Combat Denials with Machine Intelligence

Erica Franko

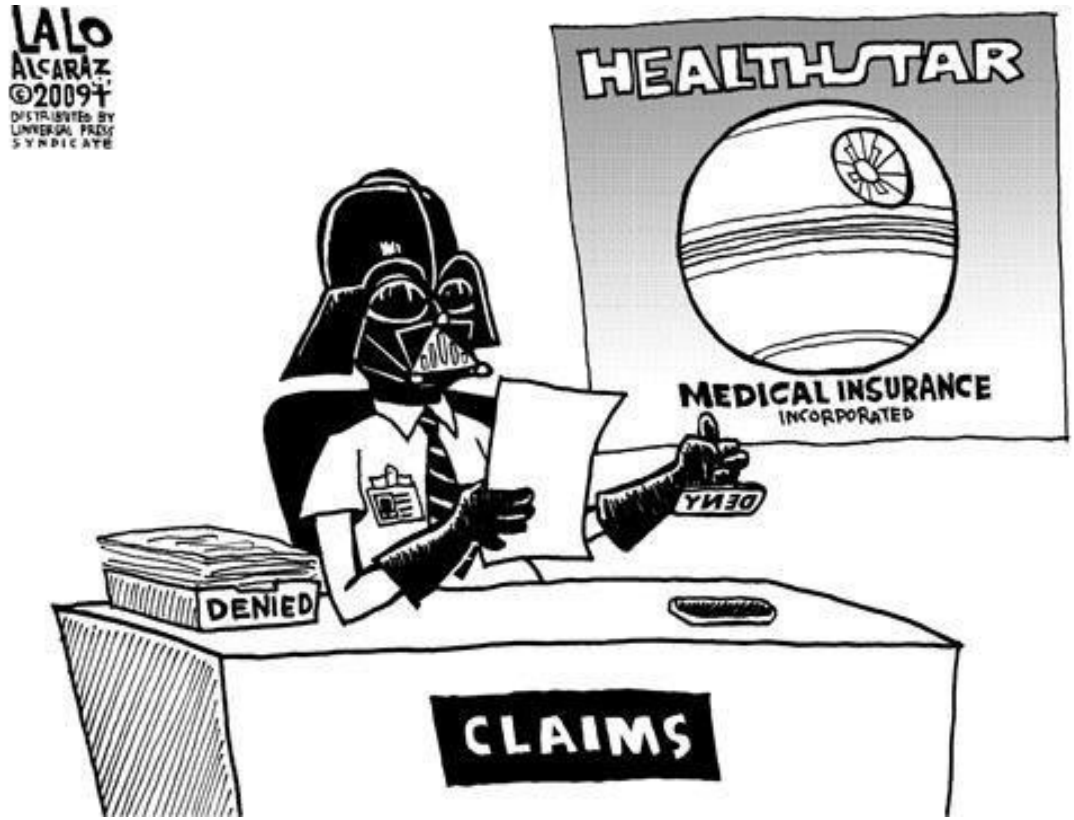
Senior Vice President and Managing Director,
Advisory Services
nThrive

HIMSS
CENTRAL & SOUTHERN OHIO *Chapter*

Agenda

- Align on Terminology
- Cost of Denials and Increasing Risks
- Managing Denials
- Rejection Prevention
- How Machine Learning and AI can help

The REAL Industry Overview and Market Trends



Denials Defined

- The refusal of an insurance company or carrier to honor a request by an individual (or his or her provider) to pay for health care services obtained from a health care professional https://www.healthinsurance.org/

- Any intentional reduction of payment resulting from the failure to provide medically necessary services in an appropriate setting, failure to follow the payers' technical guidelines, or failure to consistently document for the services provided. (HFMA)

Were you paid what was owed?

