



OHDSI in 2026:
Where can we go together?

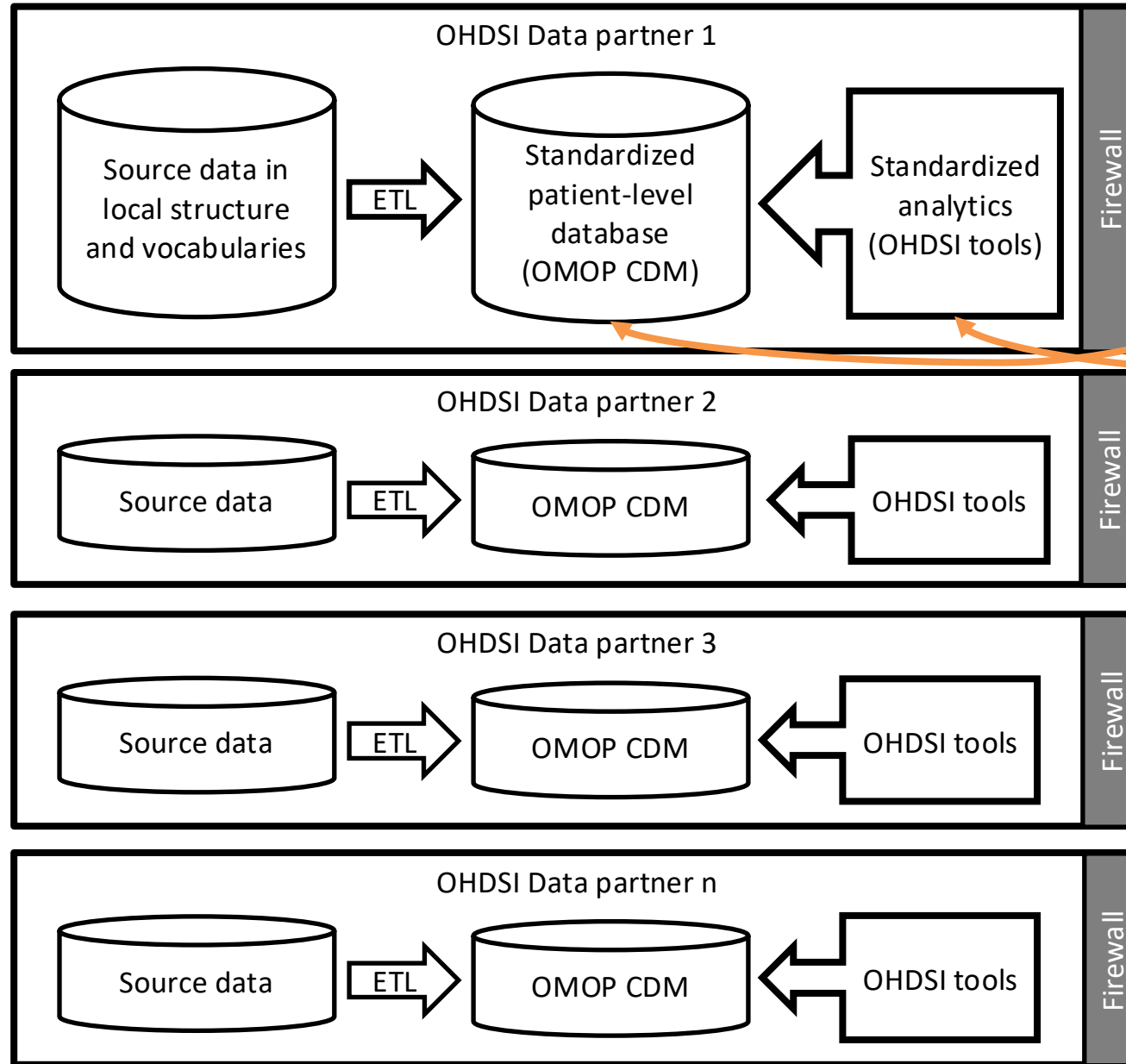


OHDSI's mission

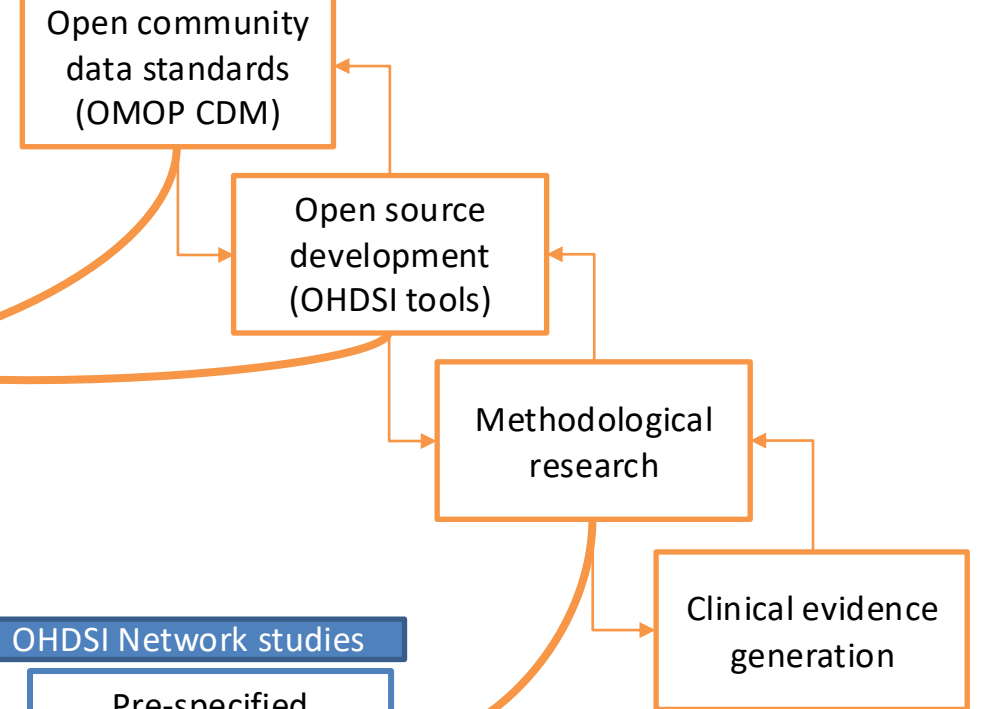
To improve health by empowering a community to collaboratively generate the evidence that promotes better health decisions and better care

