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patient safety learning

16 Years of Values-Based Improvement Led by Clinicians….. The Next Steps

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Declarations

- Ruth Yates and Sue Holden are employed by Aqua, part of the NHS.
- Helen Hughes is employed by Patient Safety Learning, a registered Charity.
- We have not received any research funding for this work and have no other declarations to make.

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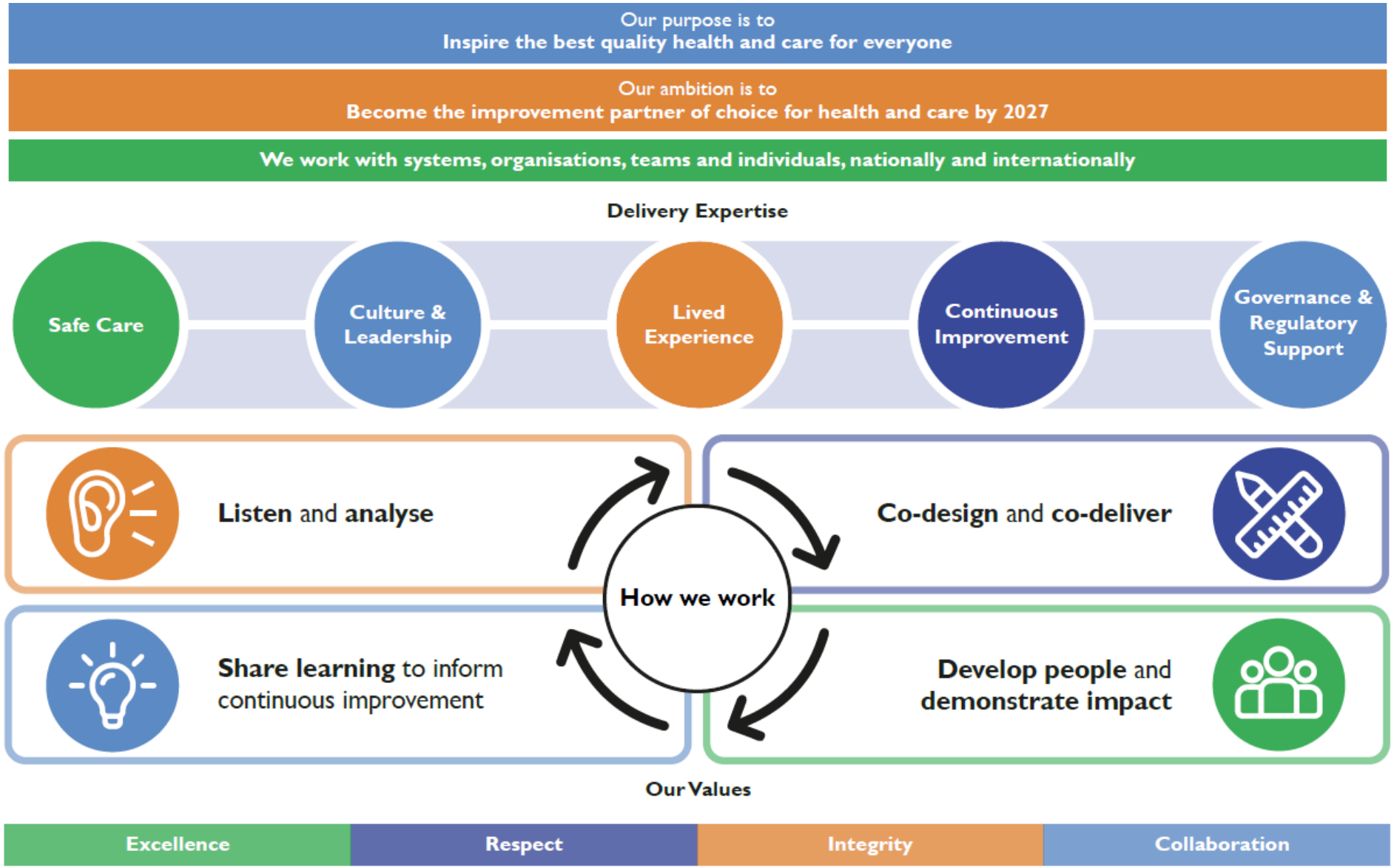
About Aqua



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About the Advancing Quality (AQ) Programme

1 Gain Consensus on Care Standards

What does good look like?

Measure sets for clinical focus areas aligned to national guidelines; involvement of clinical experts and regional networks

2 Identify Unwarranted Variation

Where do we need to improve?

Monthly data collection; regular reporting at team, organisation and system level; regional insight reporting

3 Improve Quality of Care

How do we improve?

Bespoke improvement support and improvement plans; consultancy work to support improvement; implementation framework

4 Learn and Share Best Practice

What has worked?

Case studies and papers; collaborative events; virtual learning platform; resource repository and networking

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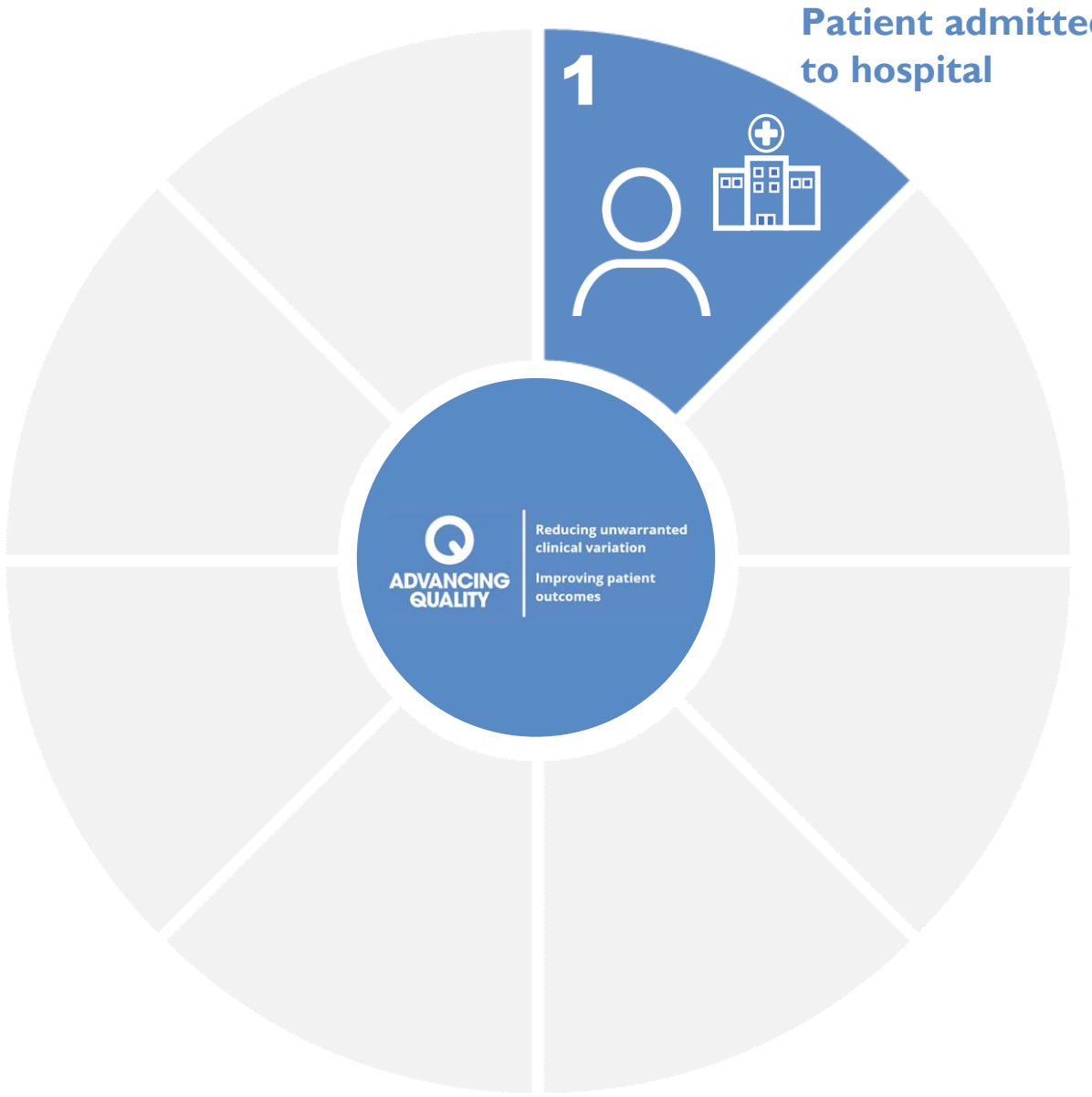

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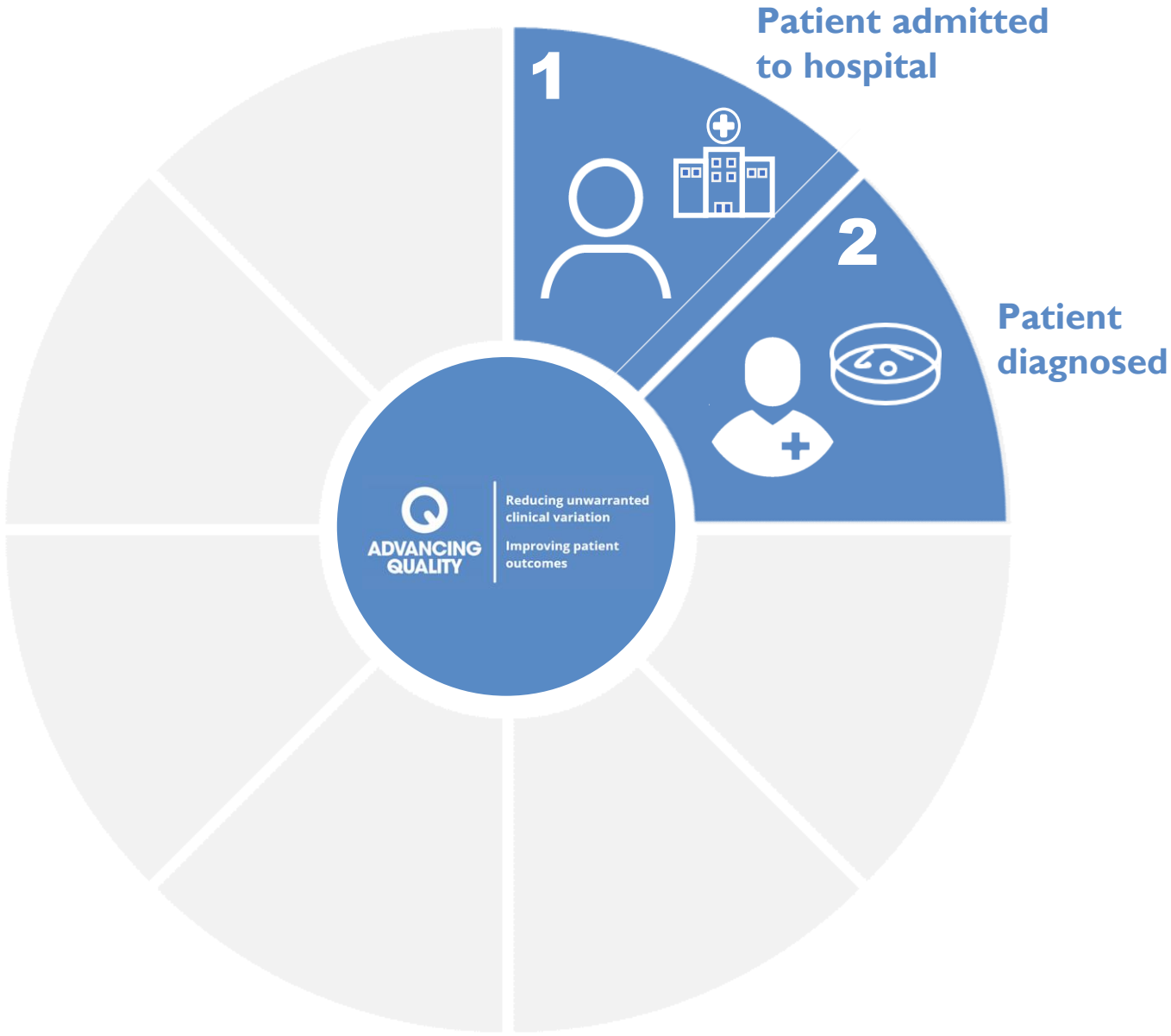

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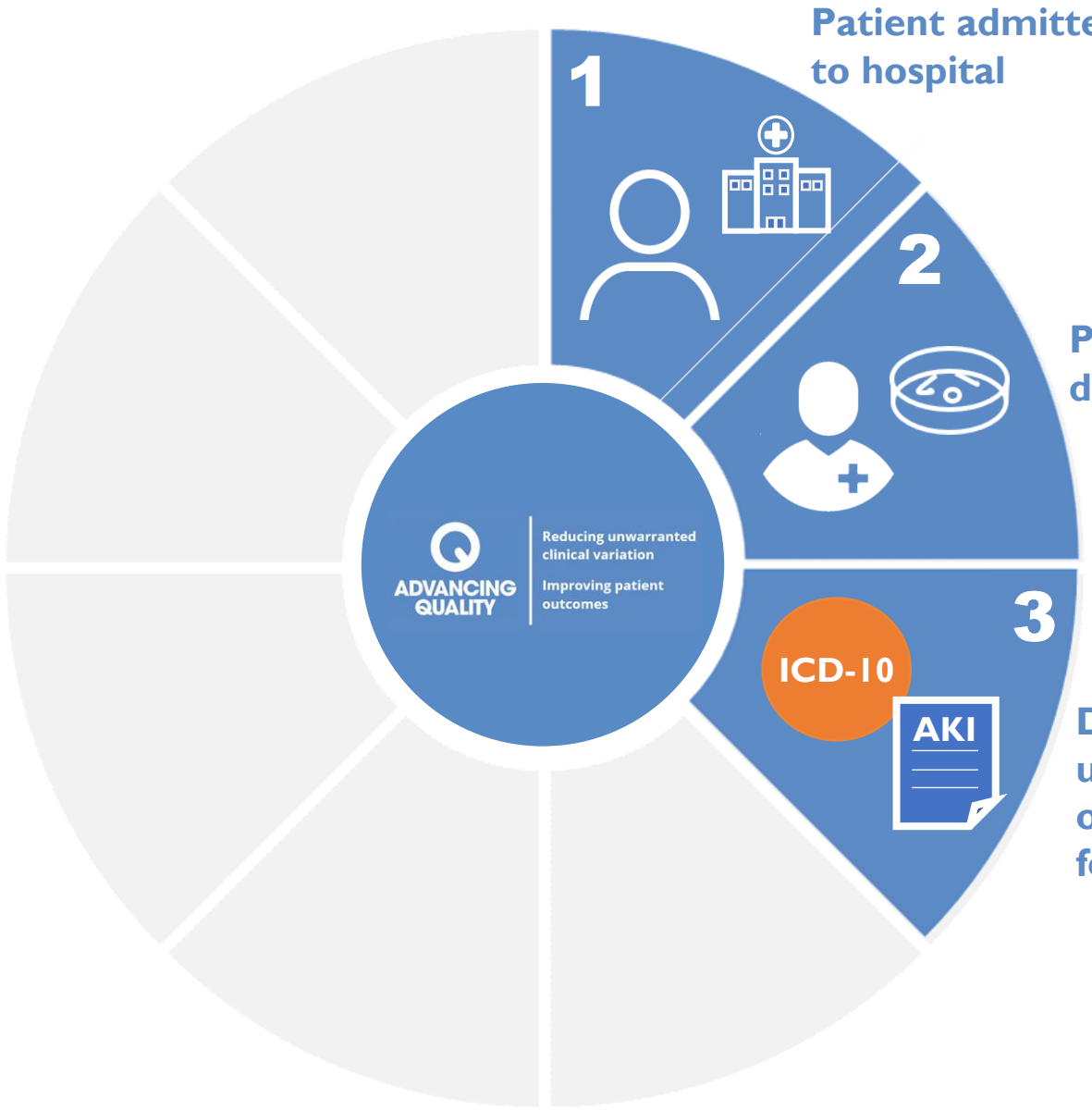