Vocabulary of Denials Management

Limiting Denials

Charge Capture

Conservative Billing Practices

Untimely Billing

Incomplete Accounts

Technical

Administrative Errors

Missing or Invalid Authorizations

Coordination of Benefit/Eligibility Issues

Under/Over Payment

Contractual Difference

Pricing Errors

Clinical

Medical Necessity

Level of Care

Vocabulary of Denials Management

Final Denial

Write Off

Lost Revenue

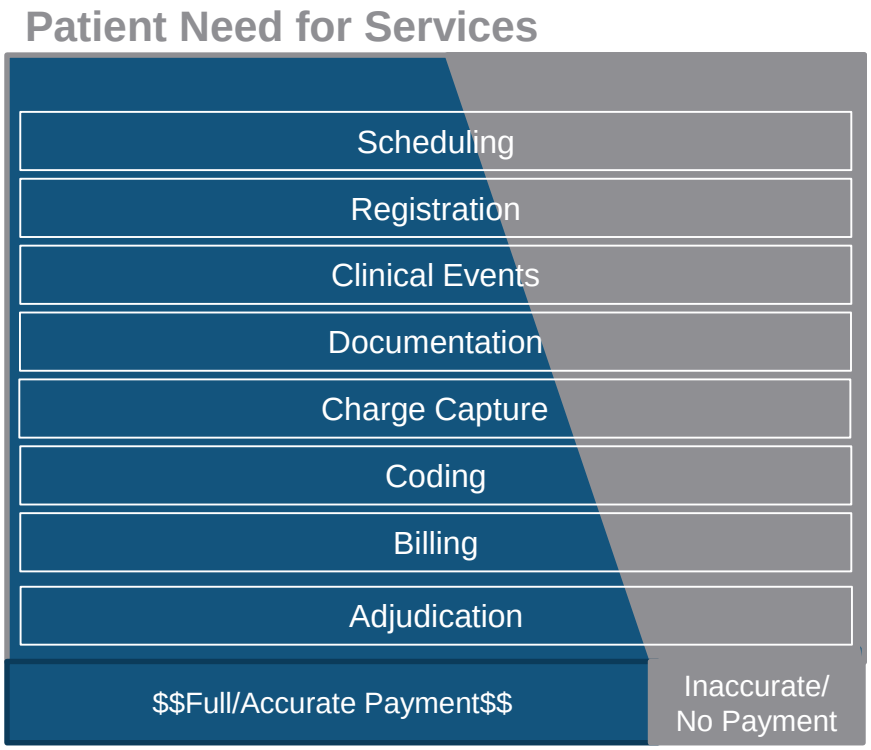
OR

Initial Denial

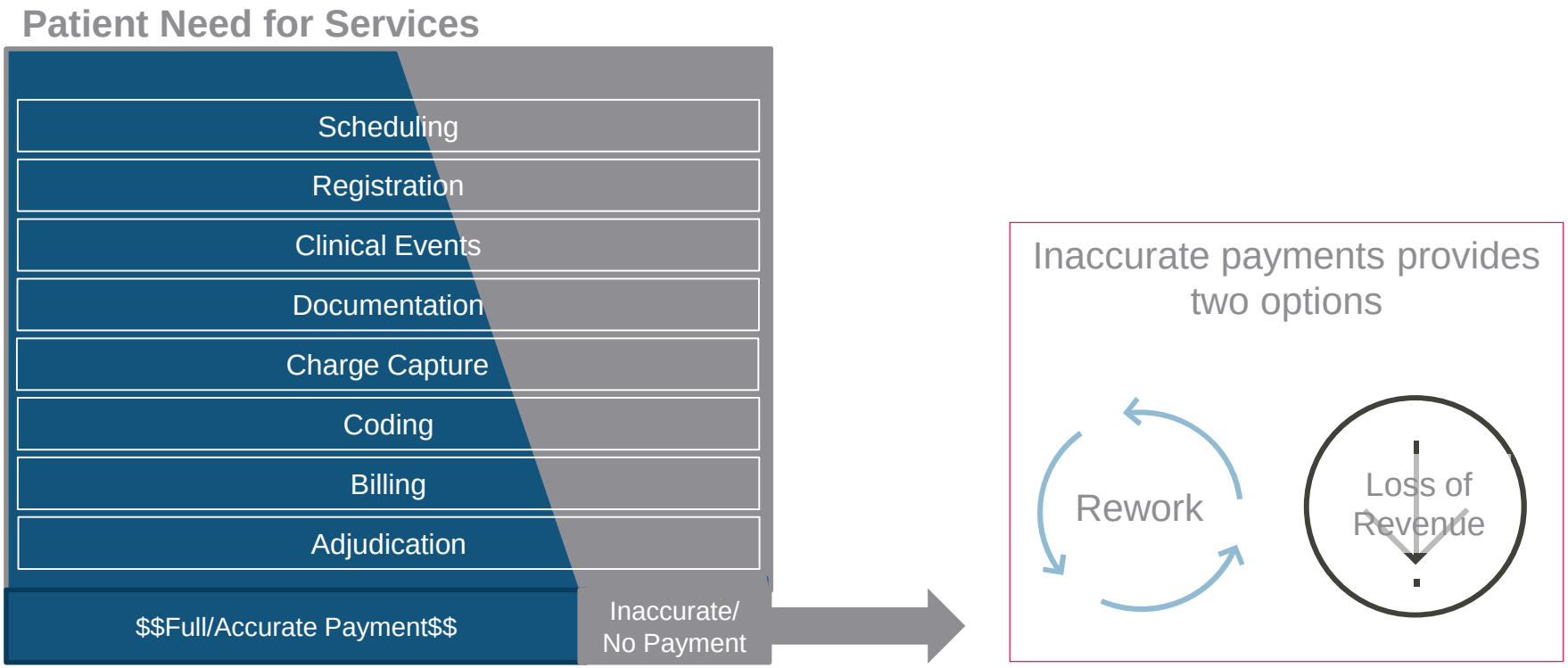
Delay in Cash

Both increase aged AR *and* typically require appeal or additional work

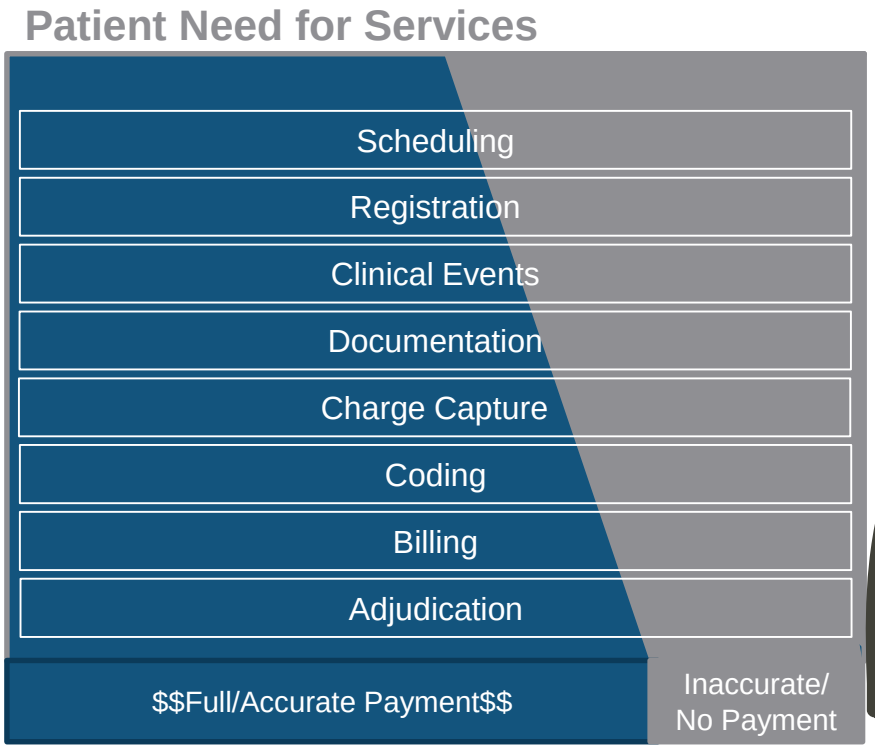
Cost of Denials: Revenue Cycle Funnel



Revenue Cycle Funnel



Revenue Cycle Funnel



Cost of Rework

- Rework costs average of $25 per claim[1]
- Success rates vary from 55 to 98 percent[2]
- Rework adds least14 days to the average number of days to pay[3]

- 1 (Leveraging Data in Healthcare: Best Practices for Controlling, Analyzing, and Using Data, by Rebecca Mendoza Saltiel Busch, CRC Press, 2016, ISBN-13: 978-1-4987-5773-7)
- 2 (Leveraging Data in Healthcare: Best Practices for Controlling, Analyzing, and Using Data, by Rebecca Mendoza Saltiel Busch, CRC Press, 2016, ISBN-13: 978-1-4987-5773-7)
- 3 (https://revcycleintelligence.com/news/overcoming-the-top-challenges-of-claims-denial-management-audits)

Impact of Denials Issue Extends Beyond Financial Results

Industry average denial rate between **5-10%**

31%

of hospitals manage denials manually

> $262 billion denied,

averaging almost **$5 million** per hospital

The MGMA found only **35%** of providers appeal denied claim

in the next **7-12 months**

HIMSS CENTRAL & SOUTHERN OHIO *Chapter*

Denials Management

"I GAVE IT A HEALTHY DOSE OF DENIAL, BUT IT DIDN'T HELP."