OHDSI Community

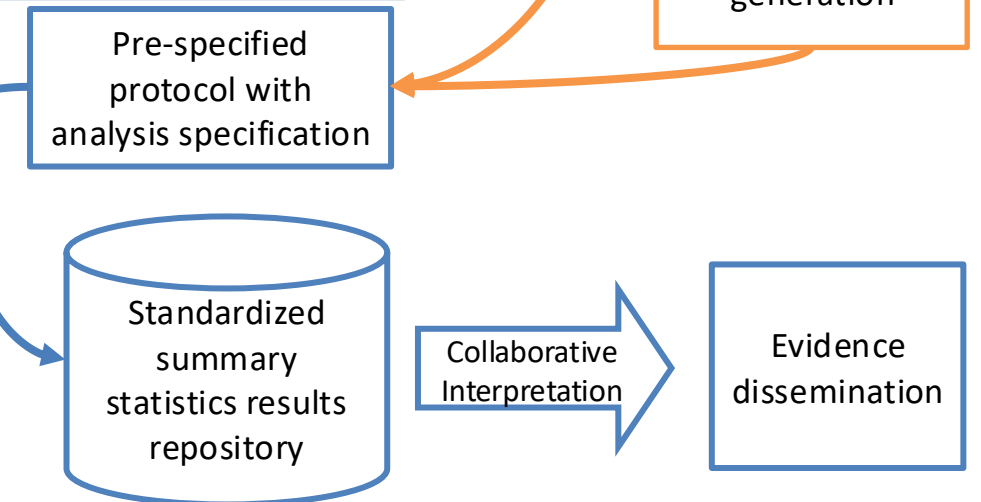
OHDSI data network



OHDSI collaborations

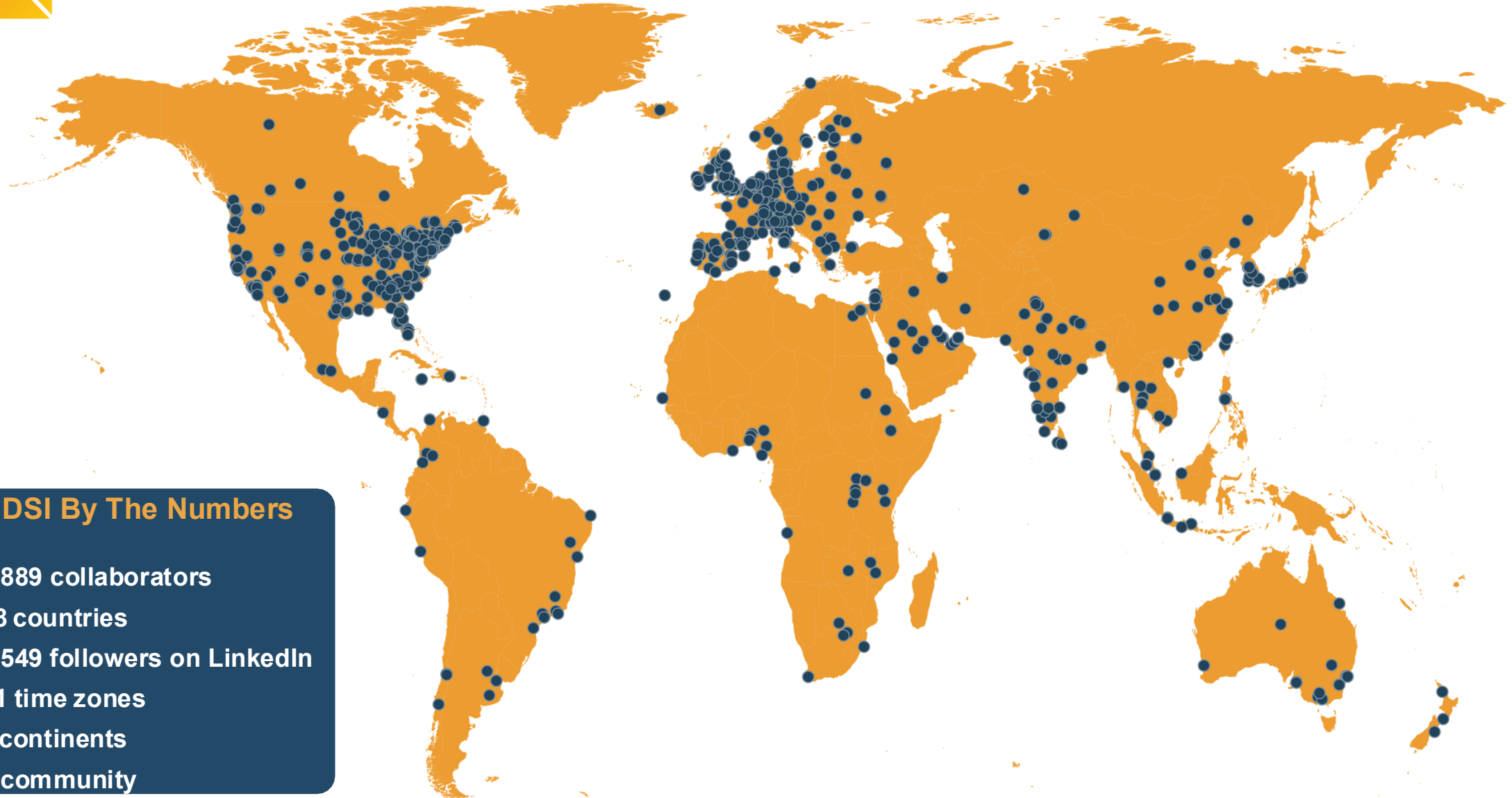


OHDSI Network studies





OHDSI collaborators



OHDSI By The Numbers

- 4,889 collaborators
- 88 countries
- 9,549 followers on LinkedIn
- 21 time zones
- 6 continents
- 1 community

Join the Journey at <https://ohdsi.org/>



Regional chapters and national nodes

Africa



Agnes Kiragga

Asia-Pacific (APAC)



Cynthia Sung



Mui Van Zandt

Australia



Nicole Pratt

China



Hua Xu

Europe



Peter Rijnbeek

India



Swetha Kiranmayi Jakkuv



Vikram Patil



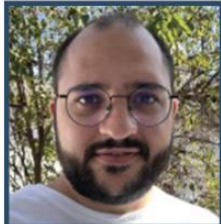
Parthiban Sulur

Japan



Tatsuo Hiramatsu

Latin America



Julio Oliveira

Republic of Korea



Rae Woong Park



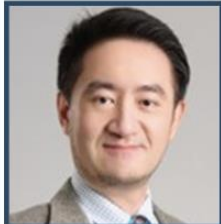
Seng Chan You

Singapore



Mengling 'Mornin' Feng

Taiwan



Jason Hsu

Node..... Lead(s)

Belgium Liesbet Peeters, Annelies Verbiest, Ilse Vermeulen
Denmark Ismail Gögenur, Martin Høyer Rose, Andreas Weinberger Rosen
Estonia Raivo Kolde, Sulev Reisberg
Finland Eric Fey, Gustav Klingstedt
Germany Ines Reinecke, Michele Zoch
Greece Anastasia Farmaki, Pantelis Natsiavas, Grigoris Papapostolou
Hungary Zsolt Bagyura, Ágota Mészáros
Ireland Aedin Culhane, Mark Lawler, Catherine Mahoney
Israel Chen Yanover
Italy Lucia Sacchi, Matteo Gabetta
Luxembourg Claudine Backes, Andreas Kremer, Maria Quaranta
Netherlands Renske Los, Aniek Markus
Norway Espen Enerly, Siri Larønningen
Portugal Patricia Couceiro, Carmen Nogueira
Spain Miguel Angel Mayer, Talita Duarte Salles
Switzerland Olga Endrich, Karen Triep
United Kingdom Dani Prieto-Alhambra

coming soon Austria, Sweden





Workgroups led by community

ATLAS/WebAPI Christopher Knoll Alexey Manoylenko		Clinical Trials Mike Hamidi Zhen Lin		Common Data Model Clair Blacketer		CDM Survey Nicole Gerlane		CDM Vocabulary Anna Ostropolets		Medical Imaging Paul Nagy Seng Chan You		Methods Research Martijn Schuemie Mare Suchard		Natural Language Processing Vipina Keloeth Hua Xu		Network Data Quality Clair Blacketer	
Databricks Users John Gresh		Dentistry Robert Koski		Early-Stage Researchers Shounak Chattopadhyay Ben Martin		Electronic Animal Health Records Harry Reyes Nieva Manlik Kwong		Oncology Wayde Shipman Asieh Golozar		Open-Source Community Adam Black Paul Nagy		Patient-Level Prediction (PLP) Jenna Reys Ross Williams		Perinatal and Reproductive Health Alison Callahan Stephanie Leonard			
Evidence Network Partners Clair Blacketer Paul Nagy		Eye Care and Vision Research Sally Baxter Cindy Cai Kerry Goetz				FHIR and OMOP Michelle Hribar Davera Gabriel		Perinatal and Reproductive Health Louisa Smith Gowtham Rao		Phenotype Development & Evaluation Azza Shoalbi Dmytry Dymshyts		Psychiatry Callum Harding Xiaoyan Wang		Rare Diseases Chunhua Wong			
FHIR and OMOP Ben Hamlin Guy Tsafnat		Generative AI & Analytics in Healthcare Martijn Schuemie		GIS - Geographic Information Systems Robert Miller Kyle Zollo-Venecek		HADES Anthony Sena Martijn Schuemie		Rehabilitation Esther Janssen Ruud Salles		Steering George Hripesak Patrick Ryan		Surgery and Perioperative Medicine Jenny Lane Evan Minty		Themis Melanie Philofsky			
Health Economics and Value Assessment Gaurav Dravida Gowtham Rao		Health Equity Atif Amin		Healthcare Systems Melanie Philofsky Paul Dougall		Industry Sarah Seager		Medical Devices Asiyah Lin		Transplant Michal Mankowski Oliver He		Vaccine Vocabulary Asiyah Lin		Women of OHDSI Sarah Seager			

Workgroups Homepage

In OHDSI, there is a home for you. Please visit our workgroups home page to learn more a-bout each group, find the meeting schedule and sign up to one or several workgroups!



www.ohdsi.org/workgroups

When poll is active respond at Pollev.com/patrickryan800



What do you want to accomplish together in 2026?

Nobody has responded yet.

Hang tight! Responses are coming in.



2025 OHDSI Global Symposium post-it exercise

WHAT YOU
ARE DOING
IN OHDSI

WHAT YOU
WANT TO
BE DOING
IN OHDSI

WHAT YOU
NEED HELP
TO DO IN
OHDSI





Themes from 2025 OHDSI Global Symposium post-its

What people are *currently doing*

- OMOP conversions + early network studies
- Methods development
- Domain-specific analyses
- Teaching or learning OHDSI foundational skills

What people *WANT to be doing*

- Advanced analytics (AI/ML, causal inference, trajectories)
- Larger network studies
- Contributing phenotypes and methods
- Engaging in international collaboration
- Establishing local OHDSI hubs

Where people *NEED HELP*

- Vocabularies + concept sets
- ETL and data quality
- Study execution (ATLAS/HADES)
- Methods mentoring
- Concrete examples and reproducible code



2025 Workgroup leader year-in-review summary: What's Needed

A. Strategic Direction & Prioritization

- Clearer global OHDSI priorities
- A shared roadmap that aligns workgroups
- Guidance on where to focus limited resources

Groups **want top-down direction—not to constrain them, but to empower them.**

B. Help with Participation, Recruitment, and Visibility

- Publicizing workgroup activities
- Helping attract contributors with needed skills
- Coordinated onboarding pathways for new members

The community needs **better talent matching** and **pipeline building.**

C. Support for Cross-Group Coordination

- Mechanisms to align with related groups
- Shared communication channels for dependencies
- Avoiding duplicated or conflicting work

There is a strong desire for OHDSI to function more as an **integrated ecosystem.**

D. More Dedicated Technical / Engineering Support

- Developer time
- Data engineering support
- Hands-on help for code review, pipeline building, vocab work, etc.