Patient admitted to hospital

Patient diagnosed

Diagnosis recorded using ICD-10 codes or pathology feed for AKI alerts

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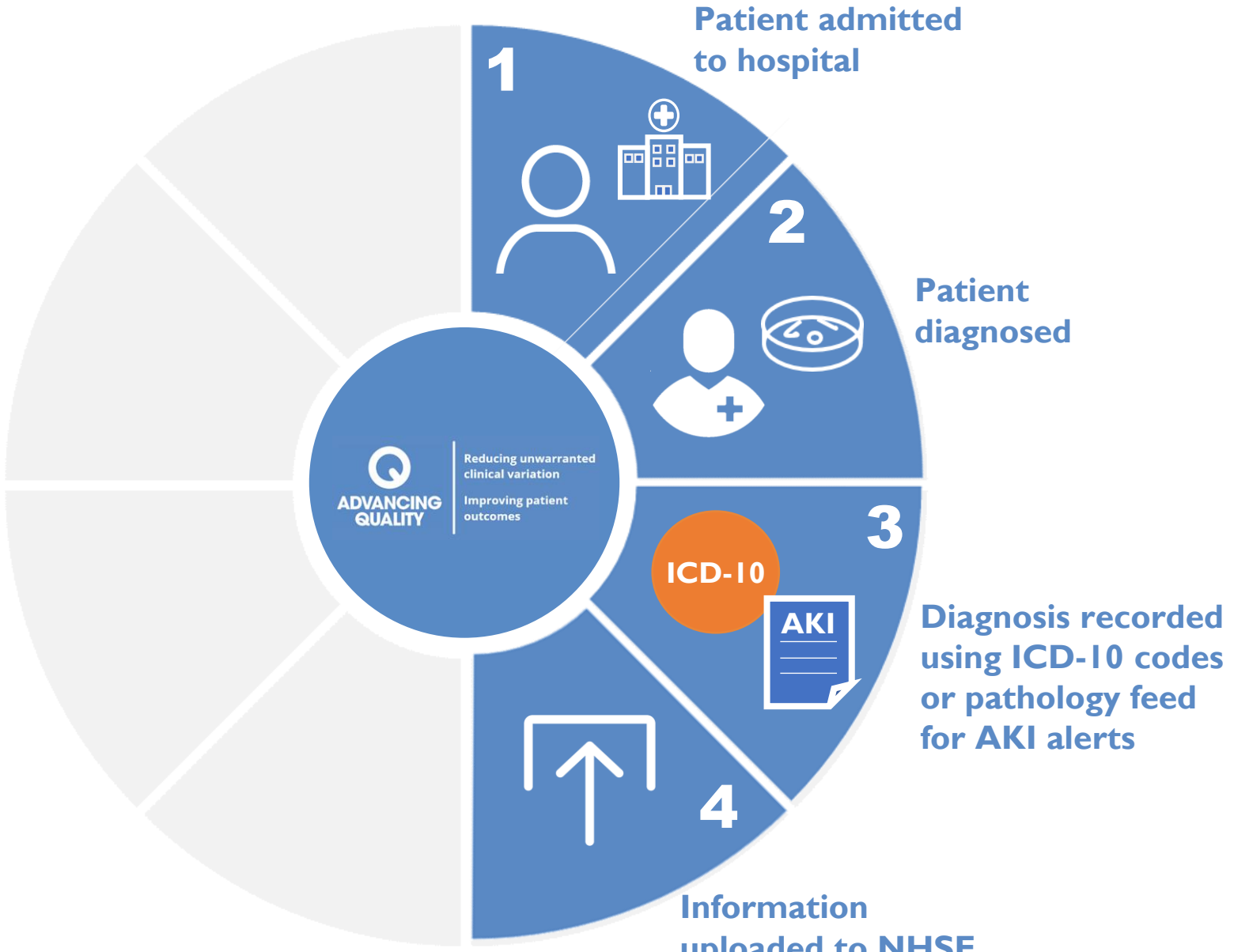

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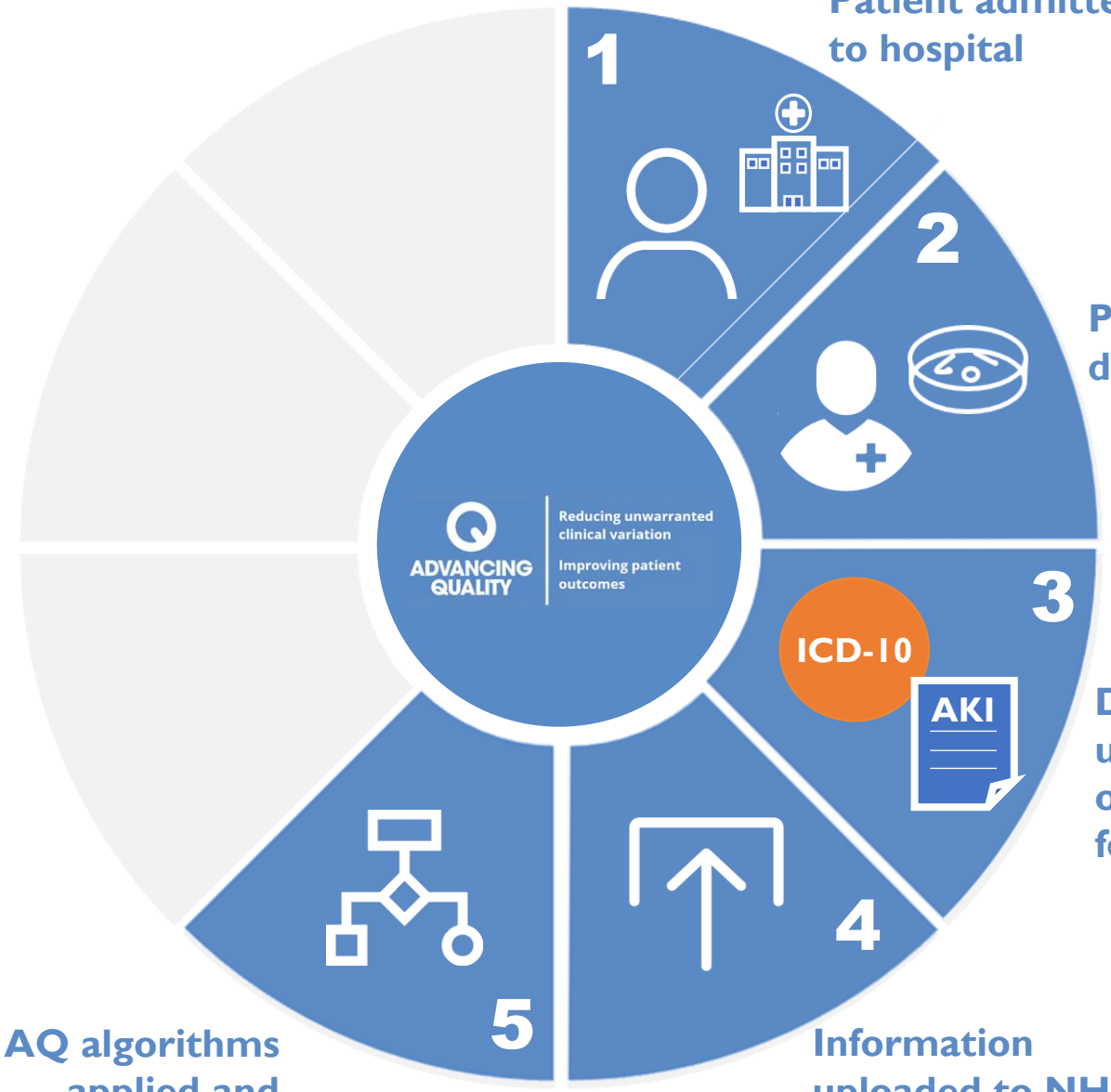

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Information uploaded to NHSE

AQ algorithms applied and populations identified

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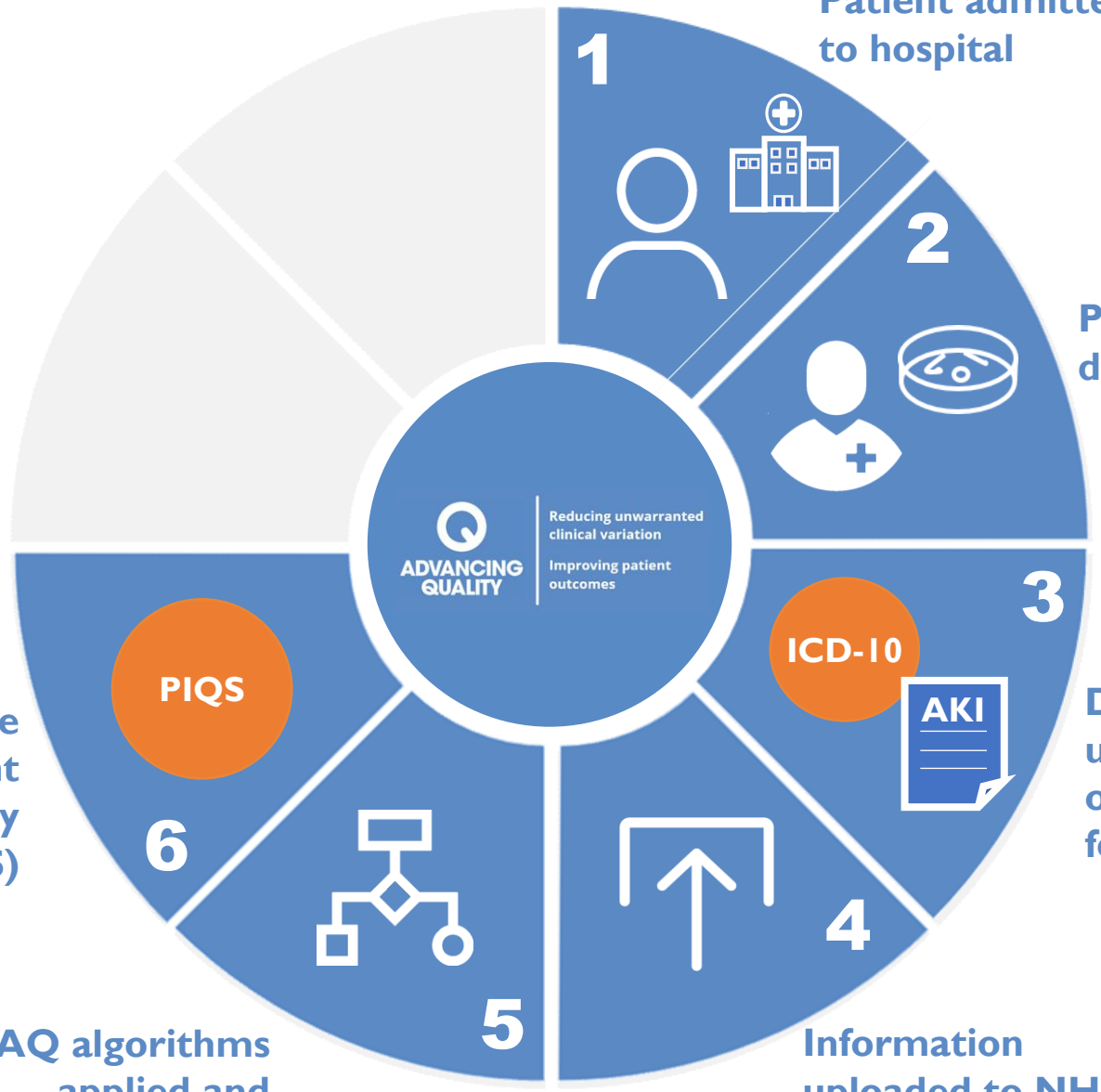

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AQ patient list made available in Patient Intelligence and Quality System (PIQS)