Revenue Cycle Opportunities for Denial Management

Scheduling

- Eligibility/Member Cannot Be Identified
- Benefit plan coverage
- Benefit maximums exceeded
- Experimental procedure
- Authorization
- Pre-existing condition
- Medical necessity
- Credentialing

Access

- Benefit plan coverage
- Benefit maximums exceeded
- Coordination of benefits
- Eligibility
- Experimental procedure
- Authorization
- Pre-existing condition
- Medical necessity
- Documentation

Patient Care

- Medical necessity
- Authorization
- Experimental procedure
- Documentation

HIM, Charge Capture

- Documentation
- Medical necessity
- Experimental procedure
- Authorization
- Benefit plan coverage
- Coding (Missing or Wrong Modifiers)

Billing / Collection

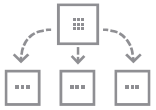
- Bundling
- Coding
- Demographic mismatch
- Documentation
- Eligibility
- Authorization
- Pre-existing conditions
- Timely filing
- Coordination of benefits
- Duplicate Denials

Denials are Difficult to Manage

Resource and expertise intensive

Perceived inability to capture the denial data

Challenging appeals process



Denial information provided by payers not standardized

Constantly changing information

Requires coordination throughout the organization

Measure in Pairs and Overtime

HFMA MAP Keys

- Initial Denial Rate: Zero Pay
- Initial Denial Rate: Partial Pay
- Denials overturned by appeal
- Denial Write-offs as a percent of net revenue

Report and Trend

- Total
- By Payer
- By Service Line
- By Reason
- By Diagnosis or DRG (Clinical)

Clean Claim Rate & Denials
AR Aging **& Denial Write-offs**

What is the Initial Denial Rate?

Write-off review alone does not answer the important operational questions?

PAYER	TOTAL VOLUME		DENIAL RATE(PRE-APPEAL)			
	DAYS	AMOUNT	DAYS	AMOUNT	RATE(DAYS)	RATE($)
Payor names	9,088	$ 16,805,114	161	$ 567,619	1.77%	3.38%
	2,024	$ 4,567,881	303	$ 467,518	14.97%	10.23%
	1,483	$ 2,489,455	232	$ 313,364	15.64%	12.59%
	4,551	$ 10,277,406	55	$ 289,075	1.21%	2.81%
	274	$ 550,411	37	$ 71,224	13.50%	12.94%
	2,153	$ 3,939,606	19	$ 71,044	0.88%	1.80%
	2715	$ 5,989,935	8	$ 57,701	0.29%	0.96%
	18	$ 57,145	3	$ 51,334	16.67%	89.83%
	13	$ 45,416	5	$ 28,248	38.46%	62.20%
	1,940	$ 3,687,039	16	$ 23,968	0.82%	0.65%
	1,544	$ 4,776,871	4	$ 14,052	0.26%	0.29%
	19	$ 19,294	2	$ 9,480	10.53%	49.13%
	367	$ 1,047,392	3	$ 8,246	0.82%	0.79%
	560	$ 1,791,163	2	$ 7,922	0.36%	0.44%
	3	$ 5,523	3	$ 5,523	100.00%	100.00%
	3,173	$ 5,768,908	4	$ 8,012	0.13%	0.14%
TOTAL	29,925	$ 61,818,559	857	$ 1,994,330	2.86%	3.23%