This echoes the earlier theme **of technical workforce constraints.**



OHDSI Central Coordinating Center responsibilities

Steward open
community
data standards

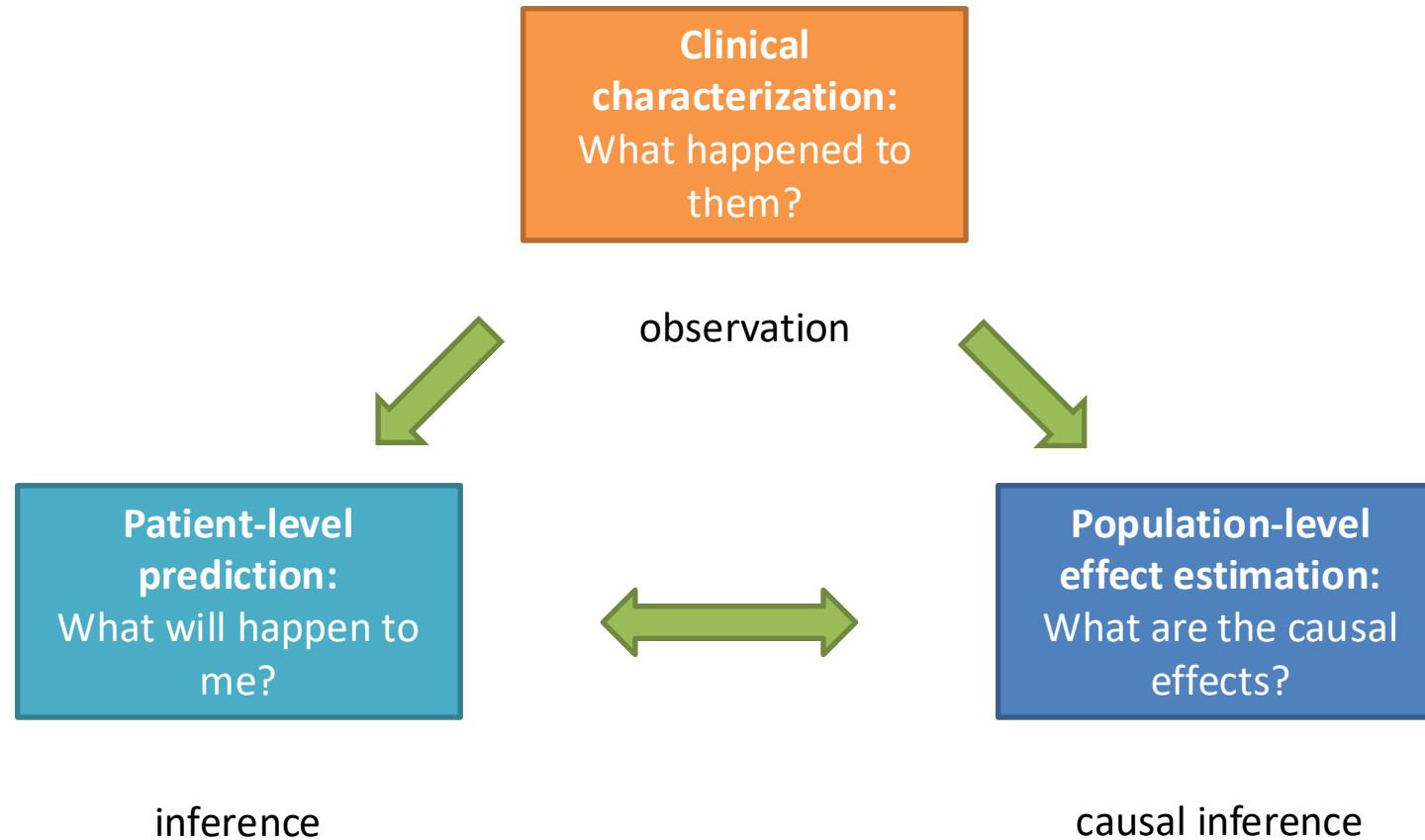
Enable open
source
development

Facilitate
methods
research and
clinical
applications

Encourage
open sharing
and evidence
dissemination

Foster collaborations and empower community

Complementary evidence to inform the patient journey



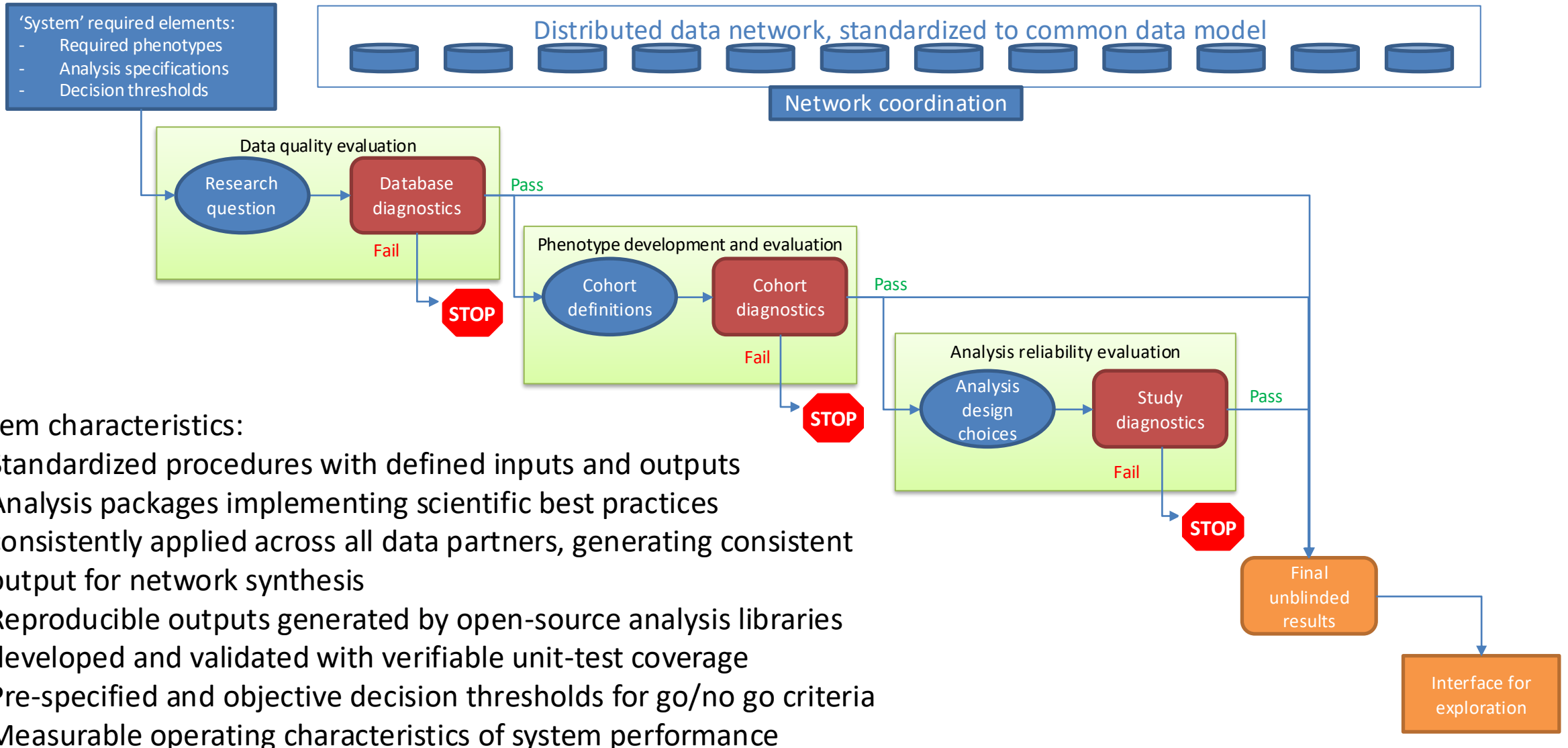


Standardizing the question makes it possible to standardize the analysis and standardize the evidence

Analytic use case	Type	Structure
Clinical characterization	Disease Natural History	Amongst patients who are diagnosed with <insert disease of interest> , what are the patient's characteristics from their medical history?
	Treatment utilization	Amongst patients who have <insert disease of interest> , which treatments were patients exposed to amongst <list of treatments for disease> and in which sequence?
	Outcome incidence	Amongst patients who are new users of <insert drug of interest> among the population with <insert indication of interest> , how many patients experienced <insert outcome of interest> within <time horizon following exposure start> ?
Population-level effect estimation	Safety surveillance	Does exposure to <insert drug of interest> increase the risk of experiencing <insert an adverse event> within <time horizon following exposure start> , among the population with <insert indication of interest> ?
	Comparative effectiveness	Does exposure to <insert drug of interest> have a different risk of experiencing <insert any outcome (safety or benefit) > within <time horizon following exposure start> , relative to <insert comparator treatment> , among the population with <insert indication of interest> ?
Patient level prediction	Disease onset and progression	For a given patient who is diagnosed with <insert your favorite disease> , what is the probability that they will go on to have <another disease or related complication> within <time horizon from diagnosis> ?
	Treatment response	For a given patient who is a new user of <insert drug of interest> for <insert indication of interest> , what is the probability that they will <insert desired effect> in <time window> ?
	Treatment safety	For a given patient who is a new user of <insert drug of interest> for <insert indication of interest> , what is the probability that they will experience <insert adverse event> within <time horizon following exposure> ?



Engineering open science systems that build trust into the real-world evidence generation and dissemination process



SARS-CoV-2 (COVID-19) vaccine, mRNA spike protein

Drug Outcome Incidence in a large US claims database

Top 1000 Drugs

vancomycin

diphenoxylate

primidone

travoprost

pertuzumab

ciclesonide

Drug-outcome Incidence

< 0.000001

0.000001 - 0.00001

0.00001 - 0.0001

0.0001 - 0.001

> 0.001

Disease due to Corona viridae

Benign neoplasm of skin

Respiratory finding

Visual disturbance

Disorder of prostate

Lumbosacral spondylosis without myelopathy

Mass of right breast

Top 1000 Outcomes

Studying an
exposure:
1 T

Top 1000 Drugs

vancomycin

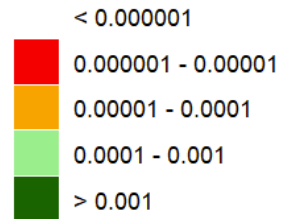
diphenoxylate

primidone

travoprost

pertuzumab

Drug-outcome Incidence



- Phenotype development/evaluation
- Characterization:
 - Incidence
 - Feature prevalence
 - Treatment patterns
 - [Strength, Duration, Adherence/Persistence]

Top 1000 Outcomes

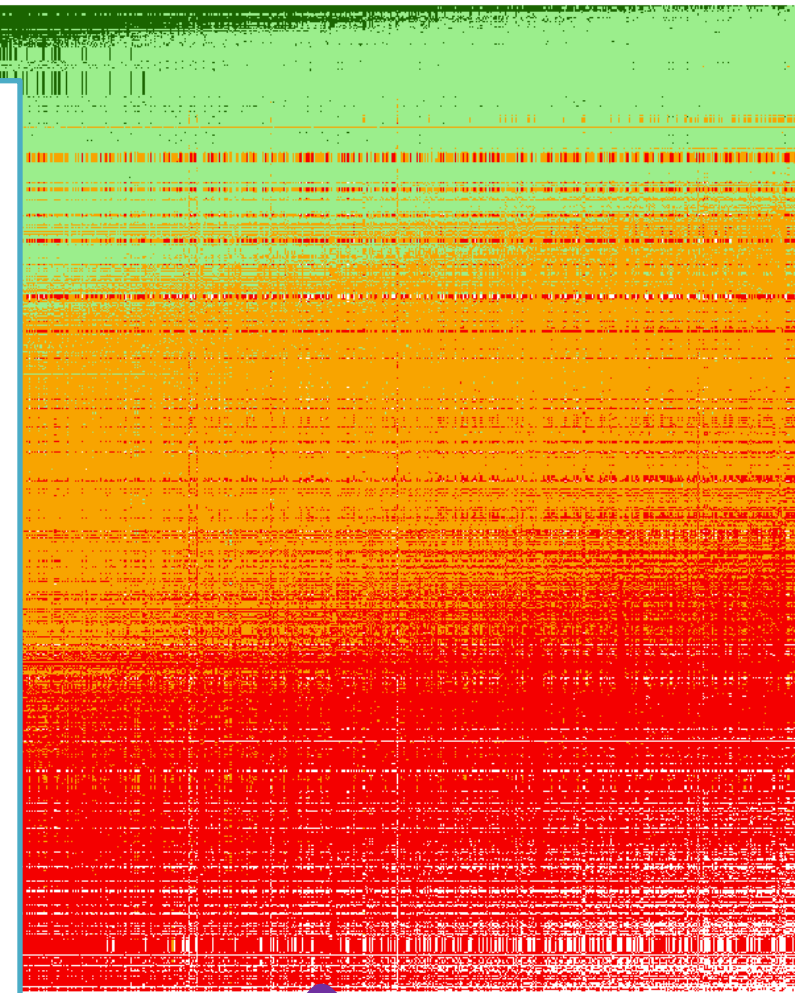
al disturbance

Disorder of prostate

Lumbar spondylosis without myelopathy

Mass of right breast

- “O” = any health state:
 - Indication (e.g. Psoriasis)
 - Population of interest (e.g. pregnant women)
 - Outcome (e.g. AMI, hospitalization)
 - Benefit: reduced risk of bad outcome
 - Safety: increased risk of bad outcome
- Phenotype development/evaluation
- Characterization:
 - Incidence
 - Feature prevalence
 - Treatment patterns
 - [Recurrence, health utilization]