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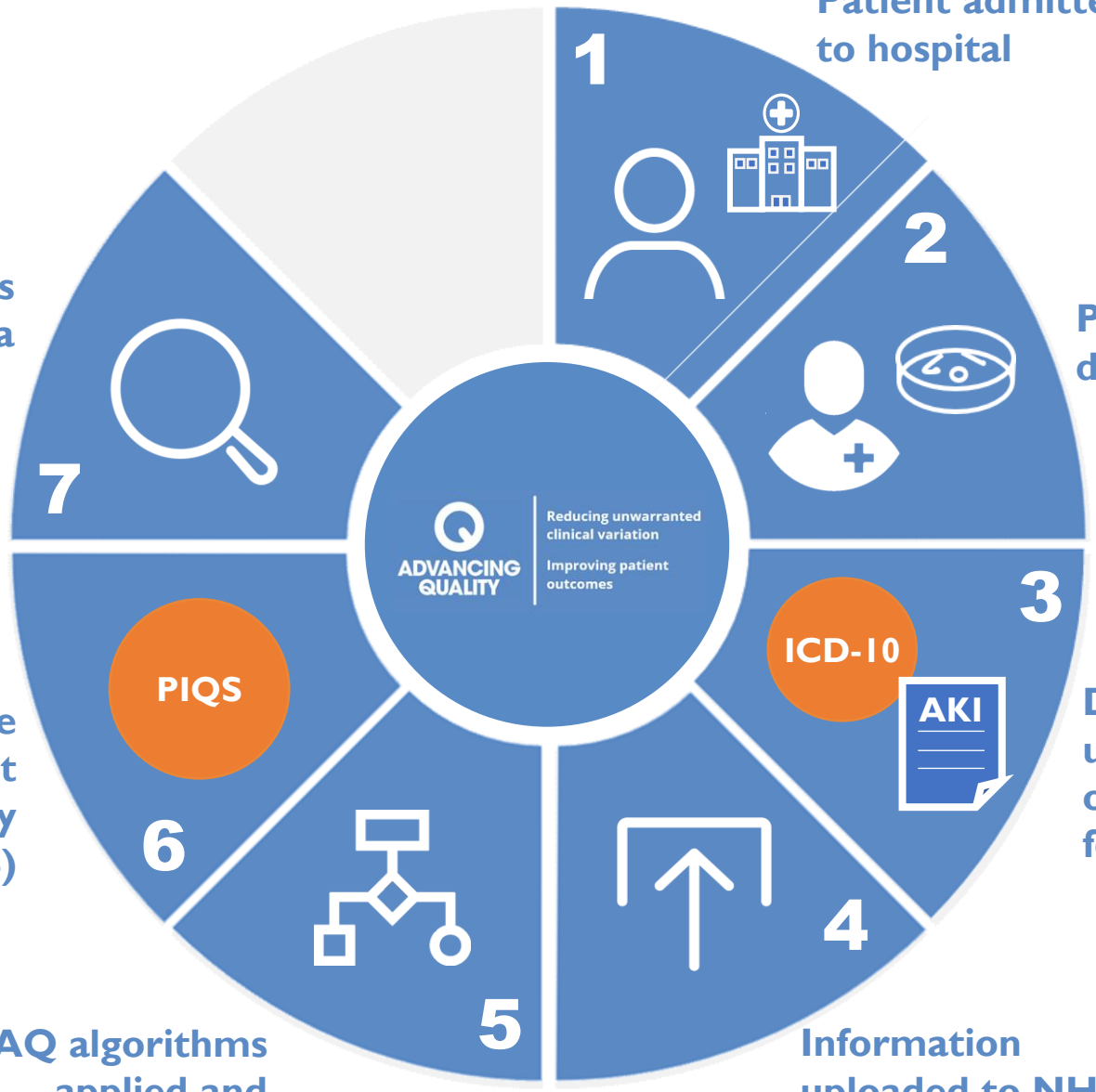

1. Patient admitted to hospital
2. Patient diagnosed
3. Diagnosis recorded using ICD-10 codes or pathology feed for AKI alerts
4. Information uploaded to NHSE
5. AQ algorithms applied and populations identified
6. AQ patient list made available in Patient Intelligence and Quality System (PIQS)
7. Provider data collectors input AQ measure data

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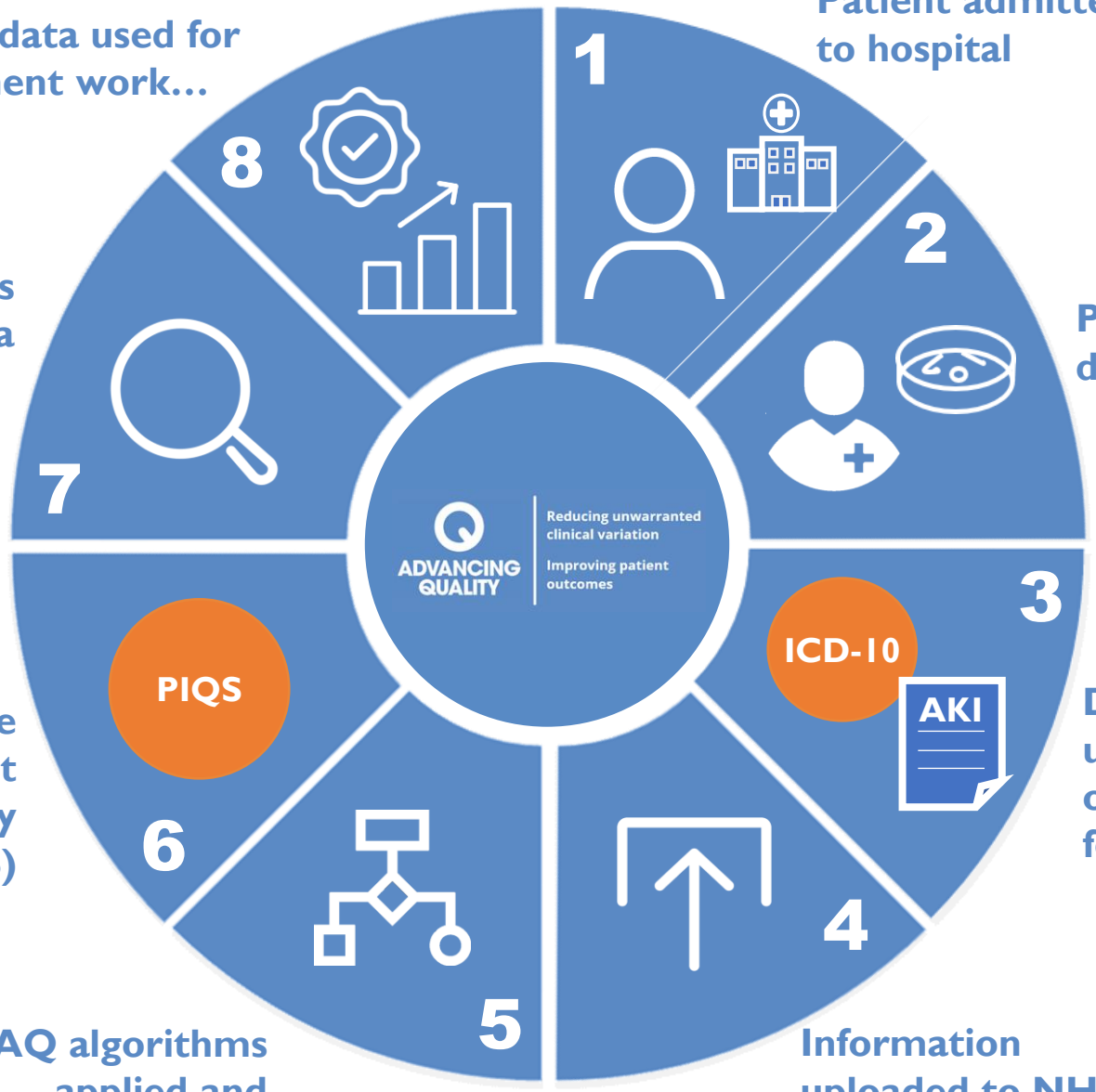

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8 Validated data used for improvement work…

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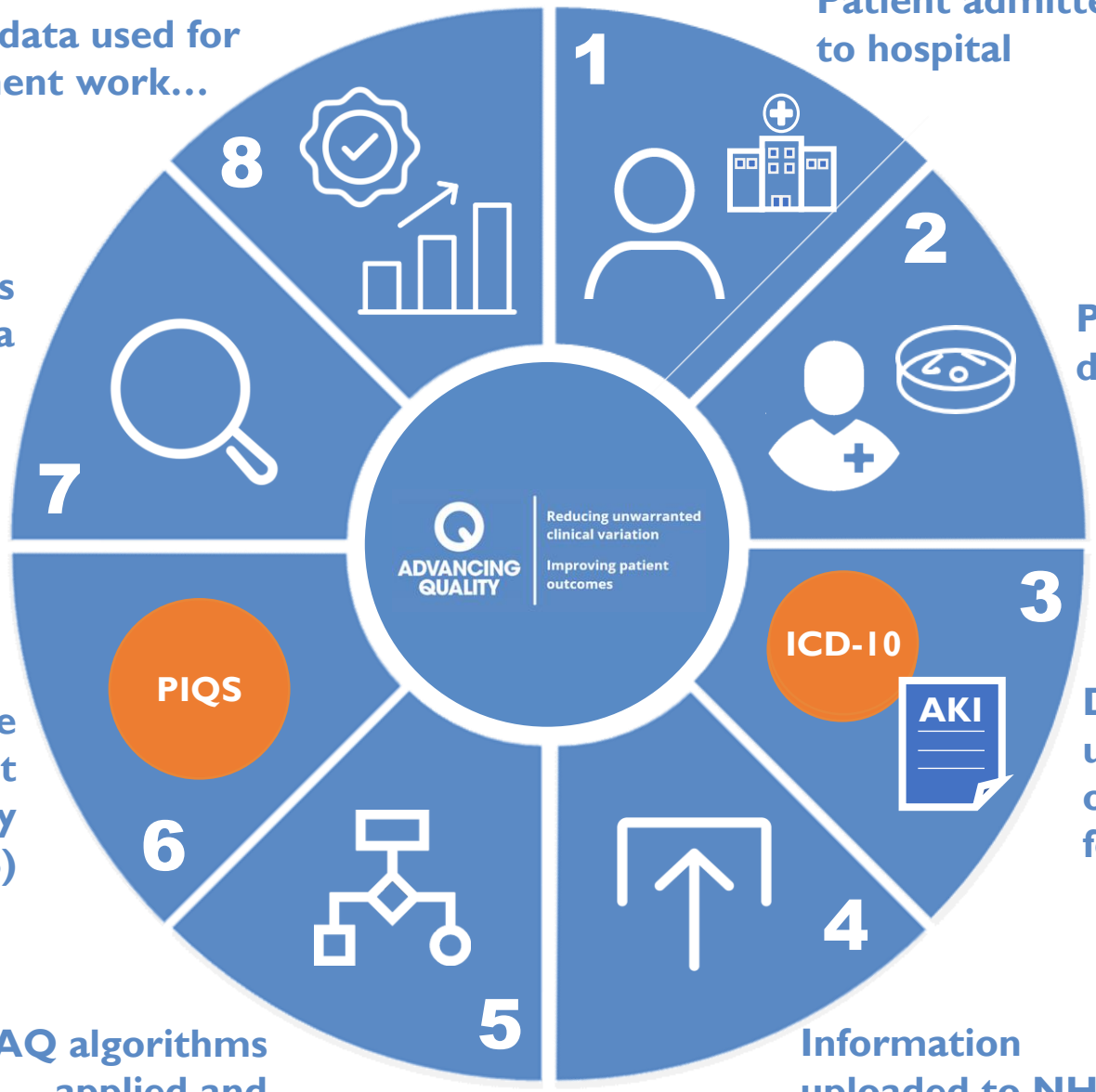
…supporting better care for the patient



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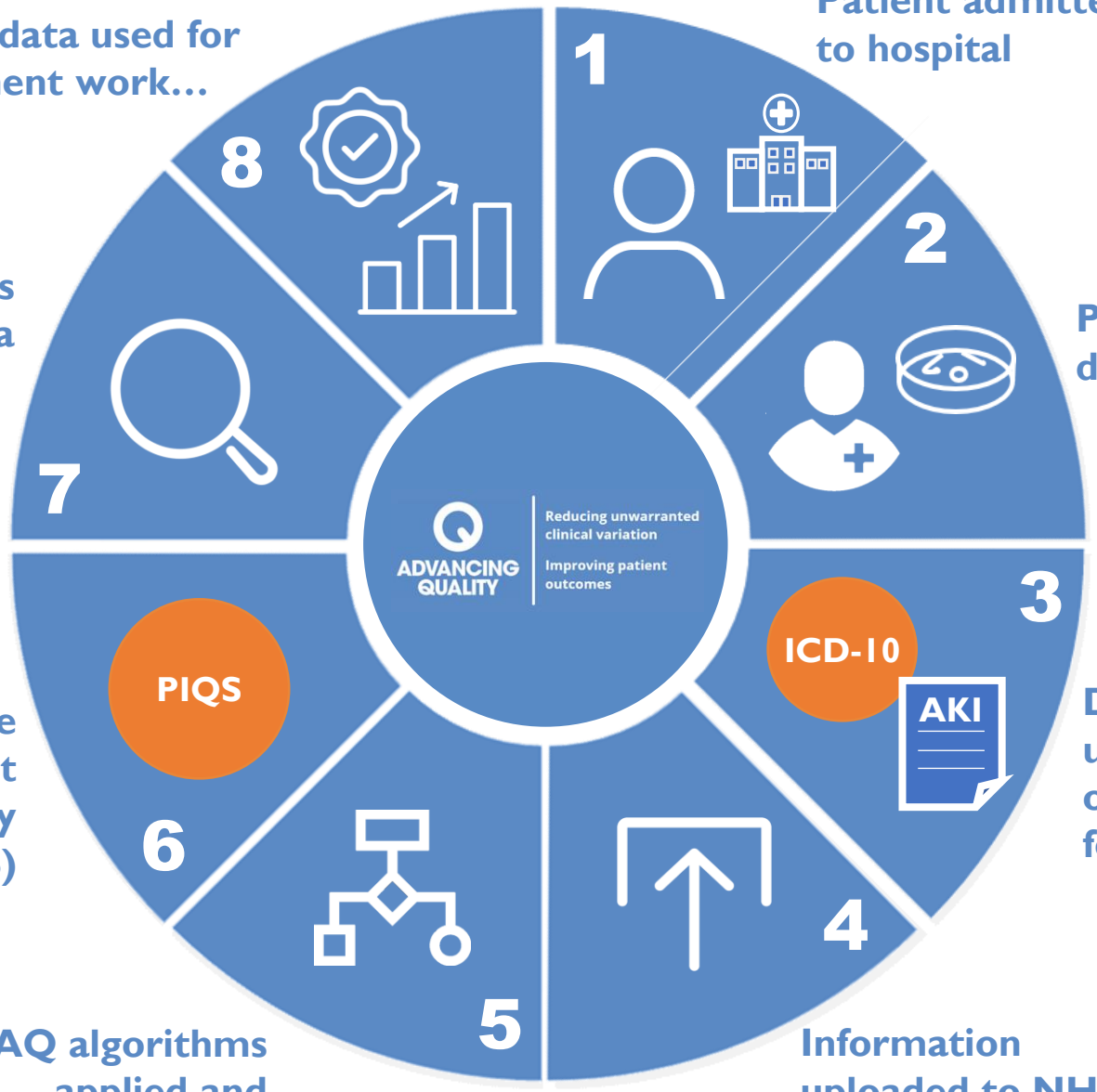
…supporting better care for the patient.