DAYS & AMOUNT
BASELINE : DISCHARGE DATE

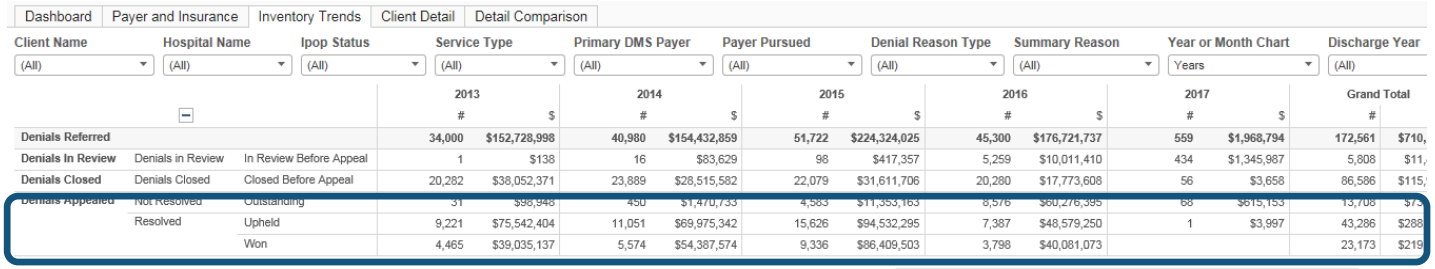
PATIENT TYPE(S) INCLUDED : INPATIENT
PAYER(S) EXCLUDED : SELF PAY, CHARITY CARE, MEDICARE, MEDICAID, OTHER - CHARITY CARE, OTHER - SELF PAY
DISCHARGE DATES: 1/1/2016-2/29/2016

DENIAL RATE(PRE-APPEAL)			
DAYS	AMOUNT	RATE(DAYS)	RATE($)
161	$ 567,619	1.77%	3.38%
303	$ 467,518	14.97%	10.23%
232	$ 313,364	15.64%	12.59%
55	$ 289,075	1.21%	2.81%
37	$ 71,224	13.50%	12.94%
19	$ 71,044	0.88%	1.80%
8	$ 57,701	0.29%	0.96%
3	$ 51,334	16.67%	89.83%
5	$ 28,248	38.46%	62.20%
16	$ 23,968	0.82%	0.65%
4	$ 14,052	0.26%	0.29%
2	$ 9,480	10.53%	49.13%
3	$ 8,246	0.82%	0.79%
2	$ 7,922	0.36%	0.44%
3	$ 5,523	100.00%	100.00%
4	$ 8,012	0.13%	0.14%
857	**$ 1,994,330**	**2.86%**	**3.23%**

Measure denials in **volumes** and **dollars**

HIMSS CENTRAL & SOUTHERN OHIO *Chapter*

What is the Rate of Appeal?



Dashboard | Payer and Insurance | Inventory Trends | Client Detail | Detail Comparison

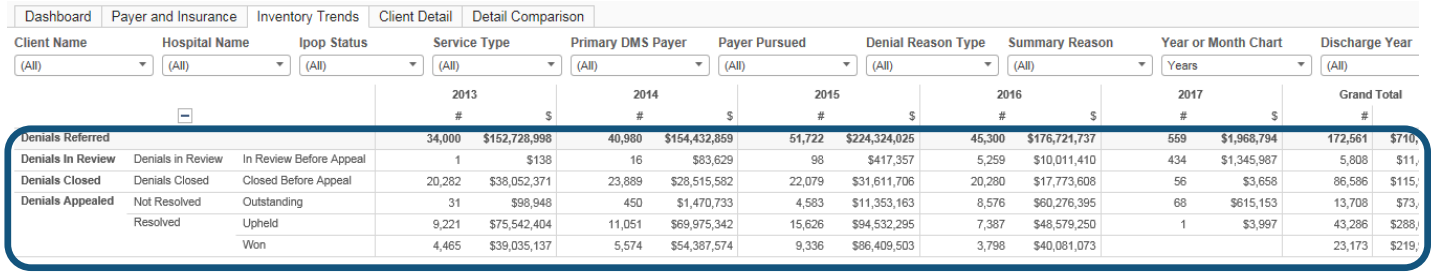
Client Name	Hospital Name	Ipop Status	Service Type	Primary DMS Payer	Payer Pursued	Denial Reason Type	Summary Reason	Year or Month Chart	Discharge Year
(All)	(All)	(All)	(All)	(All)	(All)	(All)	(All)	Years	(All)