Disease due to Corona viride

Benign neoplasm of sk

Respiratory findi

Visual disturbance

Disorder of prostate

Lumbosacral spondylosis without myelopathy

Mass of right breast

Studying an outcome:
10

OHDSI network
studies:
1 T * 1 O

vancomycin

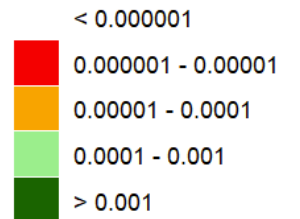
diphenoxylate



Everything you need for 1 T and everything you need for 1 O, plus:

- Characterization:
 - Incidence of O in T
 - Time-to-event: $T \rightarrow O$
 - Exposed case feature prevalence
 - Risk factors: T w O vs. T wo O
 - Dechallenge/rechallenge
 - [individual case profiles]
- Estimation:
 - Comparative cohort: T vs C for risk of O in TAR
 - SCCS / SCC : T for risk of O in TAR
 - [heterogeneity of treatment effects]
- Prediction:
 - $P(O \text{ in TAR} \mid T)$

Drug-outcome Incidence

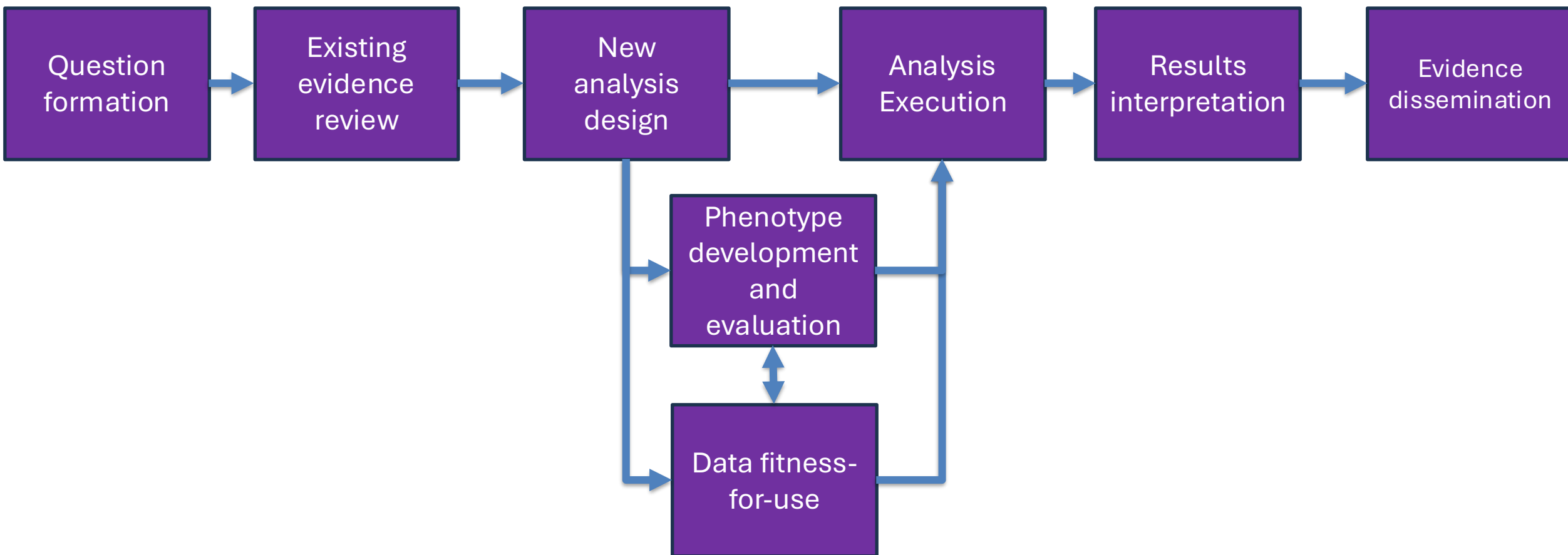


is without myelopathy

Mass of right breast



Where along the evidence generation process can we improve reliability and increase efficiency?



Top 1000 Drugs

LEGEND
Depression
2016-2018

vancomycin

diphenoxylate
17 T * 22 O

primidone

58 T * 58 O

travoprost

22 T * 32 O

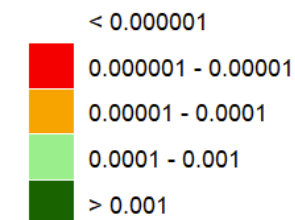
pertuzumab

ciclesonide

LEGEND
Hypertension
2018-2019

LEGEND T2DM
2021-2024

Drug-outcome Incidence



Disease due to Corona viridae

Benign neoplasm of skin

Respiratory finding

Visual disturbance

Disorder of prostate

Lumbosacral spondylosis without myelopathy

Mass of right breast

Top 1000 Outcomes

vancomycin

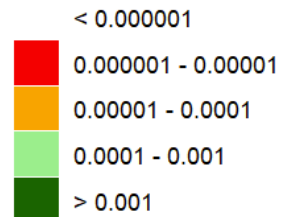
diphenoxylate

primidone

travoprost

All-by-all

Drug-outcome Incidence



Future opportunity: “All-by-all”: All Ts * All Os

Given where we are and where we want to go, what are the critical solves:

- Define the universe of exposures and outcomes
- Develop scalable methods and computational infrastructure to generate results
- Create process and system for sharing findings

Mass of right breast

vancomycin

diphenoxylate

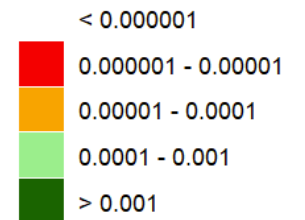
primidone

travoprost

pertuzumab

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Drug-outcome Incidence



Potential 2026 opportunity: “All by one”: All drugs * 1 outcome - Explore an outcome of interest

What do we need to solve?

- Comprehensive understanding of outcome phenotype in all databases
- Scalable approach to identify indication and comparator for each target drug



OPEN Dispersed prescription medications and short-term risk of pulmonary embolism in Norway and Sweden

Dagfinn Aune^{1,2,3}, Ioannis Vardaxis⁴, Bo Henry Lindqvist⁴, Ben Michael Brumpton^{5,6,7}, Linn Beate Strand⁸, Jens Wilhelm Horn^{8,9}, Inger Johanne Bakken¹⁰, Pål Richard Romundstad⁸, Kenneth J. Mukamal¹¹, Rickard Ljung¹², Imre Janszky^{8,13} & Abhijit Sen^{8,14}

Scandinavian electronic health-care registers provide a unique setting to investigate potential unidentified side effects of drugs. We analysed the association between prescription drugs dispensed in Norway and Sweden and the short-term risk of developing pulmonary embolism. A total of 12,104 pulmonary embolism cases were identified from patient- and cause-of-death registries in Norway (2004–2014) and 36,088 in Sweden (2005–2014). A case-crossover design was used to compare individual drugs dispensed 1–30 days before the date of pulmonary embolism diagnosis with dispensation in a 61–90 day time-window, while controlling for the receipt of other drugs. A BOLASSO approach was used to select drugs that were associated with short-term risk of pulmonary embolism. Thirty-eight drugs were associated with pulmonary embolism in the combined analysis of the Norwegian and Swedish data. Drugs associated with increased risk of pulmonary embolism included certain proton-pump inhibitors, antibiotics, antithrombotics, vasodilators, furosemide, anti-varicose medications, corticosteroids, immunostimulants (pegfilgrastim), opioids, analgesics, anxiolytics, antidepressants, antiparasitics, and drugs for cough and colds. Mineral supplements, hydrochlorothiazide and potassium-sparing agents, beta-blockers, angiotensin 2 receptor blockers, statins, and methotrexate were associated with lower risk. Most associations persisted, and several additional drugs were associated, with pulmonary embolism when using a longer time window of 90 days instead of 30 days. These results provide exploratory, pharmacopeia-wide evidence of medications that may increase or decrease the risk of pulmonary embolism. Some of these findings were expected based on the drugs' indications, while others are novel and require further study as potentially modifiable precipitants of pulmonary embolism.