- Monthly reports
- Annual reports
- Bespoke analysis
- Insight reports
- Case studies
- AQ events



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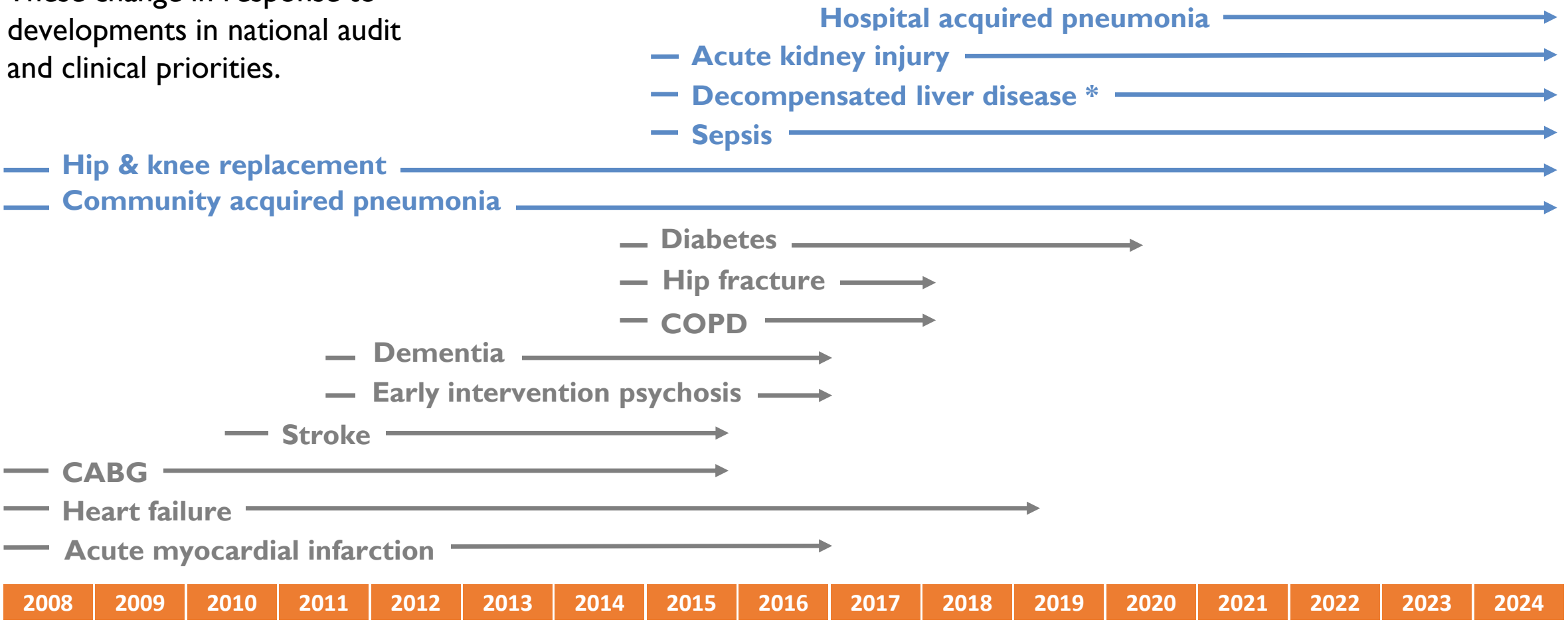
Clinical Focus Areas

These change in response to developments in national audit and clinical priorities.



** formerly alcohol related liver disease*

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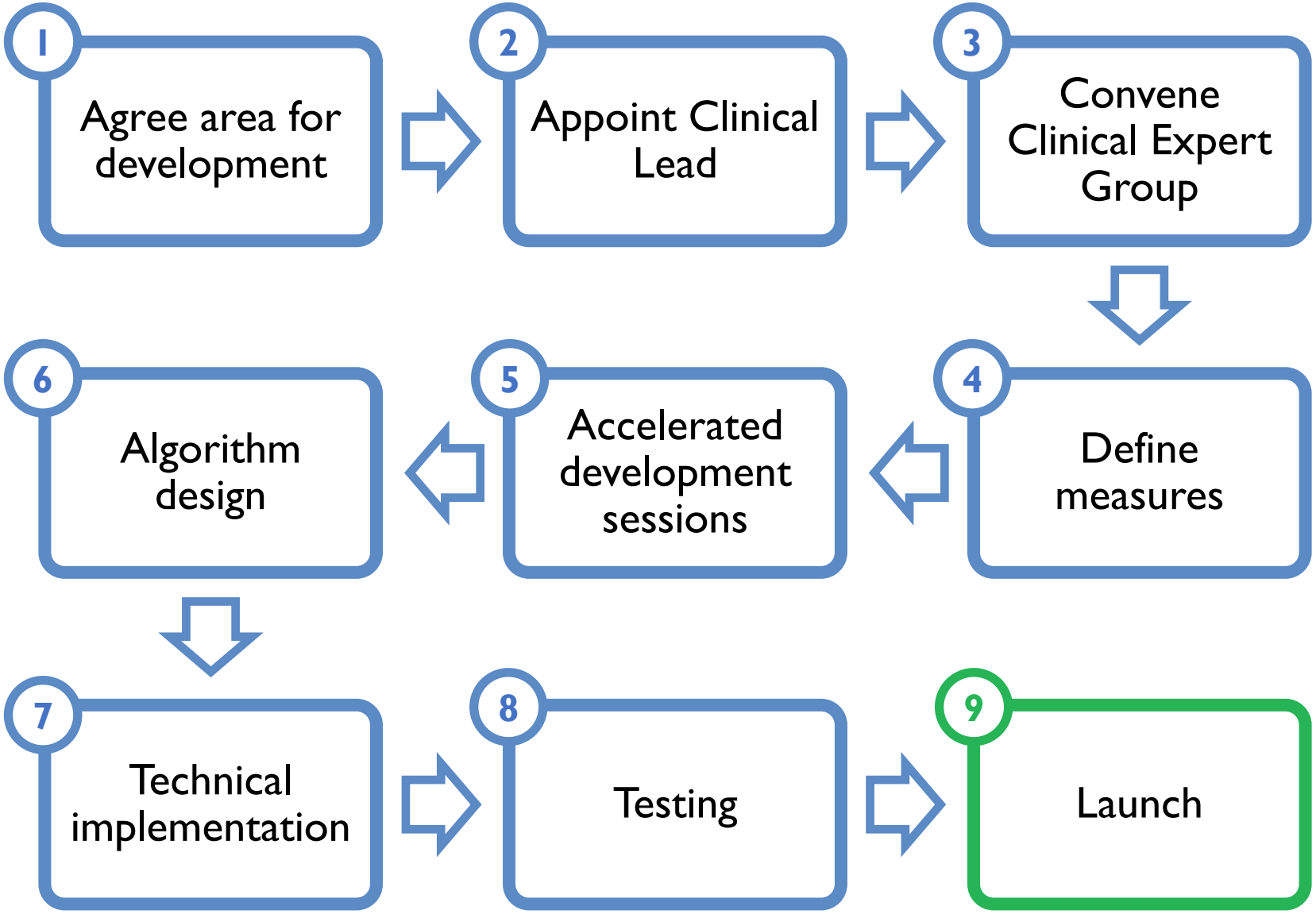
Developing a Measure Set



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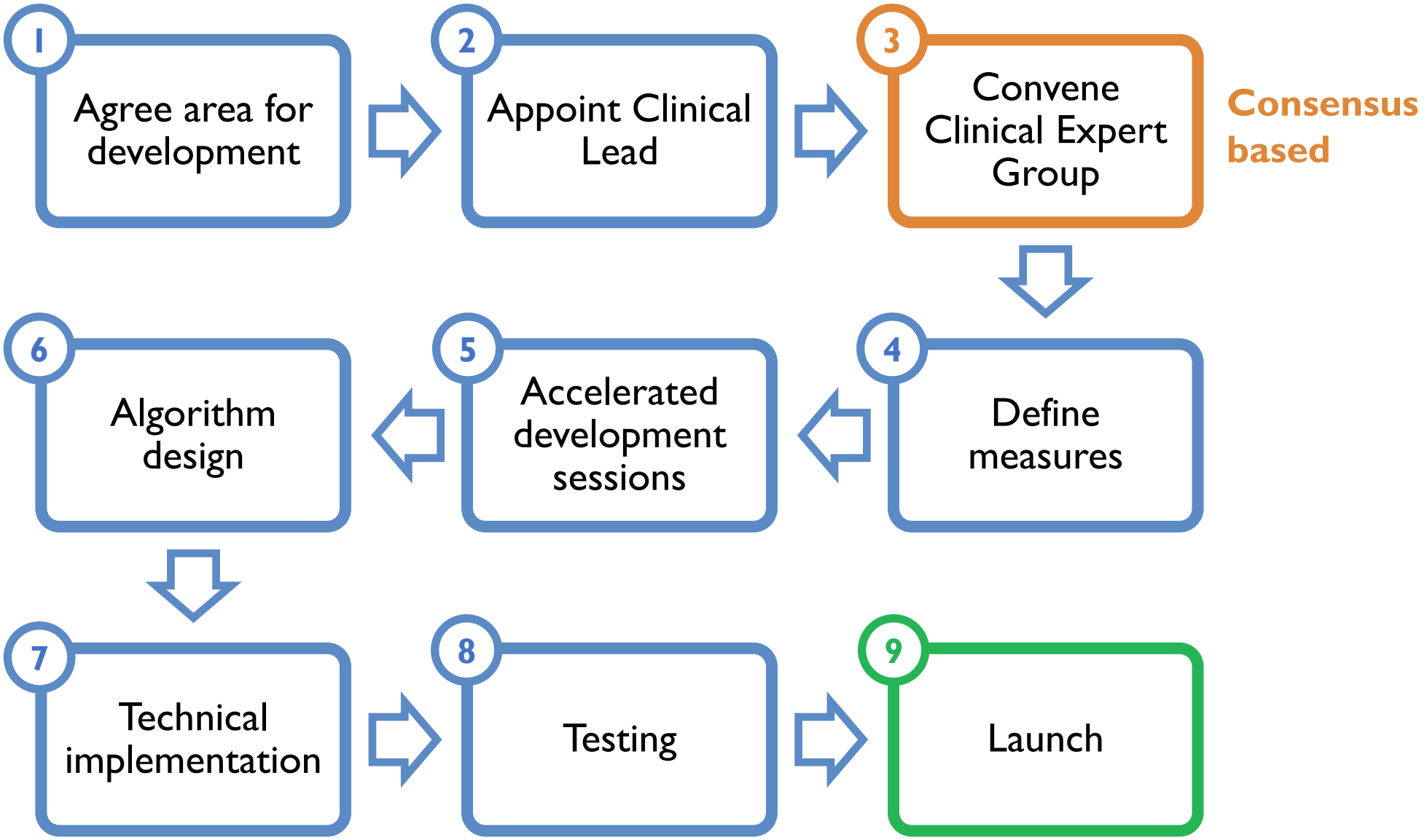

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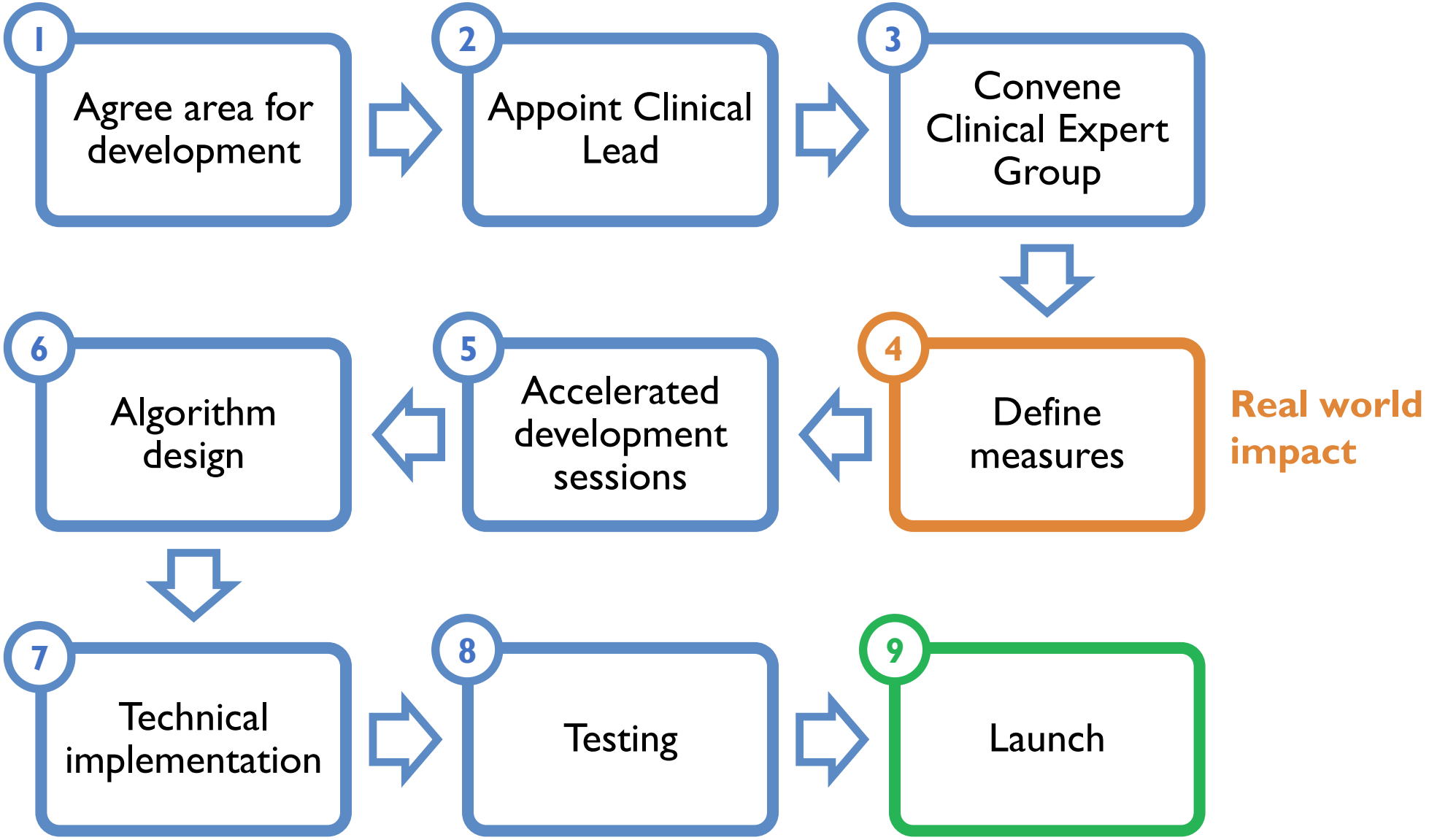