			2013		2014		2015		2016		2017		Grand Total	
			#	$	#	$	#	$	#	$	#	$	#	
Denials Referred			**34,000**	**$152,728,998**	**40,980**	**$154,432,859**	**51,722**	**$224,324,025**	**45,300**	**$176,721,737**	**559**	**$1,968,794**	**172,561**	**$710,**
Denials In Review	Denials in Review	In Review Before Appeal	1	$138	16	$83,629	98	$417,357	5,259	$10,011,410	434	$1,345,987	5,808	$11,
Denials Closed	Denials Closed	Closed Before Appeal	20,282	$38,052,371	23,889	$28,515,582	22,079	$31,611,706	20,280	$17,773,608	56	$3,658	86,586	$115,
Denials Appealed	Not Resolved	Outstanding	31	$98,948	450	$1,470,733	4,583	$11,353,163	8,576	$60,276,395	68	$615,153	13,708	$7
	Resolved	Upheld	9,221	$75,542,404	11,051	$69,975,342	15,626	$94,532,295	7,387	$48,579,250	1	$3,997	43,286	$288
		Won	4,465	$39,035,137	5,574	$54,387,574	9,336	$86,409,503	3,798	$40,081,073			23,173	$219

Find the overturn **sweet spot**

Upheld	42,386	$288,633,288
Won	23,173	$219,799,726
Total	65,559	$508,433,014
Overturn Rate	35%	43%

How Effective are the Appeals?


Dashboard | Payer and Insurance | Inventory Trends | Client Detail | Detail Comparison

Client Name	Hospital Name	Ipop Status	Service Type	Primary DMS Payer	Payer Pursued	Denial Reason Type	Summary Reason	Year or Month Chart	Discharge Year
(All)	(All)	(All)	(All)	(All)	(All)	(All)	(All)	Years	(All)

			2013		2014		2015		2016		2017		Grand Total	
			#	$	#	$	#	$	#	$	#	$	#	
Denials Referred			34,000	$152,728,998	40,980	$154,432,859	51,722	$224,324,025	45,300	$176,721,737	559	$1,968,794	172,561	$710,
Denials In Review	Denials in Review	In Review Before Appeal	1	$138	16	$83,629	98	$417,357	5,259	$10,011,410	434	$1,345,987	5,808	$11,
Denials Closed	Denials Closed	Closed Before Appeal	20,282	$38,052,371	23,889	$28,515,582	22,079	$31,611,706	20,280	$17,773,608	56	$3,658	86,586	$115,
Denials Appealed	Not Resolved	Outstanding	31	$98,948	450	$1,470,733	4,583	$11,353,163	8,576	$60,276,395	68	$615,153	13,708	$73,
	Resolved	Upheld	9,221	$75,542,404	11,051	$69,975,342	15,626	$94,532,295	7,387	$48,579,250	1	$3,997	43,286	$288,
		Won	4,465	$39,035,137	5,574	$54,387,574	9,336	$86,409,503	3,798	$40,081,073			23,173	$219,

Are you appealing the **right** cases?

Are there cases that are **unappealable**?

What is the **lag time** from referral to submission?

			Grand Total	
Denials Referred			172,561	$710,543,657
Denials Appealed	Not Resolved	Outstanding	13,708	$73,814,392
	Resolved	Upheld	43,286	$288,633,288
		Won	23,173	$219,799,726

What is the Cost to Recover?

Appeals are the most **expensive** and **lengthiest** way to collect what is rightfully owed

Prevention is a better way

Denial Prevention

Denials are not addressable without understanding root cause

Managers and analysts need timely and actionable data

Visibility and partnership is needed across the revenue cycle and organization

A Comprehensive **denial prevention** strategy is required for long term success

Replace text box with chapter logo

Normalize Data to Make it Meaningful

N64 – claim information is inconsistent with pre-certified/ authorized services

!

No authorization?
Review root cause and address scheduling and access?

Bundling?
Service is not separately reimbursable, review for possible billing edit?

Service outside of authorization?
Review with treatment team to identify whether additional services were performed and why?

Not a denial?
Notification from payor about known reimbursement policy?

ANSI Codes are a result; they **do not** tell you **why** and **what** needs to be corrected