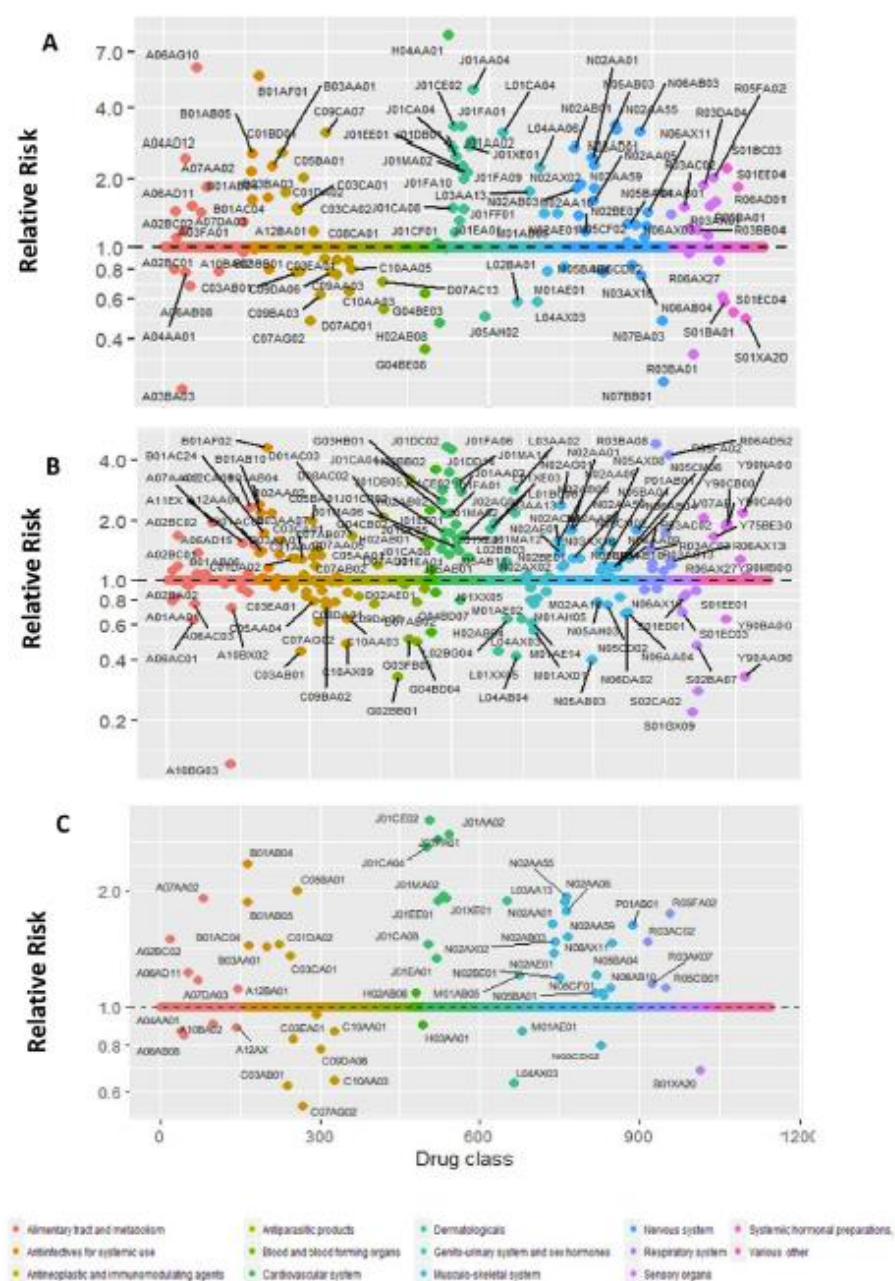


Figure 1. Case-crossover analysis of dispensed prescription medication use and risk of pulmonary embolism. The above plot illustrates (A) unique drug types which were selected in Norway, (B) unique drug types which were selected in Sweden, and (C) 59 drugs which were common hits from both the countries. Y-axis displays relative risk on the log scale, X-axis displays all the prescribed drugs studied grouped by the anatomical therapeutic chemical (ATC) classification.



Received: 16 December 2024 | Revised: 15 January 2025 | Accepted: 19 January 2025
DOI: 10.1002/bcp.16406

ORIGINAL ARTICLE

Acute cardiovascular effects associated with prescription medications: A Danish population-based study

Saad Hanif Abbasi¹ | Lars Christian Lund¹
Martin Thomsen Ernst¹ | Anton Pottegård¹

20Feb2025 *Br J Clin Pharmacol.* 2025;91:1947–

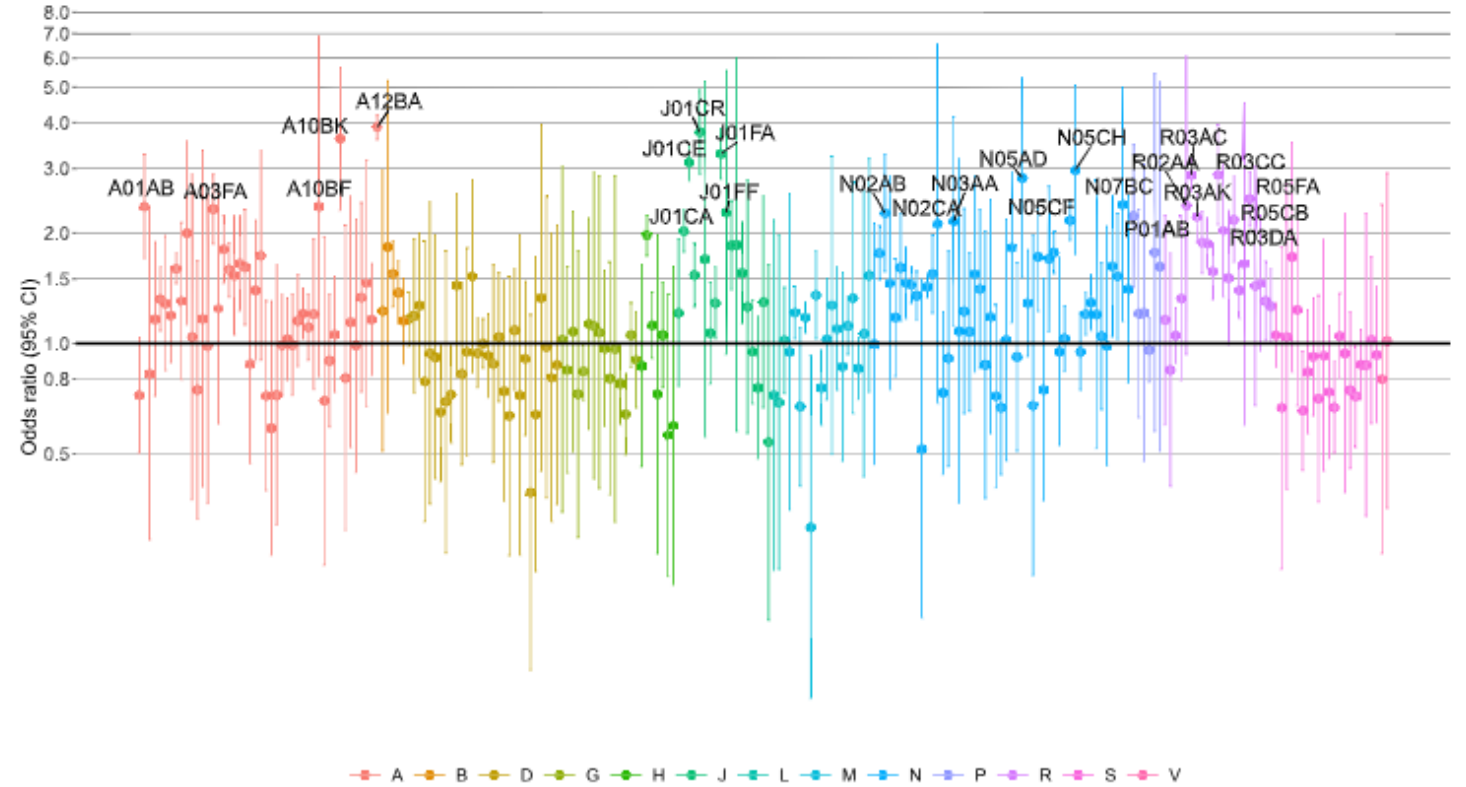


FIGURE 3 Associations of major drug classes (ATC level 4) with heart failure given as odds ratios (OR) with 95% confidence intervals (CI). Only drug classes with an OR of above 2 are labelled. The letters (A, B, D, G, H, J, L, M, N, P, R, S and V) correspond to drug classes based on the Anatomical Therapeutic Chemical (ATC) classification system, where each letter represents a specific anatomical or therapeutic group. A: Alimentary tract and metabolism; B: Blood and blood-forming organs; D: Dermatologicals; G: Genitourinary system and sex hormones; H: Systemic hormonal preparations, excluding sex hormones and insulins; J: Anti-infectives for systemic use; L: Antineoplastic and immunomodulating agents; M: Musculo-skeletal system; N: Nervous system; P: Antiparasitic products, insecticides, and repellents; R: Respiratory system; S: Sensory organs; V: Various. A01AB: Anti-infectives and antiseptics for local oral treatment; A03FA: Propulsives; A01AB: Alpha glucosidase inhibitors; A10BK: Sodium-glucose co-transporter 2 (SGLT2) inhibitors; A12BA: Potassium; J01CA: Penicillins with extended spectrum; J01CE: Beta-lactamase sensitive penicillins; J01CR: Combinations of penicillins, incl. beta-lactamase inhibitors; J01FA: Macrolides; J01FF: Lincosamides; N02AB: Phenylpiperidine derivatives; N02CA: Ergot alkaloids; N03AA: Barbiturates and derivatives; N05AD: Butyrophenone derivatives; N05CF: Benzodiazepine related drugs; N05CH: Melatonin receptor agonists; N07BC: Drugs used in opioid dependence; P01AB: Nitroimidazole derivatives; R02AA: Antiseptics; R03AC: Selective beta-2-adrenoreceptor agonists; R03AK: Adrenergics in combination with corticosteroids or other drugs, excluding anticholinergics; R03CC: Selective beta-2-adrenoreceptor agonists; R03DA: Xanthines; R05CB: Mucolytics; R05FA: Opium derivatives and expectorants.



