmap to capture the revenue your plan has already earned.

The financial hook: Why "good enough" data costs millions

- Hierarchy matters: CDPS counts only the highest-severity diagnosis in each disease group. Missing a serious condition like congestive heart failure can cost $4,020 annually per member compared to capturing only hypertension
- Pharmacy drives outsized impact: Specialty pharmacy categories such as MRx13 (rare disease) and MRx19 (hemophilia) carry extreme weights. A single missing claim can result in $528,840 annual loss per member
- Small gaps scale to big losses: Even 2% incompleteness across the top 5% high-acuity members in a 100,000-member plan can create $84 million annual underpayment

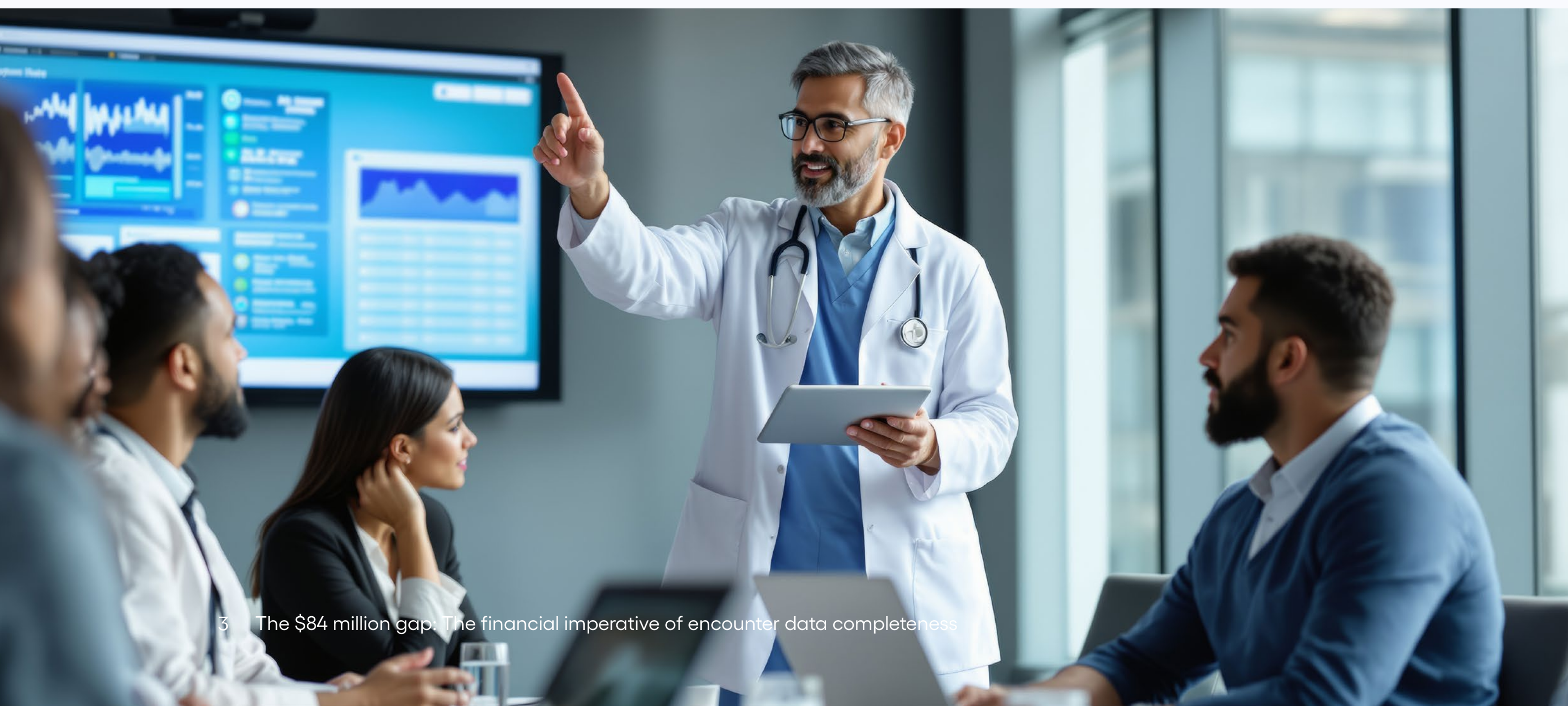
Beyond financial risk, incomplete data undermines compliance, care planning and equity in funding for high-acuity populations.

The solution is operational, not theoretical:

- Treat encounter data quality as a core business function, not just a compliance task
- Implement systematic validation for ICD-10 codes, NDCs, NPIs and service dates
- Close data-flow gaps with sub-capitated vendors, especially specialty pharmacy and behavioral health
- Educate providers on hierarchy rules to capture the highest-severity diagnoses

Plans that adopt these practices achieve 15%–25% higher risk score accuracy, translating into millions in recovered revenue and better alignment of funding with member needs.

