

**POPULATION  
HEALTH  
MANAGEMENT**

**2018  
MARKET TRENDS**



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Our team is united by a core belief that effective deployment and use of IT is essential to modernizing care delivery and ultimately improving the patient journey. We monitor trends and developments in the industry with a focus on those technologies that will be transformational to healthcare delivery.

We provide comprehensive, objective, high quality research for busy executives. It our way to help create a more informed, future-ready market of products and customers.

Work with us today – be ready for tomorrow.



# TODAY'S PRESENTERS



**BRIAN MURPHY**

Senior Analyst, Interoperability  
2°: Analytics, PHM



**MATT GULDIN**

Senior Analyst, Care Management  
2°: PHM, Convergence



**BRIAN EASTWOOD**

Analyst, Engagement  
2°: Care Management

# AGENDA

- What is Population Health Management (PHM) in 2018?
- Why is PHM important now?
- Who buys PHM solutions?
  - ▶ PHM Sub-market
- Technology domains for PHM
- Who makes PHM solutions in 2018?
  - ▶ PHM vendors by category
- Key takeaways



# WHAT IS POPULATION HEALTH MANAGEMENT

The proactive management of the health of a given population by a defined network of financially linked providers in partnership with community stakeholders (e.g., social workers, visiting nurses, hospice, patient, caregivers/family, etc.).

## BEDROCK ELEMENTS OF PHM PROGRAMS



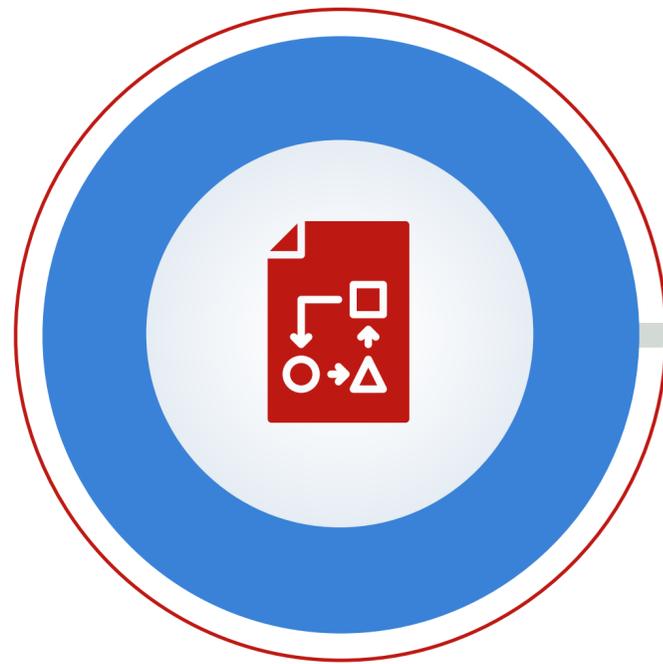
Providers focus on health of a population in addition to patient-level health