High-Throughput Screening Tree-Based Scan Statistic to Associated With Hospitaliza Liver Injury

Vincent Lo Re III^{1,2} | Craig W. Newcomb² | Dean M. Ca Judith C. Maro⁷

4Dec2025

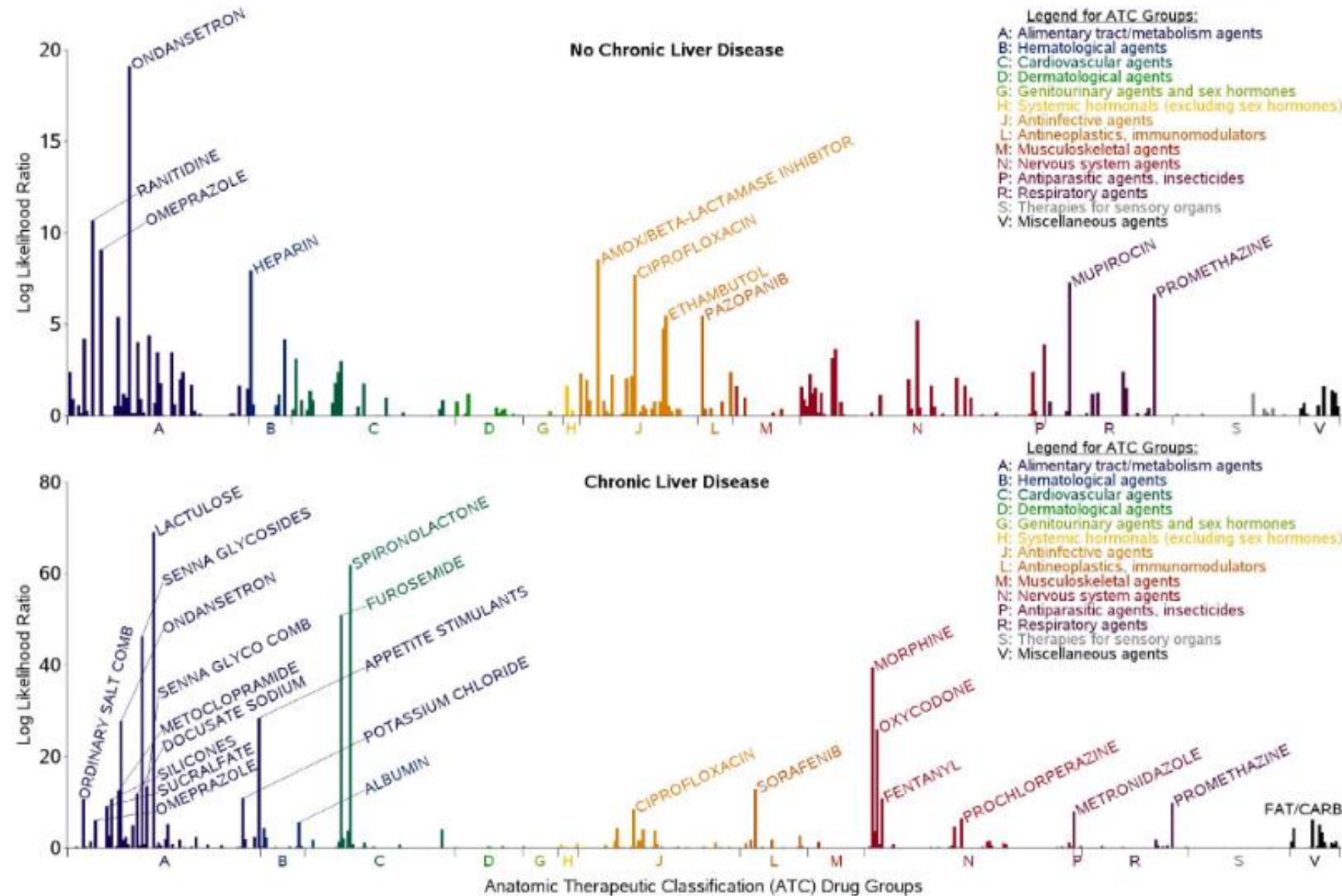


FIGURE 2 | Log likelihood ratio for drugs in the Anatomic Therapeutic Classification drug groups by chronic liver disease status. Peaks with labels qualify as alerts. ATC, Anatomic Therapeutic Classification; carb, carbohydrates; CLD, chronic liver disease; comb, combination; glyco, glycoside.



Open methodological questions raised by these 'all-by-one' studies

- What are the operating characteristics of the case-crossover design?
- For any drug alert, how do we know there isn't residual bias?
- How confident are we that these results could be replicated in other databases?



Potential opportunity for our community

- What could we learn if we:
 - Run a network study across the OHDSI Evidence Network for one outcome of shared interest
 - Apply best practices that are implemented using OHDSI HADES packages, including comparative cohort and SCCS designs
 - Share all results that pass objective diagnostics
- What do we need to do before we can learn:
 - Develop and evaluate the outcome phenotype across the Network
 - Identify indication(s) and comparator(s) for each target exposure

vancomycin

diphenoxylate

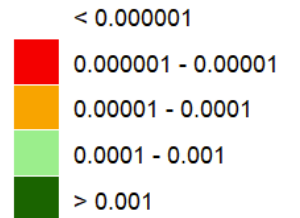
losartan

primidone

travoprost

pertuzumab

Drug-outcome Incidence



Potential 2026 opportunity: “One by all” : 1 Drug * All Outcomes - Explore one product

What do we need to solve?

- Comprehensive understanding of drug in all databases
 - Indications, subpopulations of interest
 - Treatment patterns to identify relevant comparators
- Scalable approach to phenotype all outcomes



Comprehensive comparative effectiveness and safety of first-line antihypertensive drug classes: a systematic multinational, large-scale analysis

Marc A Suchard, Martijn J Schuemie, Harlan M Krumholz, Seng Chan You, Ruijun Chen, Nicole Pratt, George Hripcsak, Patrick B Ryan

Summary

Background Uncertainty remains about the optimal monotherapy for hypertension. We compared any primary agent among the first-line drug classes thiazide or thiazide-like diuretics, angiotensin converting enzyme inhibitors, angiotensin receptor blockers, dihydropyridine calcium channel blockers, in the absence of comorbid indications. Randomised controlled trials are limited. We used a comprehensive framework for real-world evidence to evaluate effectiveness and safety outcomes.

Methods We developed a comprehensive framework for real-world evidence to evaluate effectiveness and safety outcomes. Using this framework, we did a systematic cohort design to estimate the relative risks of three primary (acute myocardial infarction, stroke, and heart failure) and six secondary effectiveness and 46 safety outcomes comparing thiazide or thiazide-like diuretics, angiotensin converting enzyme inhibitors, angiotensin receptor blockers, dihydropyridine calcium channel blockers, in the absence of comorbid indications. Randomised controlled trials are limited. We used a comprehensive framework for real-world evidence to evaluate effectiveness and safety outcomes.

Findings Using 4.9 million patients, we generated 22 000 calibrated, propensity score weighted estimates of relative risk for 46 outcomes. Most estimates revealed no difference between drug classes; however, thiazide or thiazide-like diuretics showed better primary effectiveness outcomes: acute myocardial infarction (HR 0.84, 95% CI 0.75–0.95), stroke (0.74–0.95), and stroke (0.83, 0.74–0.95) risk while on initial treatment. Safety outcomes showed no difference between drug classes. The non-dihydropyridine calcium channel blockers were significantly inferior to the other four classes.

Interpretation This comprehensive framework introduces a new way of doing comparative effectiveness research at a large scale. The approach supports equivalence between drug classes for initiating treatment, keeping with current guidelines, with the exception of thiazide or thiazide-like diuretics showing better primary effectiveness outcomes and the inferiority of non-dihydropyridine calcium channel blockers.

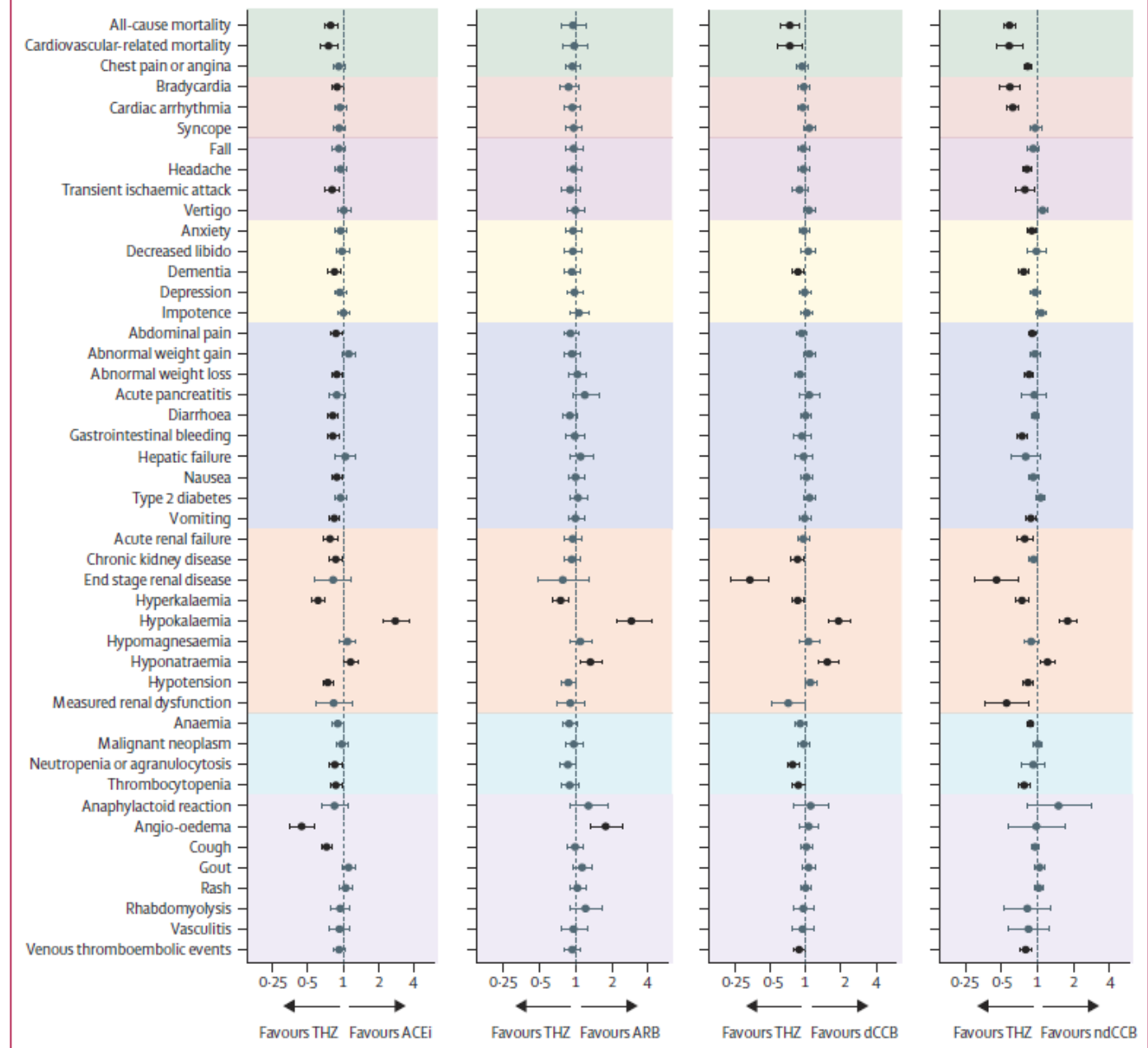


Figure 2: Meta-analytic safety profiles comparing THZ to ACEi, ARB, dCCB, and ndCCB new users across 46 outcomes listed on product labels
Points and lines identify HR estimates with their 95% CIs, respectively. Outcomes in grey signify that the CI covers HR of 1 (null hypothesis of no differential risk). THZ=thiazide or thiazide-like diuretics. ACEi=angiotensin converting-enzyme inhibitors. ARB=angiotensin receptor blockers. dCCB=dihydropyridine calcium channel blockers. ndCCB=non-dihydropyridine calcium channel blockers. HR=hazard ratio.