Comprehensive **Payor Contracting** strategy

Scorecards

- Denial trends
- Overturn rates

Payor Websites and Notifications

- Access to updated policies and procedures

Professional Groups

- Local chapters are a great source of information

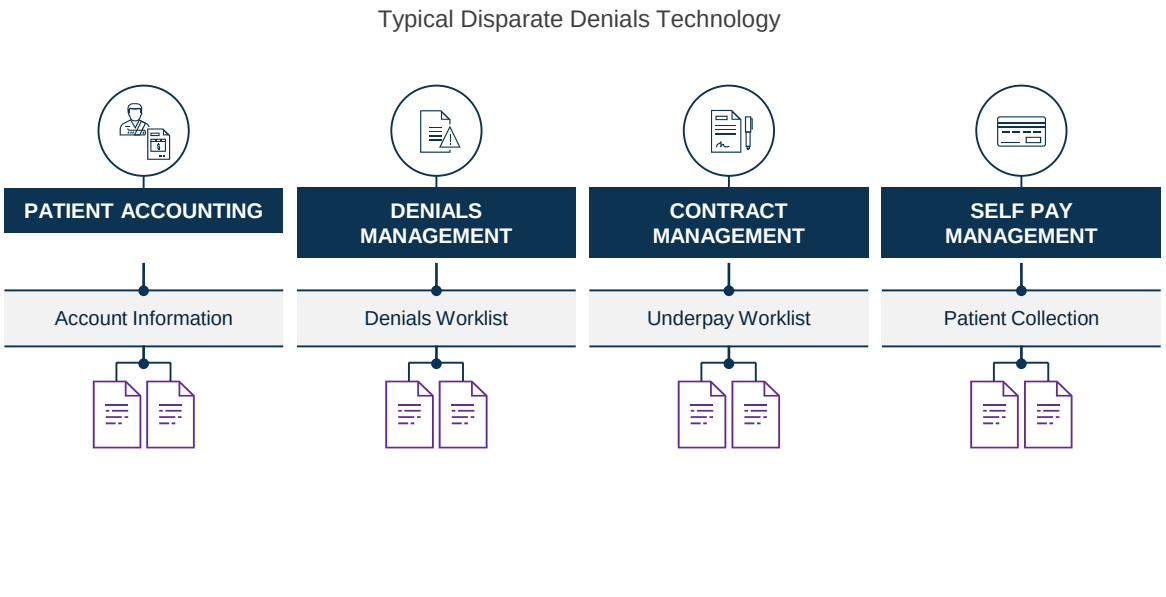
Work with Payor Contracting Team

- Build protection into contracts
- Financial impact of policy changes

Payor Relations

- Your representative needs to be part of your team

Connect Disparate Systems and Processes and Leverage Technology



- Multiple disjointed IT Systems
- Inability to accurately identify denial root cause
- Inefficiencies routing accounts to the appropriate team

Create Governance, Ownership, and Accountability

Denials avoidance requires significant effort across the revenue cycle.

While two-thirds of denials are recoverable, **90% of denials are preventable.**

Without sustainable process improvement, technology and analytics alone will only provide a fraction of the possible results hospitals can achieve.

Committee/Task Force

Representation

- Revenue Integrity
- Managed Care/Contracting
- Care Coordination (UM/UR)
- Billing
- Coding
- Patient Access
- IT

Payor Feedback/Partnerships

Organizational Support

Management is Required; Denial Prevention is Key

- The goal is to move away from **working denials** to systemically preventing them
  - Beyond Bill Scrubbers and PAS Edits

- Recognize that eliminating 100 percent of denials is not possible
  - Continually improve and drive down top reasons
  - Small improvements can drive large financial results
  - Leverage technology to solve high volume low dollar issues

- Proactive vs. reactive
  - Denial Task Force
  - Payor Engagement
  - Root Cause

Denials Prevention Throughout Revenue Cycle

Machine Learning Opportunities for Denials Prevention

Scheduling

- Benefit plan coverage
- Benefit maximums exceeded
- Eligibility
- Experimental procedure
- Authorization
- Pre-existing condition
- Medical necessity
- Credentialing

Access

- Benefit plan coverage
- Benefit maximums exceeded
- Coordination of benefits
- Eligibility
- Experimental procedure
- Authorization
- Pre-existing condition
- Medical necessity
- Documentation