Providers, payers, and/or employers are joined by contract

Providers work with and are reliant on community-based resources

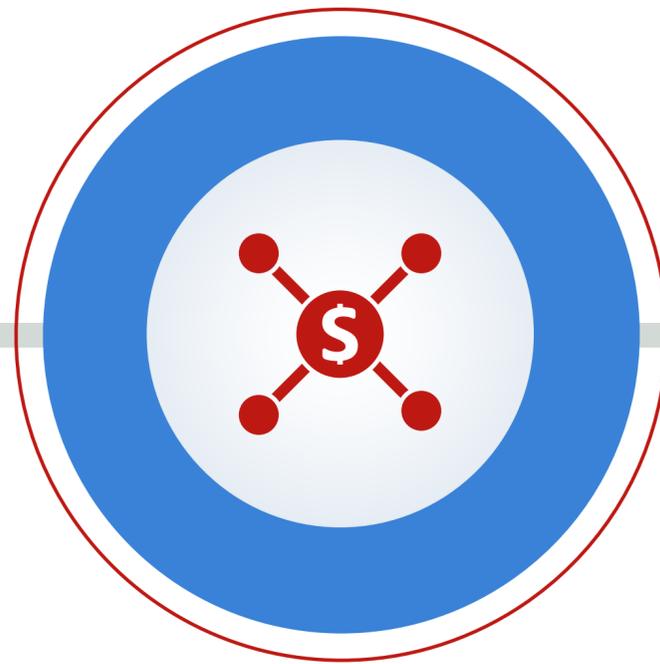
## POPULATION HEALTH MANAGEMENT IS A PROACTIVE TEAM EFFORT

# COMPONENTS OF A PHM PROGRAM



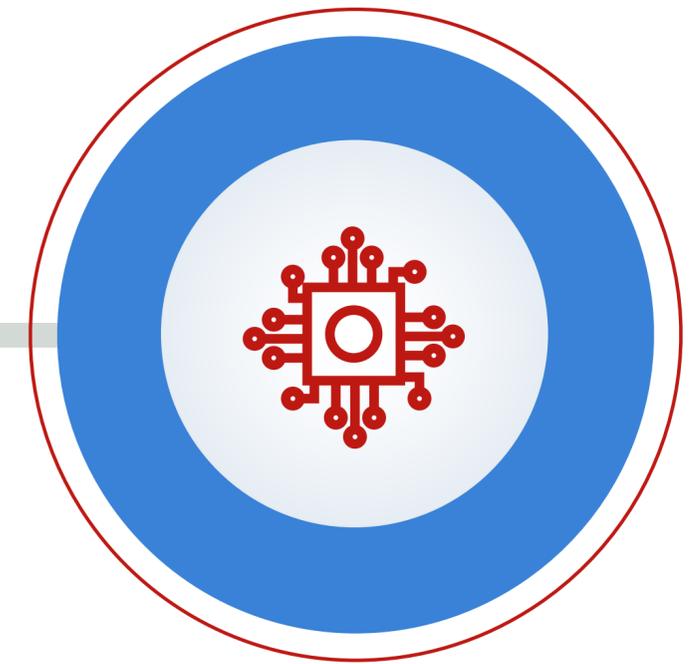
## STRATEGY AND BUSINESS PLAN

- Provider Network Design and Build
- Enterprise Design
- Legal and Compliance
- Vendor Management
- Network Operations



## FINANCIAL MANAGEMENT

- Network and Contract Modeling
- Incentive Modeling and Execution
- Performance Management
- Cost Management
- Reimbursement Management



## TECHNOLOGY

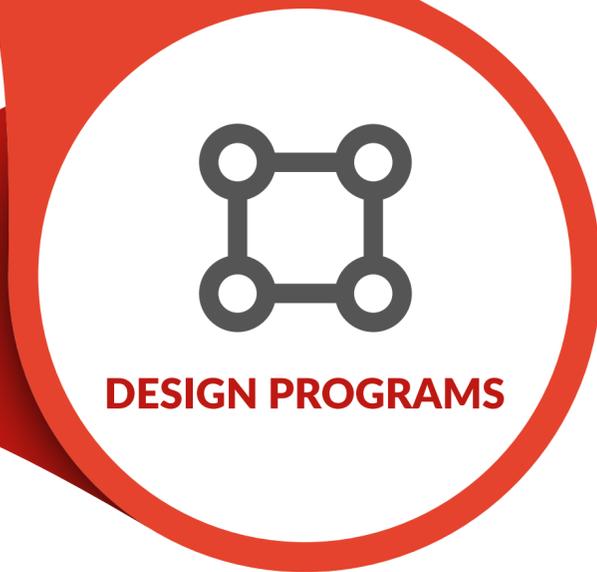
- Collaborative Health Record
- Clinical and Financial Analytics
- Care Management
- Patient Engagement
- Developer Support and Integration
- PHM Operational Tools