Table 3. Secondary and Safety Outcomes for ACE Inhibitors vs ARBs (on-Treatment, PS Stratification)

Outcome	HR (95% CI)	P value	Calibrated HR (95% CI)	Calibrated P value
Abdominal pain	1.00 (0.96–1.03)	0.87	1.01 (0.88–1.19)	0.87
Abnormal weight gain	0.82 (0.79–0.86)	<0.01	0.84 (0.74–0.98)	0.04
Abnormal weight loss	1.18 (1.11–1.25)	<0.01	1.18 (1.01–1.41)	0.04
Acute pancreatitis	1.32 (1.09–1.60)	<0.01	1.32 (1.04–1.70)	0.02
Acute renal failure	1.13 (1.08–1.18)	<0.01	1.14 (0.98–1.35)	0.10
Anaphylactoid reaction	1.31 (1.00–1.72)	0.05	1.31 (0.98–1.79)	0.07
Anemia	0.96 (0.92–0.99)	0.02	0.97 (0.84–1.14)	0.76
Angioedema	3.53 (2.99–4.16)	<0.01	3.31 (2.55–4.51)	<0.01
Anxiety	0.98 (0.95–1.00)	0.03	0.99 (0.86–1.16)	0.91
Bradycardia	0.96 (0.86–1.08)	0.52	0.98 (0.82–1.18)	0.84
Cardiac arrhythmia	0.96 (0.91–1.02)	0.22	0.98 (0.84–1.15)	0.82
Chest pain or angina	0.99 (0.97–1.01)	0.23	1.00 (0.87–1.17)	0.92
Chronic kidney disease	1.00 (0.93–1.08)	0.98	1.01 (0.87–1.20)	0.84
Cough	1.32 (1.23–1.42)	<0.01	1.32 (1.11–1.59)	<0.01
Decreased libido	0.96 (0.90–1.03)	0.29	0.98 (0.84–1.16)	0.83
Dementia	1.12 (1.06–1.18)	<0.01	1.13 (0.97–1.34)	0.14
Depression	1.02 (0.99–1.05)	0.20	1.03 (0.90–1.21)	0.65
Diarrhea	1.06 (1.02–1.09)	<0.01	1.07 (0.92–1.25)	0.40
End stage renal disease	0.87 (0.82–1.20)	0.39	0.88 (0.63–1.25)	0.50
Fall	1.03 (0.96–1.10)	0.46	1.04 (0.89–1.23)	0.64
Gastrointestinal bleed	1.18 (1.11–1.25)	<0.01	1.18 (1.01–1.41)	0.04
Gout	1.00 (0.97–1.04)	0.83	1.02 (0.88–1.19)	0.81
Headache	0.97 (0.94–1.00)	0.04	0.98 (0.86–1.15)	0.87
Hepatic failure	1.02 (0.89–1.17)	0.74	1.03 (0.86–1.27)	0.71
Hospitalization with preinfarction syndrome	1.02 (0.90–1.15)	0.77	1.03 (0.86–1.25)	0.74
Hyperkalemia	1.17 (1.04–1.30)	0.01	1.17 (0.98–1.42)	0.09
Hypokalemia	0.95 (0.89–1.03)	0.21	0.97 (0.83–1.15)	0.74
Hypomagnesemia	0.96 (0.89–1.04)	0.36	0.98 (0.84–1.16)	0.83
Hyponatremia	1.12 (1.06–1.19)	<0.01	1.13 (0.97–1.34)	0.13
Hypotension	1.13 (1.09–1.17)	<0.01	1.14 (0.98–1.35)	0.10
Impotence	1.06 (1.01–1.12)	0.02	1.07 (0.92–1.27)	0.37
Malignant neoplasm	0.97 (0.89–1.05)	0.39	0.98 (0.84–1.16)	0.85
Measured renal dysfunction	0.87 (0.66–1.14)	0.31	0.88 (0.66–1.20)	0.44
Nausea	1.10 (1.06–1.13)	<0.01	1.11 (0.95–1.30)	0.20
Neutropenia or agranulocytosis	0.96 (0.89–1.02)	0.18	0.97 (0.84–1.15)	0.76
Rash	0.96 (0.93–1.00)	0.04	0.98 (0.85–1.15)	0.82
Rhabdomyolysis	1.10 (0.91–1.34)	0.32	1.11 (0.88–1.43)	0.37
Syncope	1.02 (0.96–1.07)	0.56	1.03 (0.89–1.21)	0.71
Thrombocytopenia	1.01 (0.96–1.06)	0.69	1.02 (0.88–1.20)	0.76
Type 2 diabetes	1.04 (0.99–1.08)	0.12	1.05 (0.90–1.24)	0.54
Vasculitis	1.01 (0.85–1.20)	0.88	1.03 (0.83–1.29)	0.80
Venous thromboembolism	0.97 (0.90–1.04)	0.35	0.98 (0.84–1.16)	0.84
Vertigo	0.95 (0.92–0.99)	0.01	0.97 (0.84–1.13)	0.73
Vomiting	1.15 (1.11–1.19)	<0.01	1.15 (0.99–1.36)	0.07

Table 2. Primary Effectiveness Outcomes for ACE Inhibitors Compared With ARBs (on-Treatment, PS Stratification, Excluding NHIS/NSC)

Outcome	HR (95% CI)	P value	Calibrated HR (CI)	Calibrated P value
Acute myocardial infarction	1.10 (1.04–1.17)	<0.01	1.11 (0.95–1.32)	0.19
CVEs	1.04 (0.99–1.10)	0.12	1.06 (0.90–1.25)	0.49
Heart failure	1.02 (0.94–1.11)	0.64	1.03 (0.87–1.24)	0.68
Stroke	1.06 (1.00–1.12)	0.06	1.07 (0.91–1.27)	0.40

ABSTRACT: ACE (angiotensin-converting enzyme) inhibitors and angiotensin receptor blockers are recommended first-line treatments for hypertension, yet few head-to-head studies exist. We used a retrospective, new-user comparative cohort design to estimate hazard ratios using 10 databases from the United States, Germany, and South Korea. The primary outcomes were acute myocardial infarction, heart failure, stroke, and composite cardiovascular events. We also studied 51 secondary outcomes, including angioedema, cough, syncope, and electrolyte abnormalities. Across 8 databases, we identified 673 938 patients with hypertension initiating monotherapy with an ACE inhibitor or ARB. We found no statistically significant differences in effectiveness at the class level compared with ACE inhibitors as first-line treatment for hypertension but present a better safety profile. These findings support preferentially prescribing ARBs over ACE inhibitors when initiating treatment for hypertension.



CLINICAL PRACTICE GUIDELINES



2025 AHA/ACC/AANP/AAPA/ABC/ACCP/ACPM/AGS/AMA/ASPC/NMA/PCNA/SGIM Guideline for the Prevention, Detection, Evaluation and Management of High Blood Pressure in Adults: A Report of the American College of Cardiology/American Heart Association Joint Committee on Clinical Practice Guidelines

Developed in Collaboration With and Endorsed by American Academy of Physician Associates; American Association of Nurse Practitioners; American College of Clinical Pharmacy; American College of Preventive Medicine; American Geriatrics Society; American Medical Association; American Society of Preventive Cardiology; Association of Black Cardiologists; National Medical Association; Preventive Cardiovascular Nurses Association; and the Society of General Internal Medicine.

Writing Committee Members*

Daniel W. Jones, MD, FAHA, Chair; Keith C. Ferdinand, MD, FACC, FAHA, FASPC, Vice Chair; Sandra J. Taler, MD, FAHA, Vice Chair; Heather M. Johnson, MD, MS, FAHA, FACC, FASPC, JC Liaison†; Daichi Shimbo, MD, JC Liaison†; Marwah Abdalla, MD, MPH, FAHA, FACC‡; M. Martine Altieri, PA-C, MHSc§; Nisha Bansal, MD, MAS, FAHA; Natalie A. Bello, MD, MPH, FACC; Adam P. Bress, PharmD, MS¶; Jocelyn Carter, MD, MPH¶; Jordana B. Cohen, MD, MSCE, FAHA; Karen J. Collins, MBA; Yvonne Commodore-Mensah, PhD, MHS, BSN, RN, FAHA, FPCNA#; Leslie L. Davis, PhD, ANP-BC, FACC, FAHA; Brent Egan, MD, FAHA**; Sadiya S. Khan, MD, MSc, FACC, FAHA; Donald M. Lloyd-Jones, MD, ScM, FAHA, FACC; Bernadette Mazurek Melnyk, PhD, APRN-CNP, FAANP††; Eva A. Mistry, MBBS, MSCI, FAHA; Modele O. Ogunniyi, MD, MPH, FACC, FAHA‡‡; Stacey L. Schott, MD, MPH§; Sidney C. Smith Jr, MD, FAHA, MACC; Amy W. Talbot, MPH; Wanpen Vongpatanasin, MD, FAHA, FACC; Karol E. Watson, MD, PhD, FACC, FAHA, FASPC||; Paul K. Whelton, MB, MD, MSc, FAHA; Jeff D. Williamson, MD, MHS, AGSF¶¶||

5.2.3. Initial Medication Selection for Treatment of Primary Hypertension

Recommendation for Initial Medication Selection for Treatment of Primary Hypertension
Referenced studies that support the recommendation are summarized in the [Evidence Table](#).