> **Bottom line:** Payments follow documented acuity. Complete and accurate encounter data ensures risk scores reflect reality—unlocking rightful funding and enabling sustainable care delivery.



1. Overview

Medicaid health plans are paid a per member per month (PMPM) amount. That amount moves up or down based on how sick or complex each member is—the risk score tells the payment system what funding a plan needs to care for its population. Where do risk scores come from? Encounter data—the diagnosis and pharmacy claims that plans submit. If important encounters are missing, invalid or incomplete, risk scores go down. Payments go down in lockstep. This paper explains, in straightforward terms, why complete encounter data matters, how missing pieces cause revenue leaks and what to do about it.

2. Problem statement

Two recurring issues drive avoidable underpayment:

- Missed higher severity diagnoses due to coding or submission gaps. In the CDPS model, only the single highest severity category in a disease group counts. If the most serious diagnosis is not captured on the encounter, the plan loses the entire value of that category. No partial credit
- Missing specialty pharmacy encounters—often through sub capitated vendor arrangements—meaning ultra high value pharmacy categories never get assigned. A single missing specialty pharmacy claim can cost about $528,840 per member per year

At scale, even small, persistent gaps add up to tens of millions in annual underpayment for a typical plan

3. A simple primer: How risk adjusted payments work

Think of payment as a simple formula:

Payment (PMPM) = Base rate × Risk score
(Base rate depends on population segment; the risk score reflects documented conditions and medications.)

Base rates vary by segment (e.g., children, adults, seniors/persons with disabilities, dual eligible). Every 0.1 change in a risk score moves payment by roughly $50–$250 PMPM, depending on the base rate cell—$600–$3,000 a year per member. This is why even small shifts in average risk score matter materially at plan scale.

4. How encounter data becomes a risk score (Five steps)

CDPS—the Chronic Illness and Disability Payment System—transforms encounter data into risk scores through a five step workflow:

1. **Data collection (encounters):** Plans submit diagnosis codes (ICD 10) and pharmacy NDCs over a measurement window
2. **Clinical categorization:** ICD 10 maps into disease categories; NDCs map into MRx pharmacy categories
3. **Hierarchical selection:** Within a disease group, only the highest severity category counts (the hierarchy replaces lower severities—no additive stacking)
4. **Weight application:** Demographic weights plus disease/pharmacy category weights are **summed** to get the member's risk score
5. **Payment (budget neutral):** Scores distribute dollars across plans while keeping total program spend budget neutral

Key implication: If an encounter fails to record the category triggering diagnosis or pharmacy detail, the weight never gets applied, the risk score is understated and the payment drops accordingly

5. Where the story breaks: Hierarchy and missed diagnoses

A member's care story might include multiple cardiovascular diagnoses—say, hypertension and congestive heart failure (CHF). If the encounter only captures hypertension (weight 0.06) on a $500 base rate, the payment is $30 PMPM. But if it properly captures CHF (weight 0.73), payment jumps to $365 PMPM—that's $335 more per month or $4,020 per year for one member. The lower category doesn't add; the higher category replaces it in the hierarchy. Missing the higher severity diagnosis erases its full value.

This hierarchy rule is a central reason why coding completeness for the most severe diagnosis matters so much in Medicaid risk adjustment.

6. The pharmacy plot twist: One missing claim, massive impact

The analysis shows pharmacy categories can outweigh even the most severe diagnoses. MRx13 (rare disease medications) and MRx19 (hemophilia pharmacy) carry very high weights. The consequence is jaw dropping: A single missing specialty pharmacy claim can lead to about $528,840 in annual payment loss per member—more value than most any combination of diagnosis codes.

Why are pharmacy claims missed? Often, sub capitated vendor arrangements or carved out benefits break the data flow, or invalid NDCs block mapping into MRx categories. Timing misalignments (claim submission vs. fill dates) can also cause the category to miss the measurement window.

7. From one member to many: Population level losses

When small errors repeat across many members, the losses compound:

- **Scenario (high acuity group):** In a 100,000 member plan, if 2% of encounters are missing across the top 5% highest acuity members, the model shows $84 million in annual underpayment
- **Scenario (specialty pharmacy):** If 60% of pharmacy encounters are missing among 1,000 members (base rate $500 PMPM), the annual gap can be $33 million. Diagnosis only data cannot capture the severity that specialty medications represent
- **Scenario (behavioral health):** Sub capitated BH submissions at 60% can create $11.52 million in annual loss across 15,000 members (base $400 PMPM)
- **Scenario (coding quality):** Incomplete diagnosis fields for 3,000 members (avg. missed weight 0.8, base $500 PMPM) lead to $14.4 million in annual loss

For context, the analysis also notes typical MCO margins can be thin, so these losses directly threaten financial viability.