# PHM IN PRACTICE

- Measure clinical and financial results
- Adjust program



- Contract development
- Segment and stratify
- Set clinical and financial goals

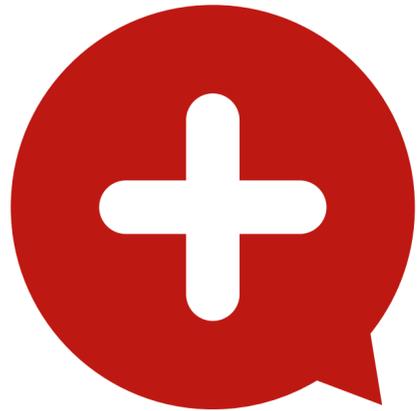


- Clinical interventions
- Administrative processes
- Define measures

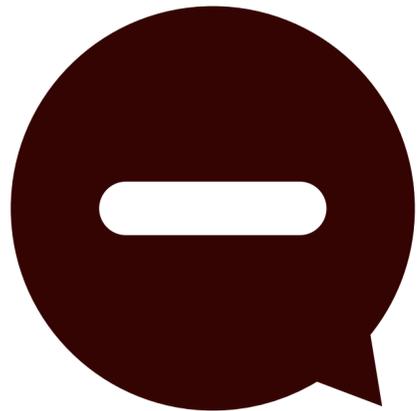
*Why Is PHM  
Important Now?*



# PHM DRIVERS AND INHIBITORS



- VBR is the plan for bending the cost curve
- Increasing clarity from Washington about VBR
- Private payer and employer commitment solidifying
- PHM taught in some med schools as standard of care



- FFS certainty
- Pressure on HCO CapEx and OpEx
- Demand for short term ROI from PHM
- Integrated data and functionality is hard
- Other priorities for IT
- New entrants from outside healthcare cause uncertainty

# *Who Buys PHM Solutions Today?*



# PHM SUB-MARKETS

## CAPTIVE AMBULATORY

## INDEPENDENT AMBULATORY

## PAYER-PROVIDER

### OWNERSHIP AND GOVERNANCE

HOSPITAL OR HEALTH SYSTEM OWNED AND CONTROLLED

PHYSICIAN OWNED

INDEPENDENT WITH PAYER "OWNERSHIP"