COR	LOE	Recommendation
1	A	1. For adults initiating antihypertensive drug therapy, thiazide-type diuretics, long-acting dihydropyridine CCB, and ACEi or ARB are recommended as first-line therapy to prevent CVD. ^{1,2}



Potential opportunity for our community

- What could we learn if we:
 - Run a network study across the OHDSI Evidence Network for one drug of shared interest
 - Apply best practices that are implemented using OHDSI HADES packages, including comparative cohort and SCCS designs
 - Share all results that pass objective diagnostics
- What do we need to do before we can learn:
 - Develop and evaluate a more comprehensive universe of outcome phenotypes

Top 1000 Drugs

vancomycin

Glaucoma

diphenoxylate

Bladder cancer

Schizophrenia

primidone

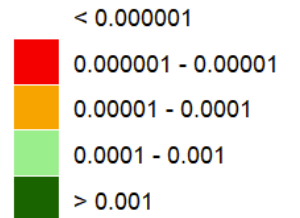
Atrial fibrillation

travoprost

Rare disease

pertuzumab

Drug-outcome Incidence



Potential 2026 opportunity: LEGEND studies for other indications of interest

What do we need for indication?

- Identify and phenotype all outcomes of interest for the indication (benefits and potential harms)
- Identify all treatments for indications
 - Treatment patterns to identify valid comparisons?

Mass of right breast

Top 1000 Outcomes



Potential opportunity for our community

- What could we learn if we:
 - Run a network study across the OHDSI Evidence Network for one or more indications of shared interest within our clinical subspecialty workgroups
 - Apply best practices that are implemented using OHDSI HADES packages, including comparative cohort and SCCS designs
 - Share all results that pass objective diagnostics
- What do we need to do before we can learn:
 - Develop and evaluate exposure and outcome phenotypes relevant to the indication



Themes from 2025 OHDSI Global Symposium post-its

What people are *currently doing*

- OMOP conversions + early network studies
- Methods development
- Domain-specific analyses
- Teaching or learning OHDSI foundational skills

What people *WANT to be doing*

- Advanced analytics (AI/ML, causal inference, trajectories)
- Larger network studies
- Contributing phenotypes and methods
- Engaging in international collaboration
- Establishing local OHDSI hubs

Where people *NEED HELP*

- Vocabularies + concept sets
- ETL and data quality
- Study execution (ATLAS/HADES)
- Methods mentoring
- Concrete examples and reproducible code



Collaboration opportunities





2026 OHDSI Global Symposium

Oct. 20-22 • New Brunswick, N.J. • Hyatt Regency Hotel

The 12th annual OHDSI Global Symposium will return to the Hyatt Regency Hotel in New Brunswick, N.J., Oct. 20-22, 2026. All pertinent information will be added to this page when available. Currently, the OHDSI steering group is seeking proposals for both plenaries and tutorials. **The deadline for both is January 30, 2026; more details are below.**





2026 OHDSI Global Symposium Call for Plenary Sessions

Symposium plenaries provide opportunities to share innovative, community-developed content to empower researchers to generate reliable real-world evidence. The community is currently seeking proposals for our #OHDSI2026 plenaries. These sessions will be 60 minutes in duration and must touch on at least two of following pillars of our community:

- Open community data standards
- Methodological research
- Open-source development
- Clinical applications

Plenary sessions must also involve three or more on-stage participants across at least two organizations. Sessions may include a combination of keynote talks, panel discussions, interactive activities, and more. We strongly encourage using multiple formats and synthesizing completed research, current perspectives and future calls-to-action to maximize community engagement.

The deadline for proposal submissions is January 30, 2026. Please use the link below to submit your proposal by answering the following questions:

- Name(s) of plenary session organizers:
- Your email address(es):
- Short (2,500 character max) description / abstract of your proposed session:
- Which pillars are you targeting:
- One sentence “pitch” of your session to excite the community:
- Names and roles of individuals who have tentatively agreed to participate in your session:

Submit Your Plenary Proposal by Jan. 30, 2026



2026 OHDSI Global Symposium Call for Tutorials

Tutorial sessions aim to deliver educational content, led by community members who wish to train our global collaborators on scientific, technical, and other skills that can support advancing OHDSI's mission and the effective use of real-world data and the generation and dissemination of reliable real-world evidence. Examples of prior tutorials offered are provided here: <https://www.ohdsi.org/tutorials>.

Tutorial sessions are 4 hours in duration. Registrants for your tutorial will be requested to pay a registration fee. The fees will be used to offset the costs of the symposium and other OHDSI expenses. Sessions may include a combination of talks, interactive activities, and more. We strongly encourage using multiple formats to maximize community engagement. Your session must include at least three people from at least two different organizations.

The deadline for tutorial proposal submissions is January 30, 2026. Please use the link below to submit your proposal by answering the following questions:

- Name(s) of tutorial session organizers:
- Your email address(es):
- Short (2,500 character) description / abstract of your proposed session:
- Names and roles of individuals who have tentatively agreed to participate in your session:

Submit Your Tutorial Proposal by Jan. 30, 2026



OHDSI Europe Symposium 2026



February 6th, 2026: Deadline for abstract submissions



Columbia DBMI Summer School

The 2026 Summer School in Observational Health Data Science & Informatics, AI, and Real World Evidence

June 22–26, 2026, Columbia Biomedical Informatics

The Columbia OHDSI Summer School provides health professionals, researchers, and industry practitioners with an immersive, hands-on training to working with real-world health data and generating real-world evidence (RWE). Participants will explore the types of healthcare data captured during routine clinical care—such as electronic health records and administrative claims—and learn how to standardize these data using the OMOP Common Data Model to support collaborative, distributed research as part of a data network.

Over the course of the week, participants will engage with three real-world analytic use cases:

- **Clinical characterization** – using descriptive epidemiology to study disease natural history and treatment patterns
- **Population-level estimation** – applying causal inference to assess drug safety and comparative effectiveness
- **Patient-level prediction** – leveraging machine learning for early disease detection and precision medicine

Participants will be guided through the full RWE study lifecycle: from designing observational studies tailored to each use case, to applying open-source tools from the [OHDSI community](https://ohdsi.org), and executing analyses across real-world data sources.

The curriculum combines foundational lectures on analytical methods with hands-on, interactive, faculty-led group exercises. In addition, participants will have dedicated time to develop and advance their own study concepts with personalized feedback and mentoring.





OHDSI LATAM 2026

OHDSI LATAM 2026

Open, Collaborative and Standardized Science for Health in Latin America

The first in-person gathering of the OHDSI community in Latin America —
advancing interoperability, real-world data, and reproducible research with
the OMOP Common Data Model.

📍 Salvador, Bahia, Brazil • 📅 July 30–31, 2026 • 🧑🏫 100 selected participants



Workgroups led by community

ATLAS/WebAPI		Clinical Trials		Common Data Model		CDM Survey		CDM Vocabulary		Medical Imaging		Methods Research		Natural Language Processing		Network Data Quality	
 Christopher Knoll	 Alexey Manoylenko	 Mike Hamidi	 Zhen Lin	 Clair Blacketer	 Nicole Gerlane	 Anna Ostropolets	 Paul Nagy	 Seng Chan You	 Martijn Schuemie	 Mare Suchard	 Vipina Kelothe	 Hua Xu	 Clair Blacketer				
Databricks Users		Dentistry		Early-Stage Researchers		Electronic Animal Health Records		Oncology		Open-Source Community		Patient-Level Prediction (PLP)		Perinatal and Reproductive Health			
 John Gresh	 Robert Koski	 Shounak Chattopadhyay	 Ben Martin	 Harry Reyes Nieva	 Manlik Kwong	 Wayde Shipman	 Asieh Golozar	 Adam Black	 Paul Nagy	 Jenna Reys	 Ross Williams	 Alison Callahan	 Stephanie Leonard				
Evidence Network Partners		Eye Care and Vision Research				FHIR and OMOP		Perinatal and Reproductive Health		Phenotype Development & Evaluation		Psychiatry		Rare Diseases			
 Clair Blacketer	 Paul Nagy	 Sally Baxter	 Cindy Cai	 Kerry Goetz	 Michelle Hribar	 Davera Gabriel	 Louisa Smith	 Gowtham Rao	 Azza Shoalbi	 Dmytry Dymshyts	 Callum Harding	 Xiaoyan Wang	 Chunhua Wong				
FHIR and OMOP		Generative AI & Analytics in Healthcare		GIS - Geographic Information Systems		HADES		Rehabilitation		Steering		Surgery and Perioperative Medicine		Themis			
 Ben Hamlin	 Guy Tsafnat	 Martijn Schuemie	 Robert Miller	 Kyle Zollo-Venecsek	 Anthony Sena	 Martijn Schuemie	 Esther Janssen	 Ruud Salles	 George Hripesak	 Patrick Ryan	 Jenny Lane	 Evan Minty	 Melanie Philofsky				
Health Economics and Value Assessment		Health Equity		Healthcare Systems		Industry		Medical Devices		Transplant		Vaccine Vocabulary		Women of OHDSI			
 Gaurav Dravida	 Gowtham Rao	 Atif Amin	 Melanie Philofsky	 Paul Dougall	 Sarah Seager	 Asiyah Lin	 Michal Mankowski	 Oliver He	 Asiyah Lin	 Sarah Seager							

Workgroups Homepage

In OHDSI, there is a home for you. Please visit our workgroups home page to learn more about each group, find the meeting schedule and sign up to one or several workgroups!

www.ohdsi.org/workgroups





Ask to workgroup leads for 2026

- Prepare your 2026 Objectives and Key Results (OKRs)
 - Consider one OKR aligned to shared community goal
- Present your OKRs on Feb3 or 10 Community Call so that other collaborators can be aware of what you aim to achieve and identify where they can contribute
- Maintain open schedule cadence, record/minute meetings so folks who miss synchronous connections can catch up
- Schedule one Community Call update to showcase your workgroup's goals and accomplishments
- Share your work at OHDSI symposia and other scientific conferences and publications