Patient Care

- Medical necessity
- Authorization
- Experimental procedure
- Documentation

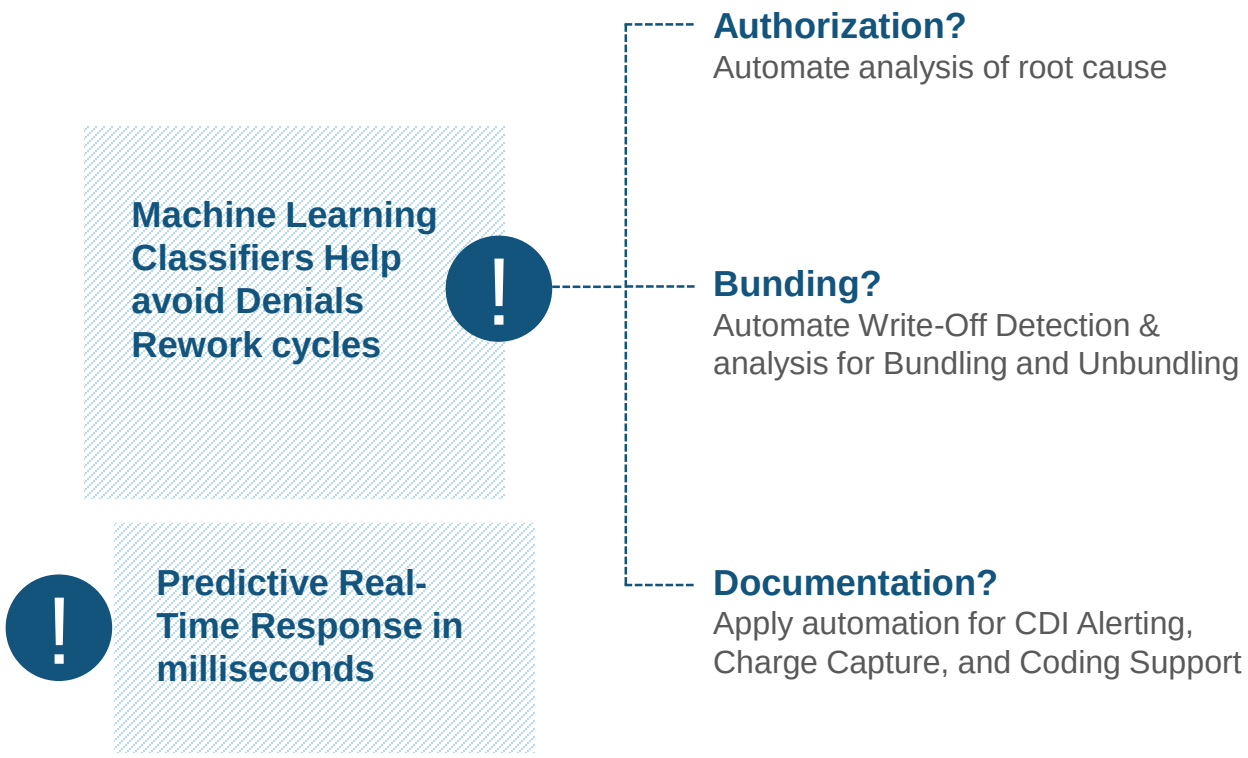
HIM, Charge Capture

- Documentation
- Medical necessity
- Experimental procedure
- Authorization
- Benefit plan coverage
- Coding

Billing / Collection

- Bundling
- Coding
- Demographic mismatch
- Documentation
- Eligibility
- Authorization
- Pre-existing conditions
- Timely filing
- Coordination of benefits

Productivity & Efficiency are Challenges with Denials

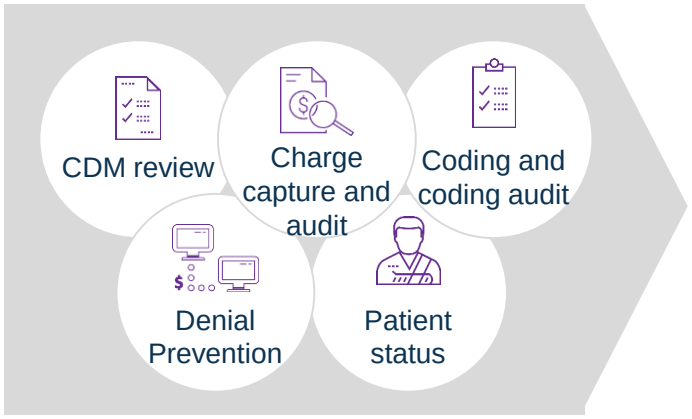


Machine Learning Coupled to Charge Capture Audit and Denials Prevention Supports Revenue Integrity

Revenue Integrity

Program to recognize the full value of every patient encounter

AI & Machine Learning Impact the Revenue Integrity Process with Efficiency and Accuracy Improvements



Machine Learning + Full-service revenue integrity

- Processes
- Policies
- Practices
- Staffing
- Contract content

From Patient-to-Payment,℠ nThrive empowers health care for every one in every community.®

Erica Franko, Senior Vice President and Managing Director, Advisory Services

efranko@nthrive.com