### MOTIVATION

PHM AS SERVICE PORTFOLIO ELEMENT

SEEKING POSITIVE ROI FROM PHM

PHM IS THE DESIRED FUTURE STATE

### SCALE OF EFFORT

MEDIUM TO LARGE SCALE

SMALL TO MEDIUM SCALE

SMALL TO LARGE SCALE

### AVAILABLE IT EXPERTISE

MODERATE

MINIMAL

MIXED

### IT INFRASTRUCTURE COMPLEXITY

MODERATE

HIGH

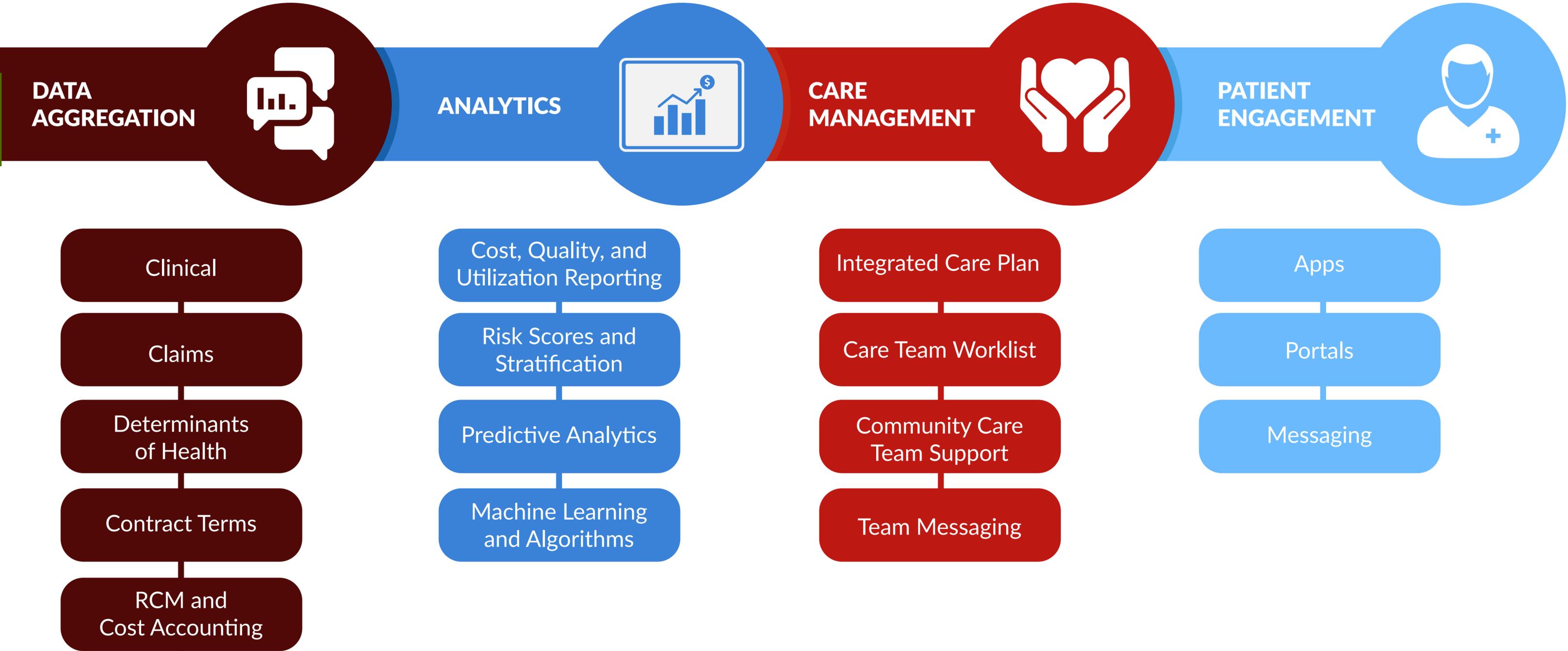
HIGH



# *PHM Technology Domains*



# TECHNOLOGY DOMAINS FOR PHM PROGRAMS



# PHM TECHNOLOGY MATURITY

TECH DOMAIN	CATEGORY	MATURITY LEVEL
DATA AGGREGATION	Data Sources	■ ■ □ □ □ 2
	Data Management and Operations	■ ■ □ □ □ 2
	Record Association and Linking	■ ■ □ □ □ 2
	Network Scope	■ □ □ □ □ 1
ANALYTICS	Population Discovery and Definition	■ ■ □ □ □ 2
	Benchmarking	■ □ □ □ □ 1
	Quality and Gaps	■ ■ □ □ □ 2
	Cost and Utilization	■ ■ ■ □ □ 3
	Risk	■ ■ □ □ □ 2
CARE MANAGEMENT	Care Plan Elements	■ □ □ □ □ 1
	Care Team Work List	■ □ □ □ □ 1
	Caregiver and Patient Communication	■ ■ □ □ □ 2
	Provider Communication	■ ■ □ □ □ 2
	Notifications and Alerts	■ □ □ □ □ 1
	Cross-organizational Transactions and Transition Support	■ □ □ □ □ 1
PATIENT ENGAGEMENT	Analyst and Developer Support	■ □ □ □ □ 1
	Caregiver and Patient Communication	■ ■ □ □ □ 2
	User Access	■ ■ □ □ □ 2