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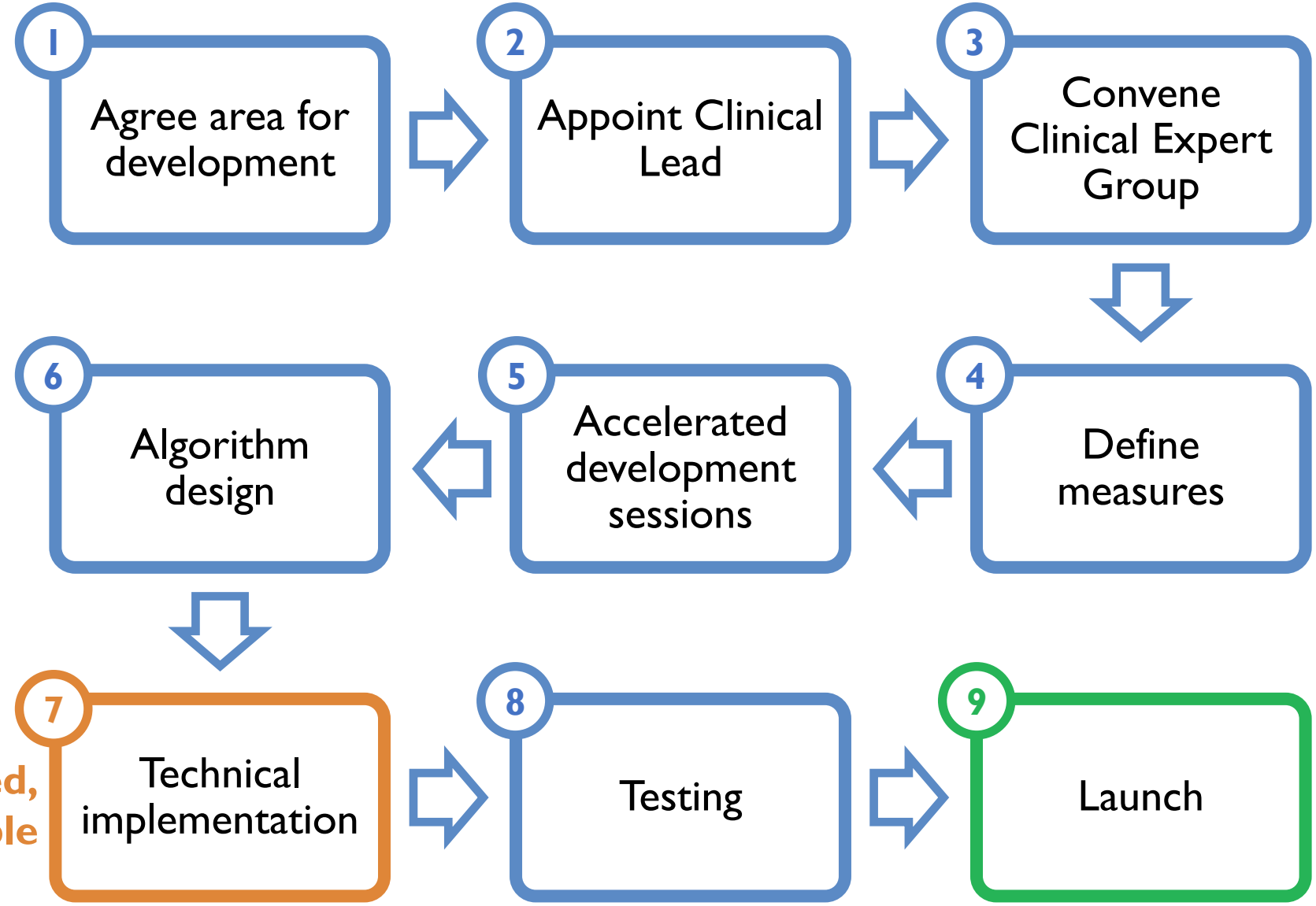
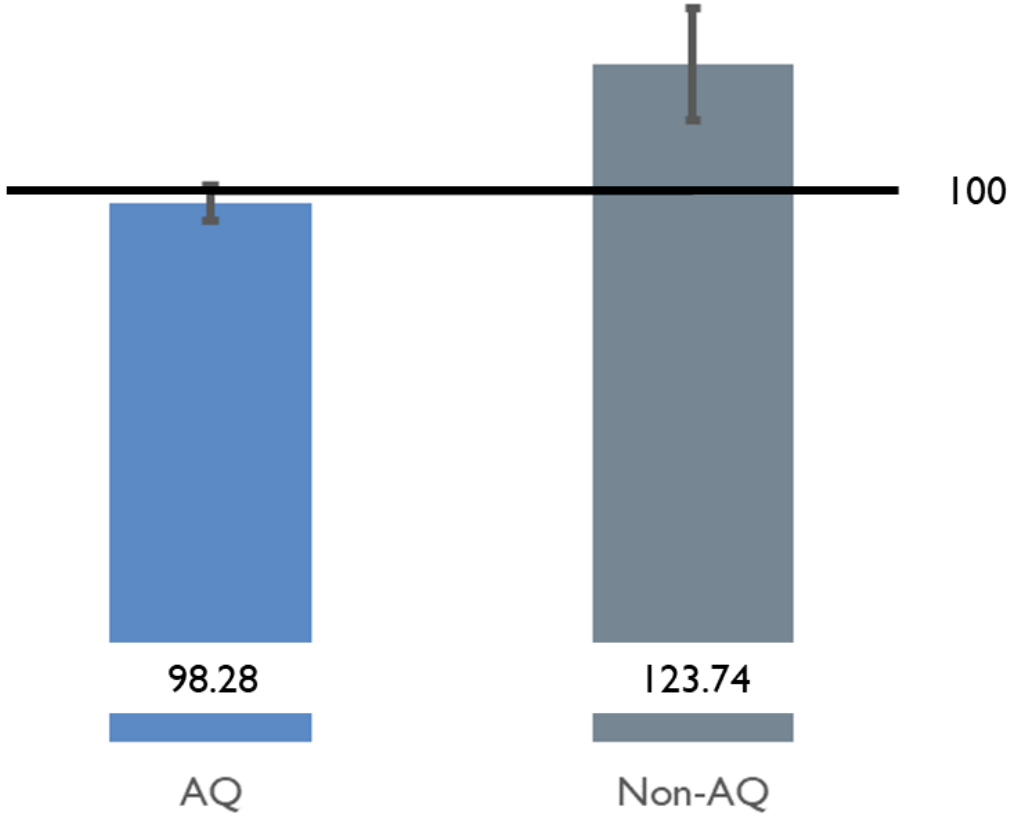
Developing a Measure Set



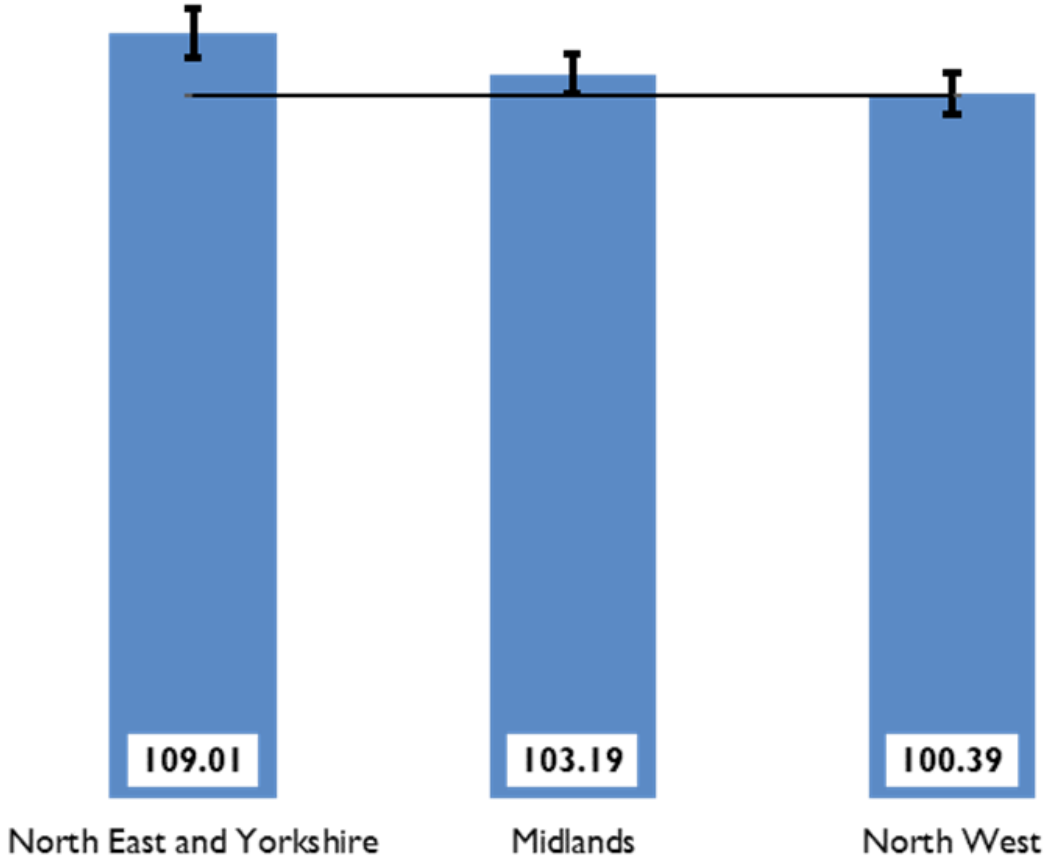
NHS hosted, stable, scalable

Sepsis – Clinically Led Improvement

Hospitals participating in AQ have **statistically significantly lower mortality**



Non-overlapping confidence intervals: a statistically significant difference in risk-adjusted mortality

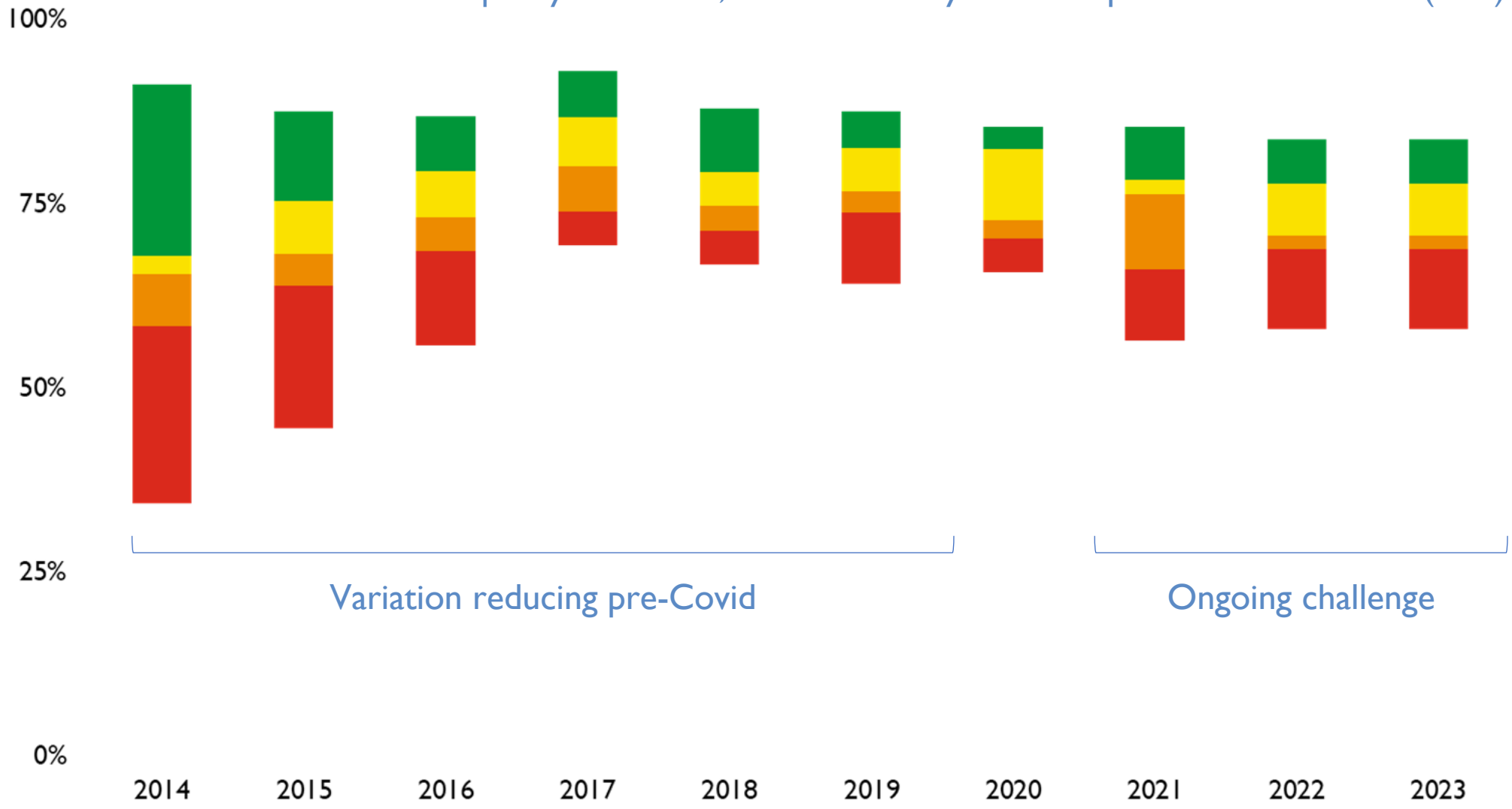


We also see lower mortality in the North West than in the regions next to it

Apr 22 – Mar 23 data

Sepsis – Clinically Led Improvement

This chart shows care quality over time, as measured by our Composite Process Score (CPS)



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New Guidance: Revised Measures in Development

Vital signs	**Vital signs: NEWS-2 'Physiology first'**	0	1-4	5-6	≥7
Initial assessment	**History, examination, lab results**	***If clinical or carer concern, continuing deterioration, surgically remediable sepsis, neutropaenia, or blood gas / lab evidence of organ dysfunction, including elevated serum lactate, upgrade actions at least to next NEWS-2 level →***			
	Comorbid disease, frailty, patient preferences?	*Consider influence of comorbid disease, frailty and ethnicity on NEWS-2, and patient preferences for treatment intensity, limits, end-of-life care*			
Initial (generic) actions	**Monitoring and escalation plan**	Standard observations	• Registered nurse review <1 h • Obs 4-6 hrly if stable. • Escalate if no improvement	• Obs hourly. • Review <1 hr by clinician competent in acute illness assessment • Escalate if no improvement	• Obs every 30 mins. • Review <30 min by clinician competent in acute illness assessment. • Senior doctor review <1 hr if no improvement: refer to Outreach or ICU
	Initial treatment of precipitating condition	Standard care	<6 hr	<3 hr	<1 hr
Likelihood of infection & specific actions	Unlikely	Standard care	Review daily and reconsider infection if diagnosis remains uncertain		
	Possible	Review at least daily	**< 6 h** • Source identification & control plan documented.	**< 3 h:** • Microbiology tests • Antimicrobials: administer or revise • Source identification & control plan documented. **< 6h** • Source control initiated **48 – 72 h** • Review antimicrobials with ID/micro/senior clinician	**< 1 h:** • Microbiology tests • Antimicrobials: administer or revise (broad-spectrum if causative organism uncertain). **< 3 h** • Source identification **3-6 h** • Source control initiated according to clinical urgency **48 – 72 h:** • Review antimicrobials with ID/micro/senior clinician
	Probable or definite	**< 6 h** • Diagnostic tests & R plan	**< 6 h** • Microbiology tests • Antimicrobials: administer or revise • Source identification & control plan. • D/w ID/micro if uncertain, & review		

Figure 1: Clinical Decision Support framework for initial evaluation of sepsis in adults ≥16 years

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AKI – Clinically Led Improvement