8. Where gaps typically happen (Field by field)

Primary diagnosis codes (ICD 10):

- **Issue:** Invalid, truncated or unspecified codes → encounter accepted but excluded from risk calculation
- **Impact:** Roughly $150–$400 PMPM per affected member, depending on missed category weight and base rate

Pharmacy NDC (11 digit):

- **Issue:** Missing/invalid NDC → cannot map to MRx; timing misalignment
- **Impact:** From $100–$40,000 PMPM depending on medication class; up to ~$528,840 annually for rare disease/hemophilia pharmacy

Provider NPI:

- **Issue:** Missing/invalid NPIs trigger rejections in many state systems
- **Illustrative impact:** If 10% encounters rejected due to NPI errors across 100,000 members, at base $500 PMPM and 0.3 score understatement, annual loss ~$18 million

Service dates:

- **Issue:** Invalid dates prevent correct period attribution
- **Illustrative impact:** For 4,000 members, missed weight ~0.5, base $500 PMPM → annual loss ~$12 million

9. A practical path forward (Execution roadmap)

This roadmap stays within the operational guidance in your sources while telling a simple story for teams:

Phase 1—See the whole picture (Weeks 1–4)

- Inventory submission paths: In network providers, sub capitated BH and specialty pharmacy, carved outs
- Baseline completeness by encounter type; identify rejection drivers (NPI, dates, code validity)

Phase 2—Fix the biggest levers (Weeks 5–10)

- Priority 1: Specialty pharmacy data flow—ensure NDC validity and measurement window alignment; patch vendor transmission breaks
- Priority 2: Hierarchy critical diagnoses—provider education + coding audits to capture higher severity categories (e.g., CHF vs. hypertension)

Phase 3—Lock in field level quality (Weeks 11–16)

- Automate checks for ICD 10 specificity, 11 digit NDC, active NPI, logical service dates
- Align resubmissions to the risk score measurement period

Phase 4—Monitor, measure and iterate (Ongoing)

- Track average risk score, rejection rates and pharmacy MRx mapping rates by vendor/source
- Treat encounter data as a core business function with accountability at the C suite level

10. What good looks like (Operating practices)

Plans that strengthen data completeness and accuracy (diagnosis + pharmacy) see ~15%–25% higher risk score accuracy—which translates to millions in recovered capitation tied to documented acuity. What does that look like day to day?

- Comprehensive validation prior to submission (codes, NPIs, dates)
- Provider coding education on hierarchy rules (capture highest severity)
- Systematic gap identification for sub capitated vendors (BH, specialty pharmacy)
- NDC accuracy (11 digit, active on fill date) with automated checks
- Timing discipline so encounters land in the measurement window for risk scoring

11. Roles and responsibilities (Who does what?)

- **Executive sponsors/C suite:** Own encounter quality as a financial lever; set targets; ensure cross vendor accountability
- **Data quality and submission teams:** Automate validations; monitor rejections; correct and resubmit promptly
- **Provider network and coding education:** Train on hierarchy implications; audit documentation; prioritize high severity conditions
- **Pharmacy and vendor management:** Close transmission gaps; enforce NDC rules; reconcile fills vs. claims for MRx mapping
- **Behavioral health program leads:** Ensure BH encounters meet submission standards despite sub capitation

12. Plain language checklist

- Capture the most serious diagnosis in each disease group—the model only counts one highest-severity
- Don't miss specialty pharmacy (MRx13/MRx19 carry outsized value)
- Validate NDCs (11 digit, active), NPIs and service dates
- Fix vendor breaks (sub capitated BH and specialty pharmacy)
- Align timing so encounters count in the measurement period

13. Frequently asked questions

Q1: Is encounter data a compliance task?

A: No. It is the direct input to risk scores, which determine payment. Missing data lowers risk scores and lowers revenue—proportionally.

Q2: Why does one pharmacy claim matter so much?

A: Certain MRx categories (e.g., rare disease and hemophilia) have extremely high weights. Missing them can remove hundreds of thousands of dollars per member per year.

Q3: If we capture "most" encounters, is that enough?

A: Not necessarily. Even 2% incompleteness in the highest acuity cohort can create $84 million annual loss in a 100,000 member plan. Specialty pharmacy gaps are especially costly.

Q4: What's the quickest path to improvement?

A: Fix sub capitated specialty pharmacy flows, validate core fields (ICD 10, NDC, NPI, dates) and educate providers on capturing highest-severity diagnoses

14. Conclusion

Payments follow documented acuity. When encounters and pharmacy claims are complete and accurate—especially for high severity diagnoses and specialty medications—risk scores reflect real member need, and plans receive the rightful funding to serve high acuity populations. Treating encounter data as a core business function turns completeness into a reliable revenue lever that produces immediate, measurable impact.

15. References

- Financial Impact – Encounter Risk Score.pdf (hierarchy example, MRx impact, C suite imperative, figures)
- The Financial Impact of Encounter Data Completeness on Medicaid Risk Adjusted Capitation.docx (CDPS steps, category weights, population level scenarios, field level impacts, recommended practices)

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