# DATA AGGREGATION FOR PHM

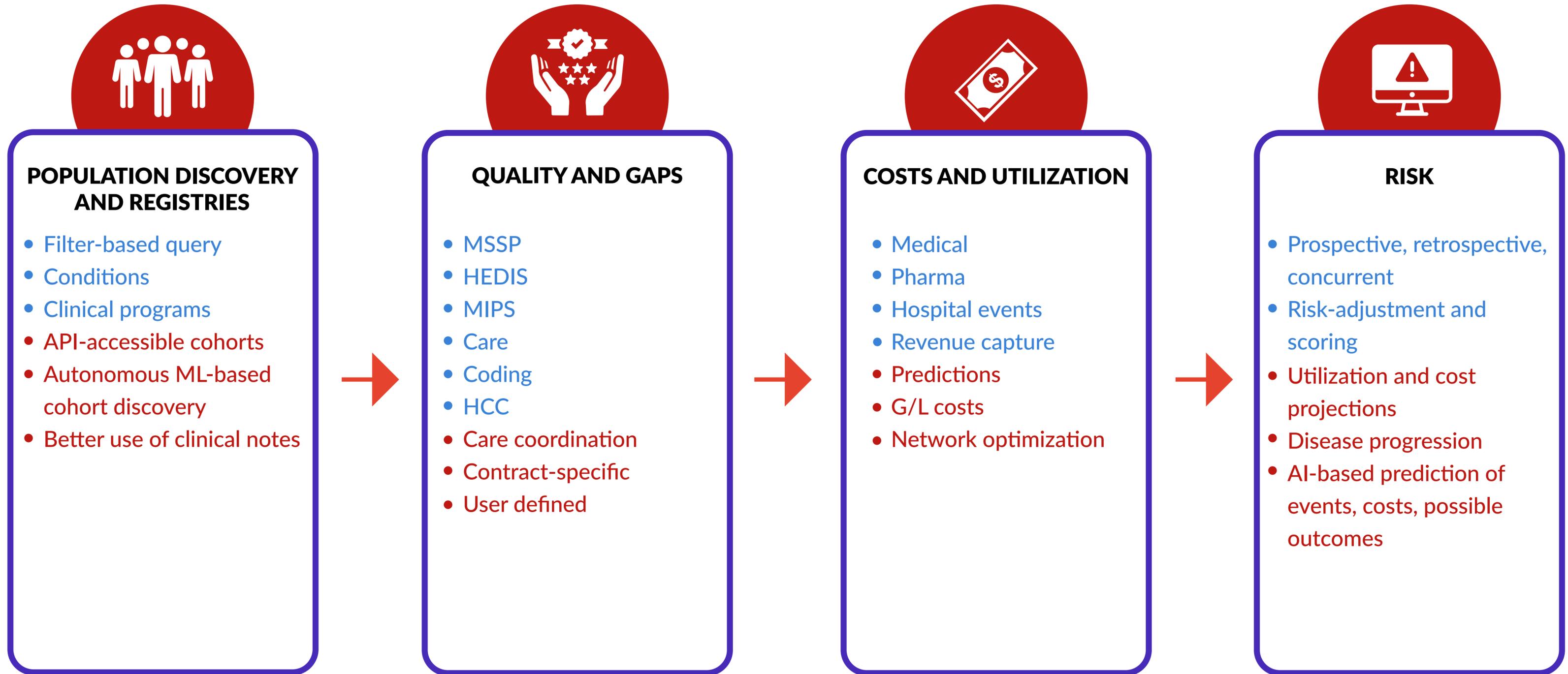
## MORE OF EVERYTHING

- Aggregated EHR and claims is table stakes
- Increasing interest in determinants of health (social and otherwise)
- Increasing number and variety of producers and consumers
- ONC is pushing Flat FHIR for population-level query
  - ▶ Many industry and technology concerns
- Vendors are pushing the idea of “data platforms”
  - ▶ But many networks, data and transaction types are out-of-scope
- Consent, patient matching, and semantic uniformity continue to challenge