	AQ perfect care	Care bundle elements missed
Total patients	3479	7644
Male	2036 (58.5%)	4344 (56.8%)
IMD quintile 1	870 (25.0%)	1644 (21.5%)
Mean age	68.9 years	70.5 years
Charlson 3+	1496 (43.0%)	3546 (46.4%)
Median length of stay (days)	11	12
Mean length of stay (days)	17.83 (17.15 – 18.52 95% CI)	19.15 (18.63 - 19.67 95% CI)

An opportunity to save **10,000 bed days** in North West England every year

Potential to **save over £6 million** per year by delivering high-quality care

Jan 17 – Mar 22 data

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Pneumonia – Clinically Led Improvement

	Included after validation	Excluded after validation
Total	3823	2304
Mean age	73.7	73.8
Died in hospital	581 (15.2%)	549 (23.8%)
Alive at discharge	3243	1755
Emergency 30-day readmission	533 (16.4%)	305 (17.3%)
Median length of stay	6 days	7 days

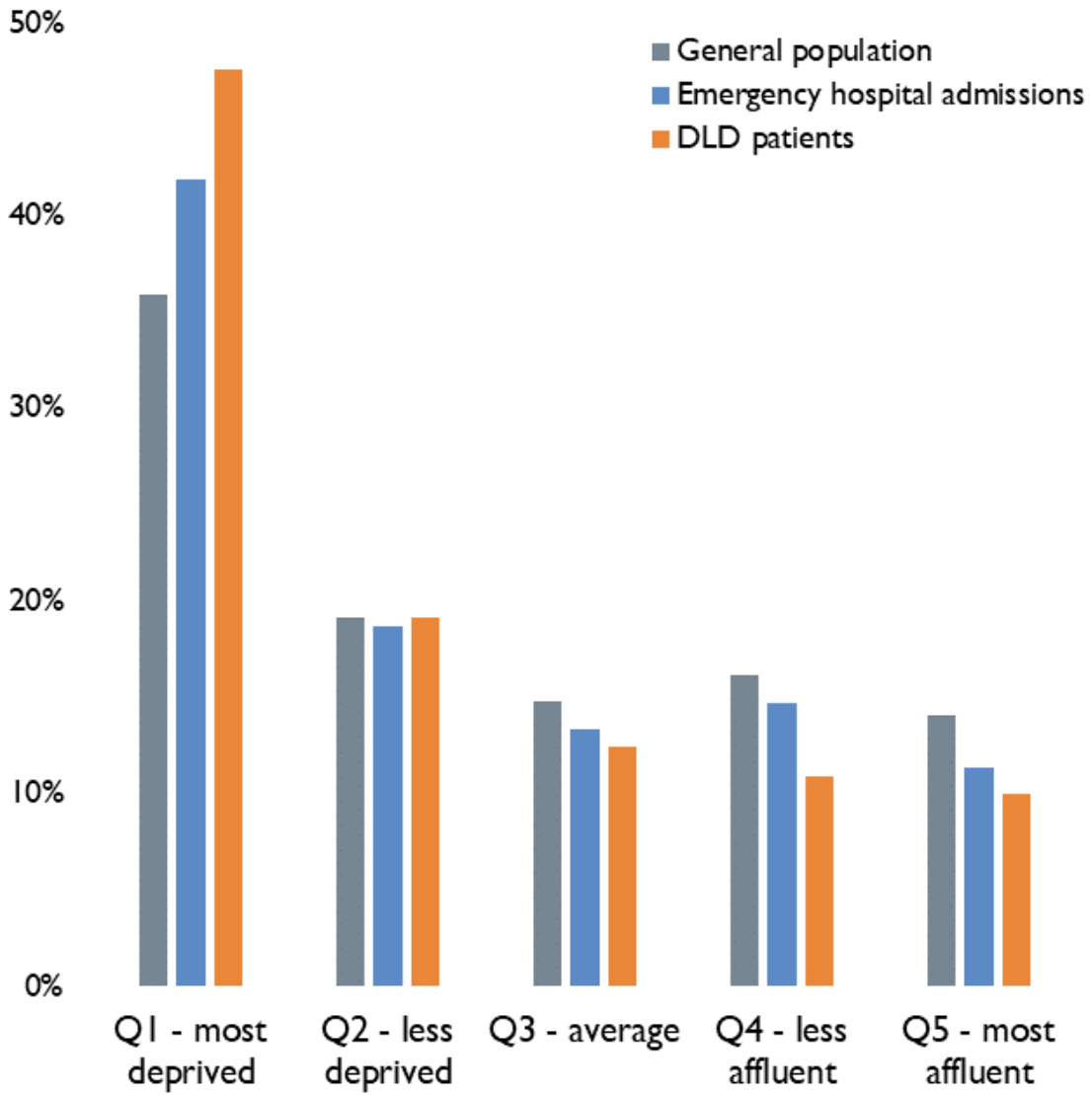
Apr 22 – Mar 23 data, NW England

In community-acquired pneumonia (CAP),

40% of patients are misdiagnosed

DLD – Clinically Led Improvement

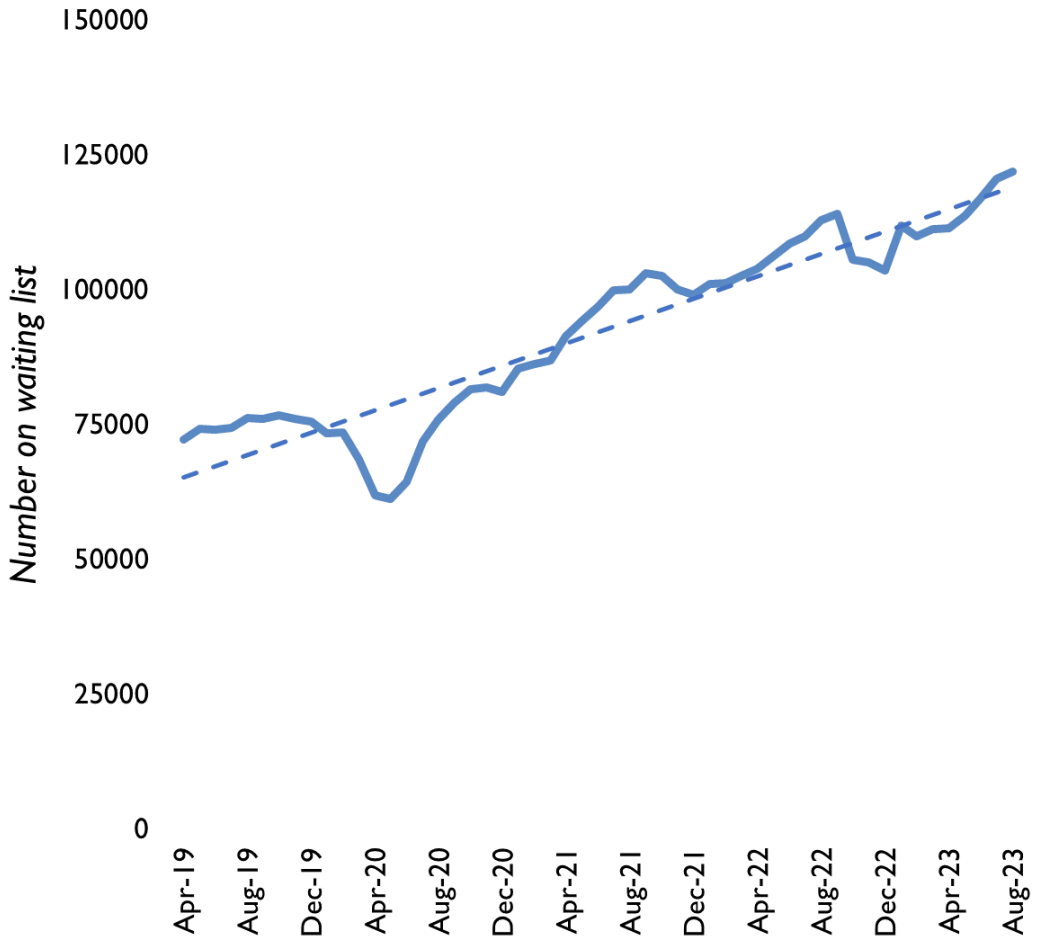
More deprivation in Decompensated Liver Disease (DLD) than general population and emergency admissions



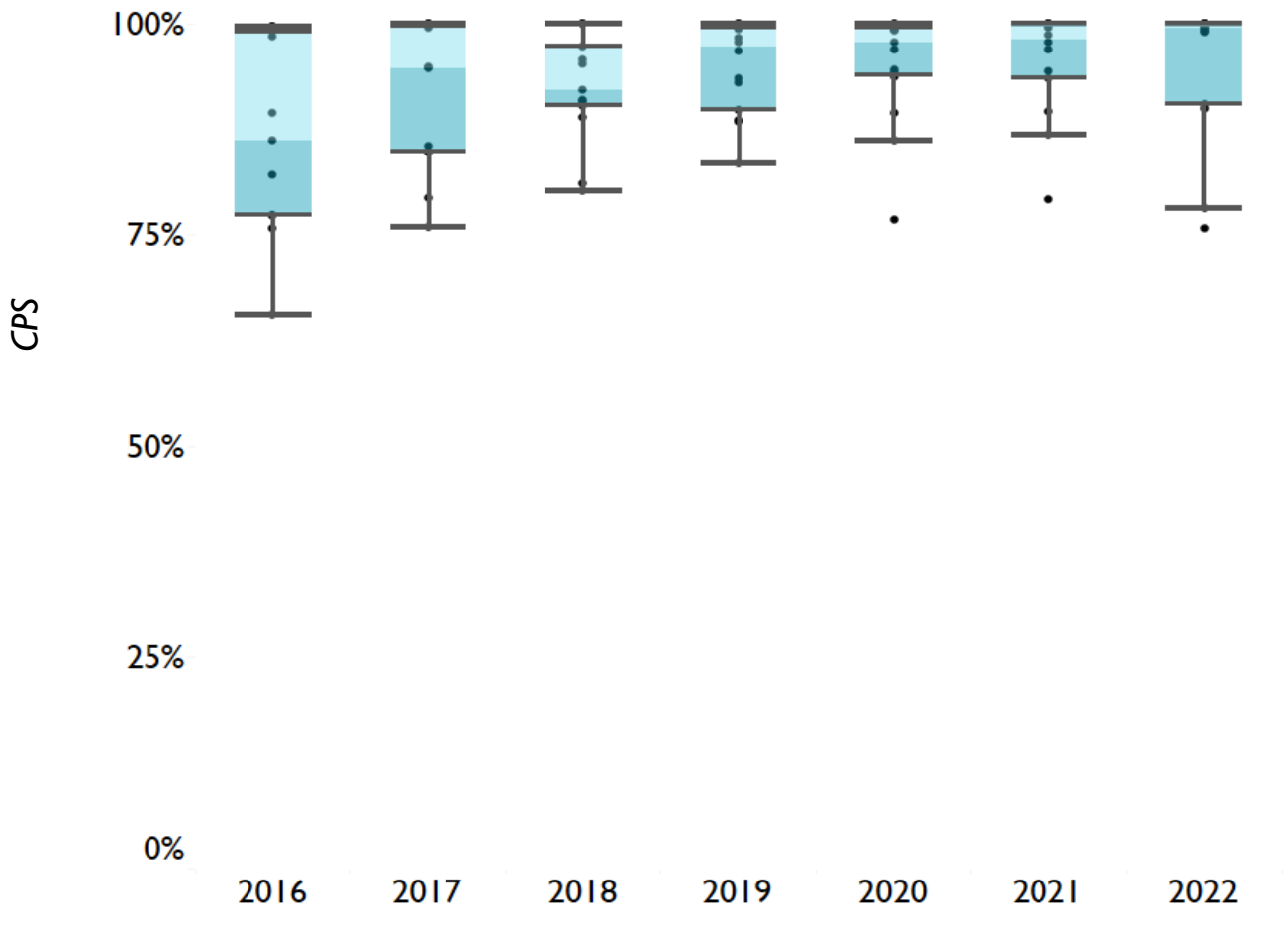
On average, a DLD patient has **4 hospital admissions per year**

Apr 22 – Mar 23 data, NW England

Hip & Knee – Clinically Led Improvement

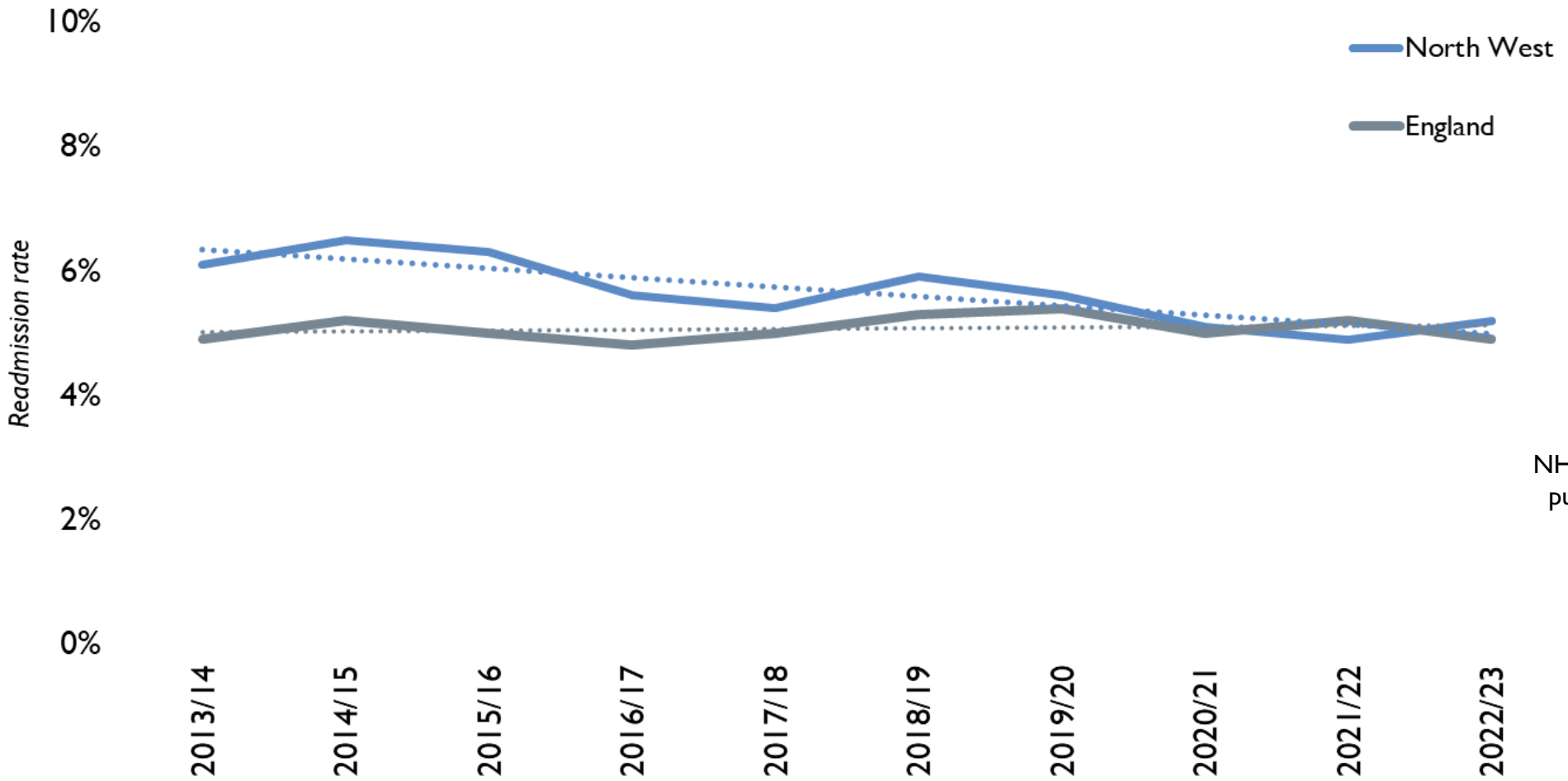


Trauma & Orthopaedics waiting list in NW England over time: continues to trend upwards



Box and whisker plot showing Composite Process Score (CPS) over time. Performance improving, variation narrowing.