# ANALYTICS FOR PHM

## DESCRIPTIVE MOVING TO PREDICTIVE



# WHERE VENDORS ALIGN AND DIFFERENTIATE ON CARE MANAGEMENT

## ALIGNMENT

Identifying and assigning patients

Creating care plans with goals, tasks and interventions

Communicating care plan info to patient

Monitoring patient progress toward goals

Manual updates of care plans by care team

## DIFFERENTIATE

How patients are identified and assigned

Care plan content and workflow

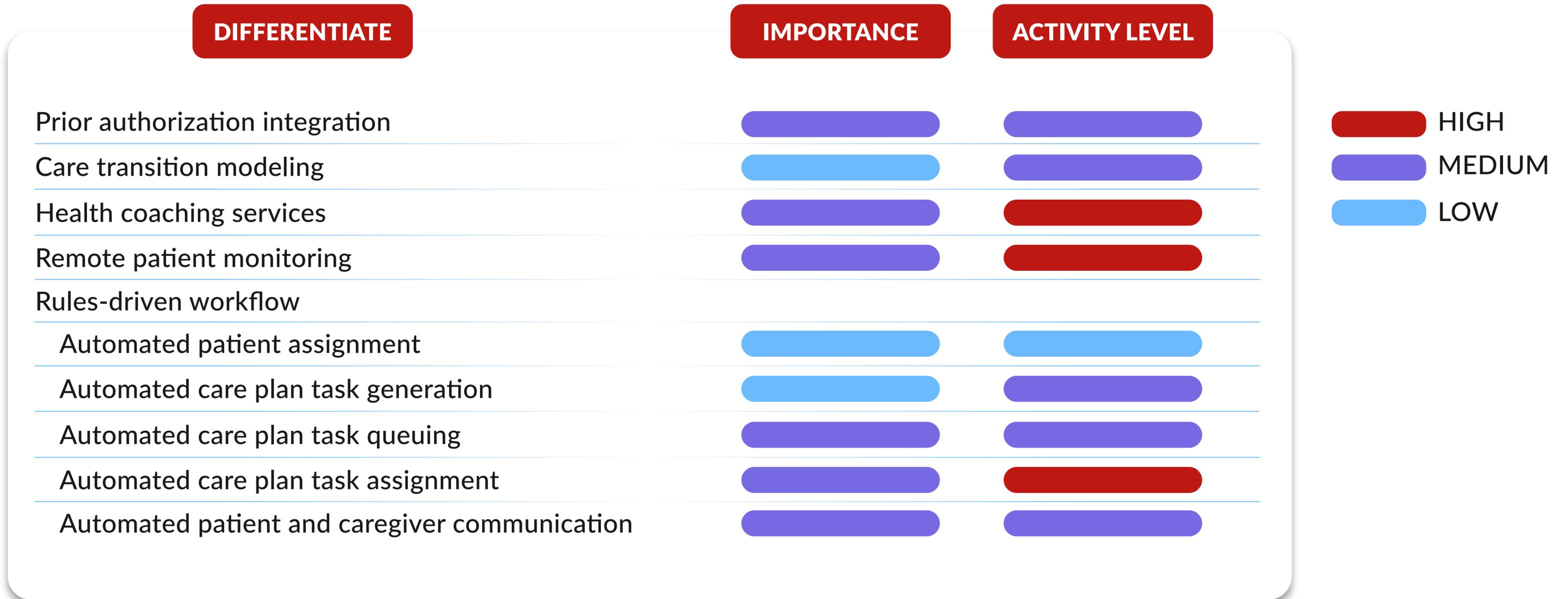
How care teams communicate with patients

Care plan administration automation

Self-management by patient and caregivers



# FUTURE AREAS OF CARE MANAGEMENT DEVELOPMENT



# THE IDEAL PATIENT JOURNEY

## COMPLETE PATIENT VIEW

- Clinical data
- Claims data
- Social + community data

## COLLABORATION + SUPPORT

- Patients
- Providers
- Caregivers / surrogates

## ACROSS EVERY CHANNEL

- Video
- Messaging
- Email

## ON ANY DEVICE

- Web
- Tablet
- Phone

## CUSTOM CARE PLANS

- Evidence-based protocols
- SDoH
- Barriers to care

## PATIENT ENGAGEMENT

- Surveys + assessments
- Care plan progress
- Device integration

## MEASURE OUTCOMES

- Patient progress
- Care plan effectiveness
- New goals + interventions



# THE REAL PATIENT JOURNEY

## SHORTCOMINGS

- **Legacy portals:** Engagement tied to single care episodes
- **Point solutions:** Fragmented experience outside care continuum
- **Education:** Limited to single episode or condition; no “big picture”
- **Extensibility:** Use not tied to HCO engagement goals, business objectives

## UNMET NEEDS

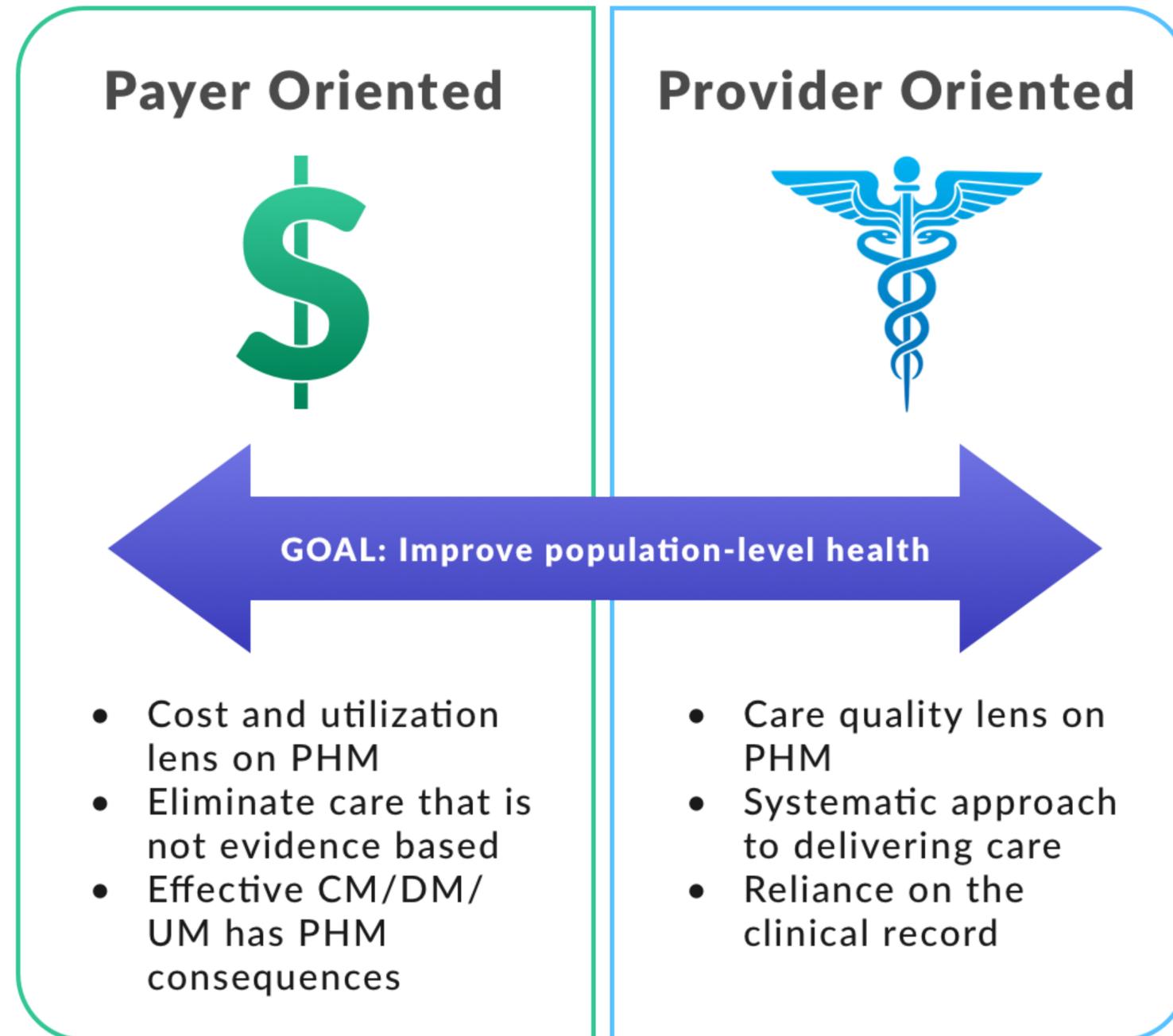
- **Post-acute engagement:** Can't connect to payers, employers, other providers
- **Convergence:** Better provider-payer data flow reduces friction
- **Insight:** Hard to see patient progress – but also unmet needs
- **Behavior change:** Must support short, frequent interventions



# *Who Makes PHM Solutions Today?*



# PHM VENDOR ORIENTATION



# PHM VENDORS CATEGORIZED

## EHR

- Allscripts
- Athenahealth
- Cerner
- eClinicalWorks
- Epic
- NextGen

## DATA AGGREGATORS

- Arcadia.io
- Caradigm
- CareEvolution
- HealthEC
- Lightbeam
- Orion Health
- NextGen
- ZeOmega