Hip & Knee – Clinically Led Improvement



NHSE data on hip replacements, published 28th November 2023

Readmission rates have fallen in the North West, against the national trend

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What Next?

1

Gain Consensus on Care Standards

What does good look like?

Measure sets for clinical focus areas aligned to national guidelines; involvement of clinical experts and regional networks

2

Identify Unwarranted Variation

Where do we need to improve?

Monthly data collection; regular reporting at team, organisation and system level; regional insight reporting

3

Improve Quality of Care

How do we improve?

Bespoke improvement support and improvement plans; consultancy work to support improvement; implementation framework

4

Learn and Share Best Practice

What has worked?

Case studies and papers; collaborative events; virtual learning platform; resource repository and networking

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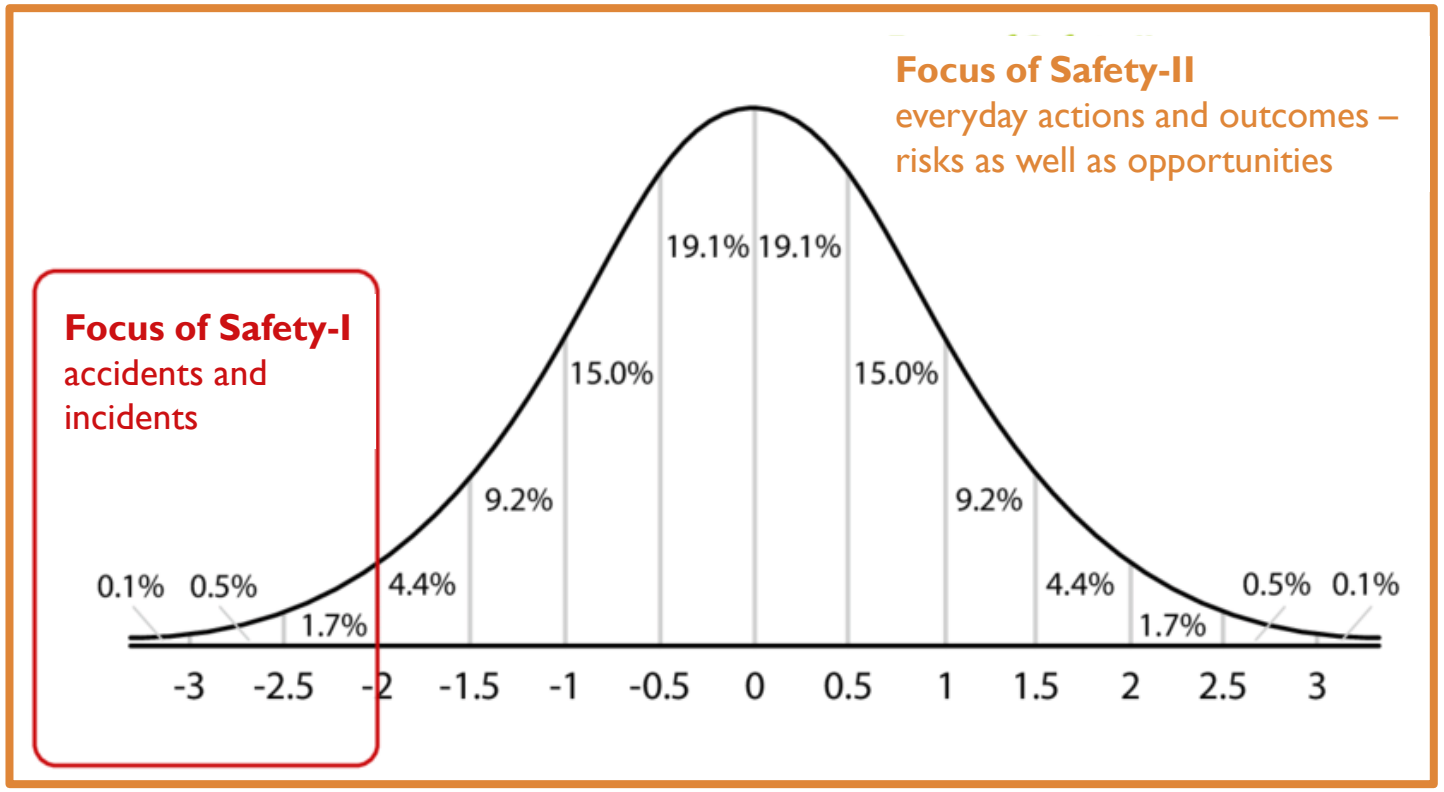
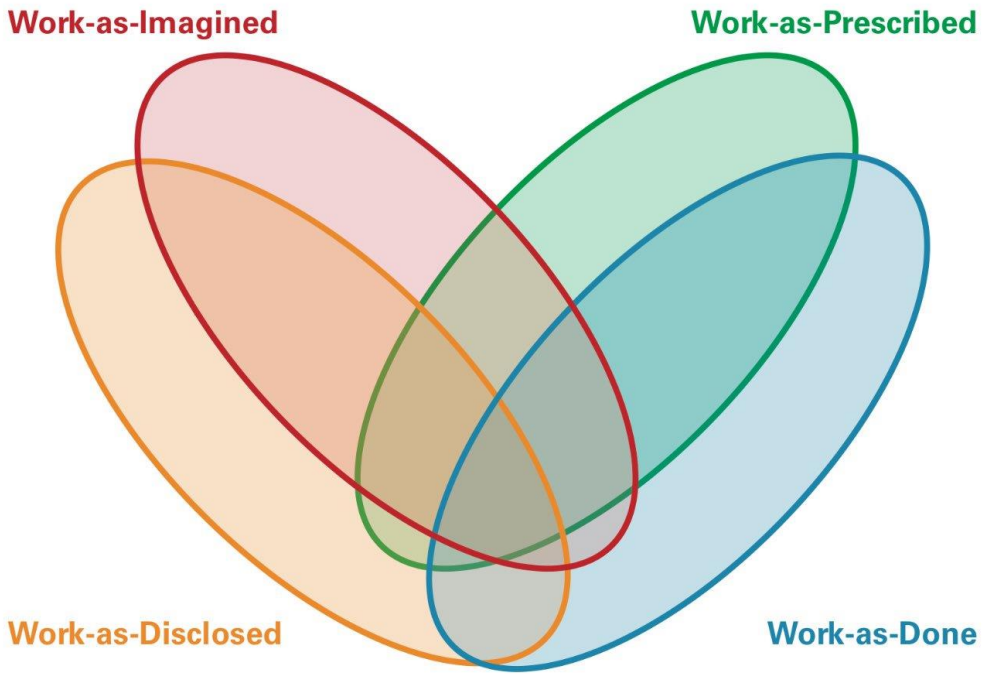
Patient Safety isn't Just About Incidents - We Need to Design for Safety, not Just Address Harm





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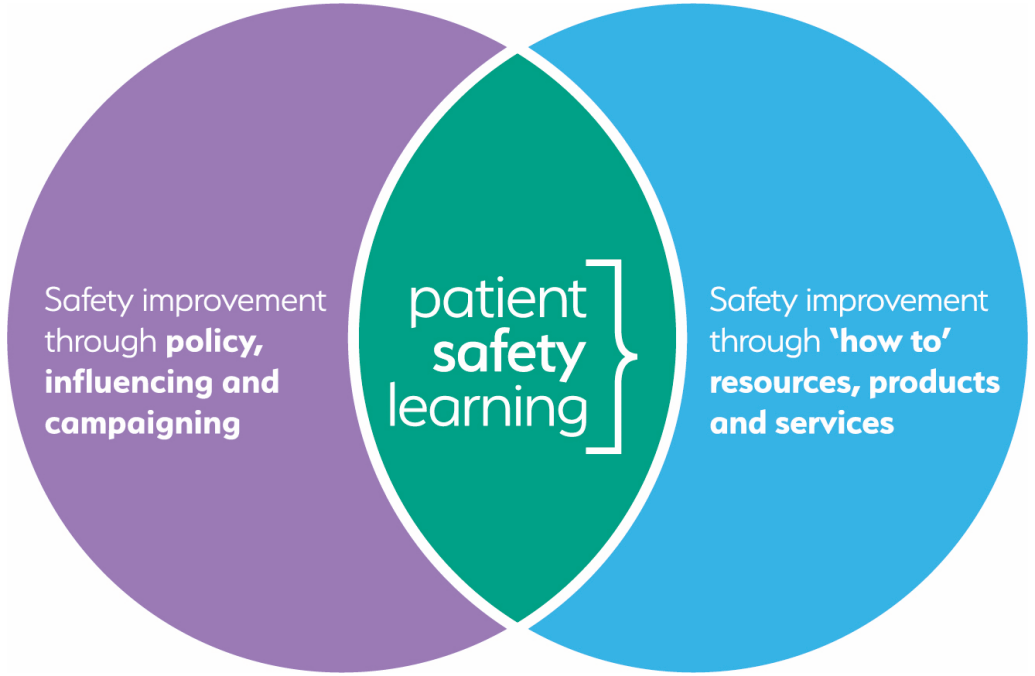
Patient Safety Learning

- Founded 2018
- A charity and independent voice for patient safety
- Listening, learning & promoting the voice of the 'patient safety front line'
- Mission & Purpose
  - To transform how health & social care organisations think & act in regard to patient safety
  - Patient safety as a core purpose



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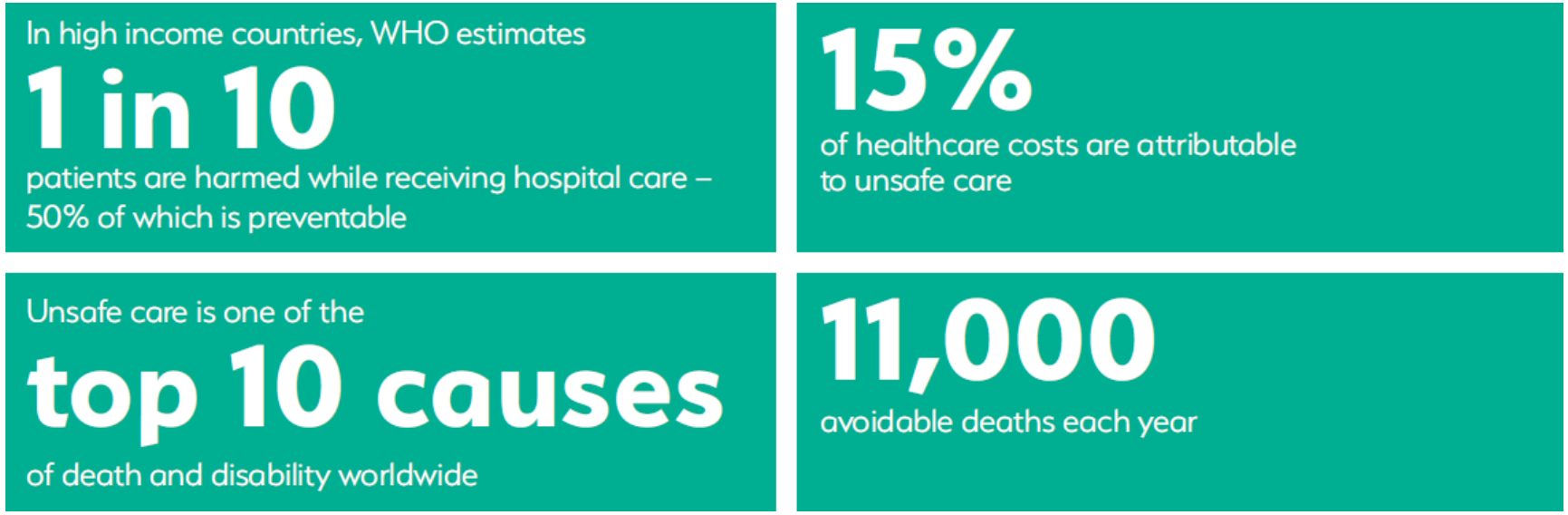
Scale & Impact of Avoidable Harm in Healthcare



- Patients assume patient safety is a priority until they experience avoidable harm
- Despite the efforts & good work of many, the scale of unsafe care is increasing
- HSJ analysis of NHS data: 30k excess deaths a year in ED (Nov 2023)
- RCEM estimated at least 250 excess deaths per week (April 2024)

Have we normalised an unsafe system?