## ANALYTICS

- Arcadia.io
- Caradigm
- CareEvolution
- Evolent
- Forward Health
- Health Catalyst
- HealthEC
- IBM Watson Health
- Lightbeam
- Philips

## CARE MANAGEMENT

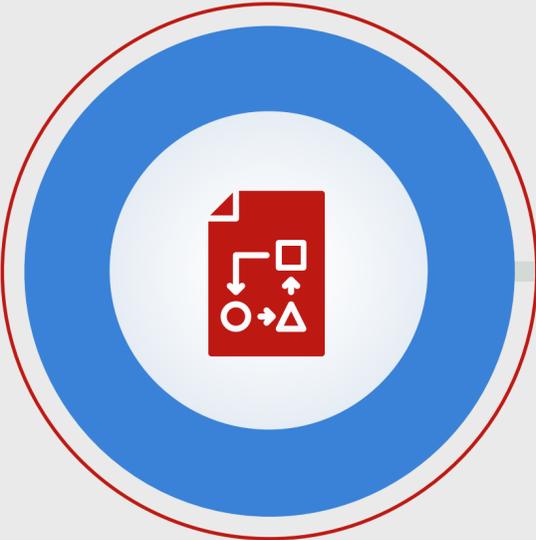
- Caradigm
- CareEvolution
- Enli
- Evolent
- HealthEC
- IBM Watson Health
- Lightbeam
- Philips
- ZeOmega

## PAYER

- Arcadia.io
- CareEvolution
- Conifer
- Geneia
- IBM Watson Health
- Optum

# GROWING DEMAND FOR PHM-RELATED SERVICES

## AFFORDABILITY IS KEY



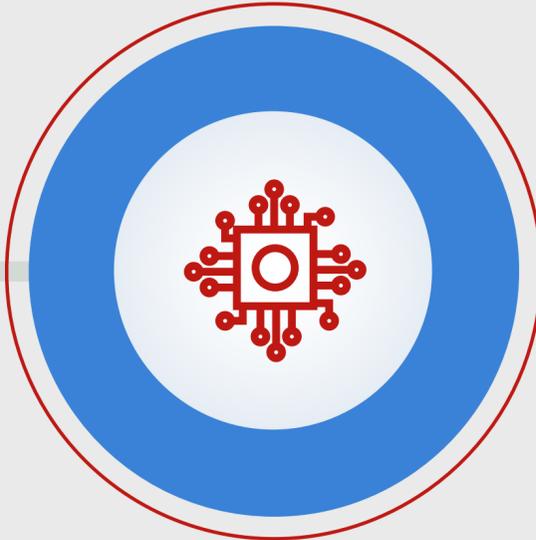
### STRATEGY AND BUSINESS PLAN

- Patient enrollment and outreach communication strategies
- Program evaluation (best practices, operations and ROI analysis)
- PHM strategy
- Care team design, staffing, and composition



### FINANCIAL MANAGEMENT

- Contract optimization
- Network optimization
- Profitability evaluation
- Opportunity analysis



### TECHNOLOGY

- Data sourcing and management strategy
- Clinical workflow
- End-user training
- Report development
- Care plan content development and customization



# CONCLUSIONS

- Basic inter-organizational processes lack automation
  - ▶ Meds reconciliation
  - ▶ Referrals and scheduling
- Metric proliferation and reporting burden is an issue on the ground
- Patients unfamiliar with terms like “PHM” or “Value-based”
- IT and process governance trumps technology considerations
- Contract modeling is rudimentary
- G/L Cost analytics and applications sorely needed

# TAKEAWAYS

- Value-based care and payments expanding
  - ▶ Carrots and sticks being redesigned
- Integration is a major opportunity
  - ▶ More data, more participants, fewer applications
- PHM analytics moving beyond reports and dashboards
- Care plan content is in early days
- Meaningful inclusion of patients could help

# *Thank You for Attending*

## **Additional Questions?**

Please feel free to email Brian directly with any additional questions or inquiries: **[brian@chilmarkresearch.com](mailto:brian@chilmarkresearch.com)**

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