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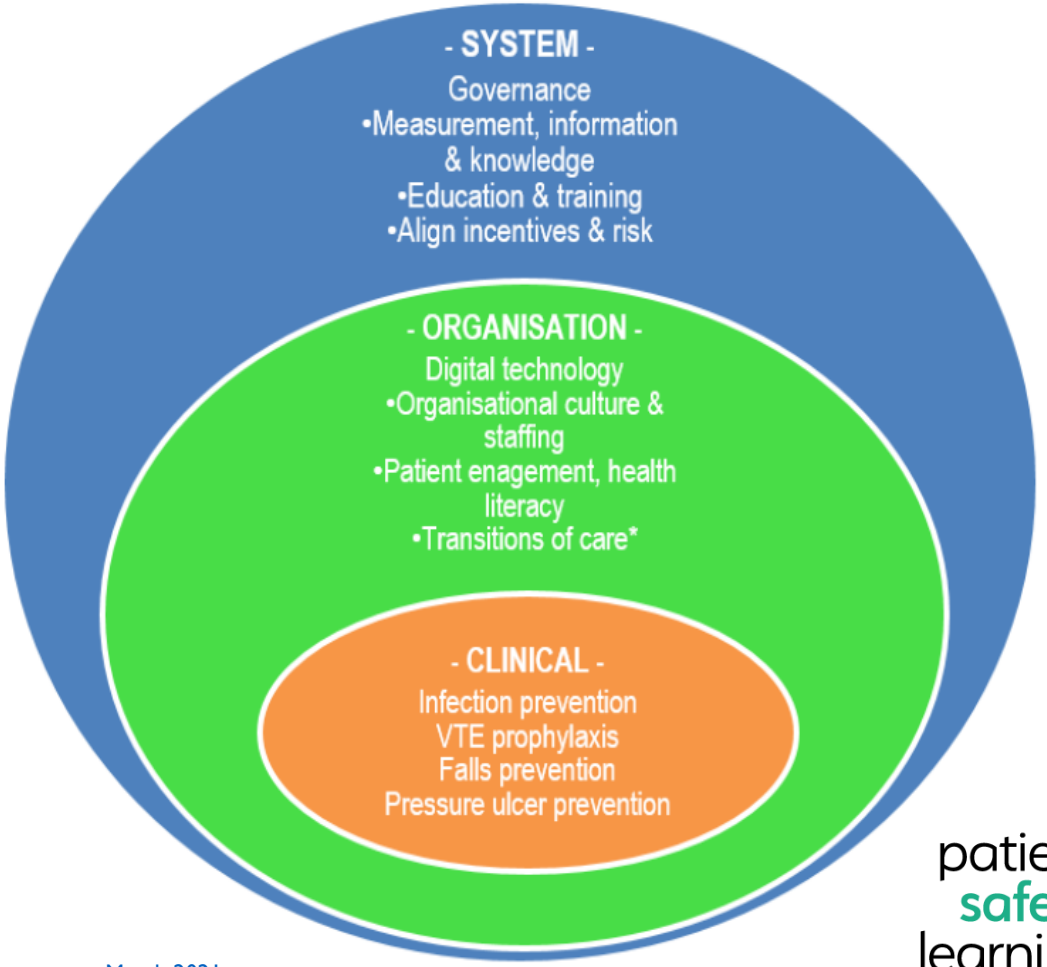
OECD Report on the Economics of Patient Safety

- 40% patient safety issues in primary care
- Patient safety burden
  - More than 7 million hospital admissions every year
  - At least 6% of all hospital beds
  - $384 billion cost to the global economy in 2022, G20

Figure A. Clinical- organisational- and system-level strategies can deliver ROI and value when implemented in concert



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OECD, The Economics of patient safety: From analysis to action, October 2020
and G20 Health and Development Partnership, The Overlooked Pandemic: How to transform patient safety and save healthcare systems, March 2021.

We need an Organisational & System Framework to Ensure Patient Safety is a Core Purpose

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Baseline assessment & strategy

Assess patient safety strengths & weaknesses: gap analysis

Inform PS strategy vision & goals

drives

Delivery & implementation

Safety improvement interventions & programmes

Measurement & outcomes focus for impact

We need a holistic systems approach that integrates organisational & clinical leadership, culture, staff & patient engagement

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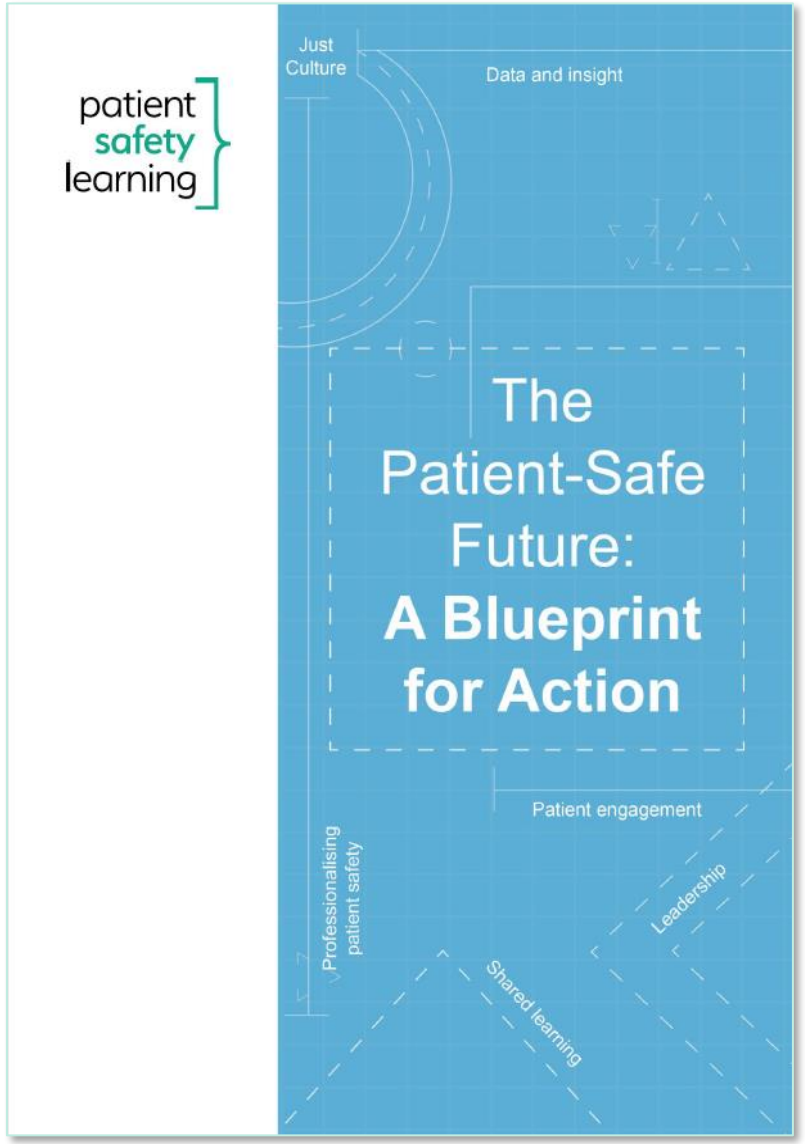
Why Does Avoidable Harm Persist?

- Safety is one priority of many
- Few safety standards
- Not designing safety systems
- Blame culture & fear
- Patients not engaged
- Lack of leadership
- Failure to learn & act

- **Healthcare needs to operate as an effective safety management system: safety as a core purpose**
- **Safety should not be subsumed by 'Quality'**



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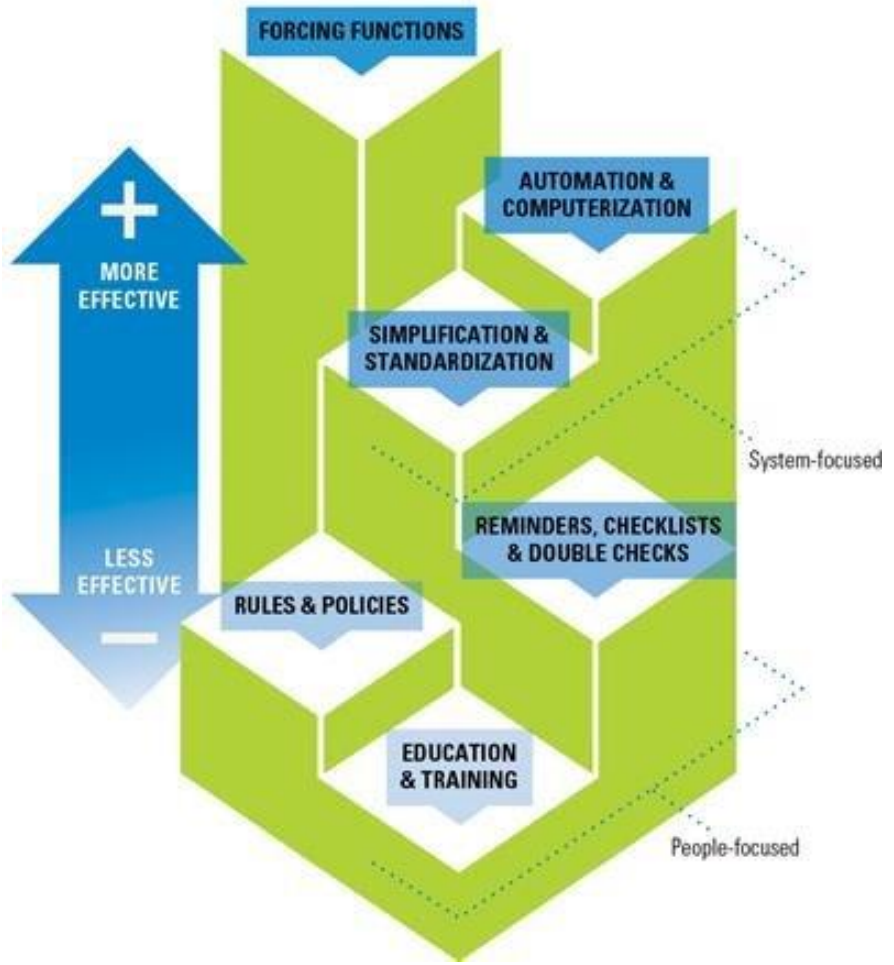
Hierarchy of Improvement Intervention Effectiveness

Most effective: system-focused

- Prevent the error
- Automation & computerisation
- Standardised based on good practice

Least effective: people-focused

- Reminders & double checks
- Rules & policies
- Education & training



- **Need to move from people-focused to system-focused interventions**
- **Alignment with NHS Impact & Quality Management Systems**

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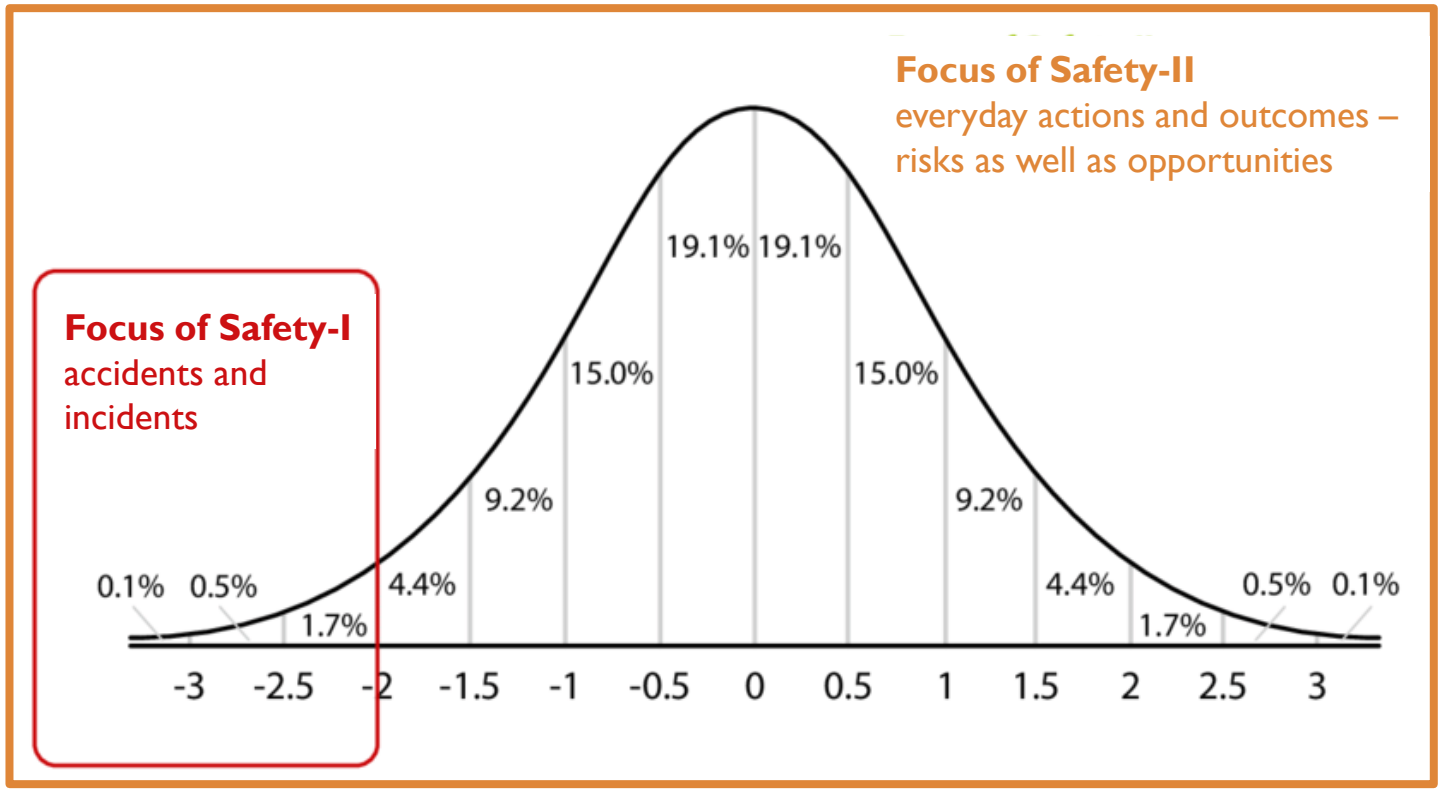
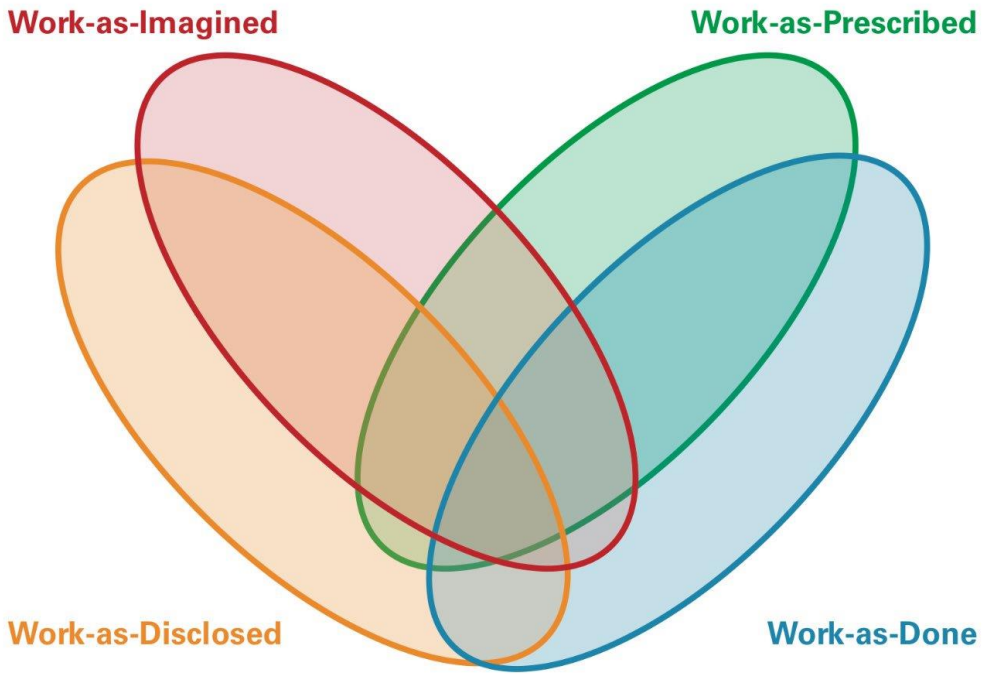
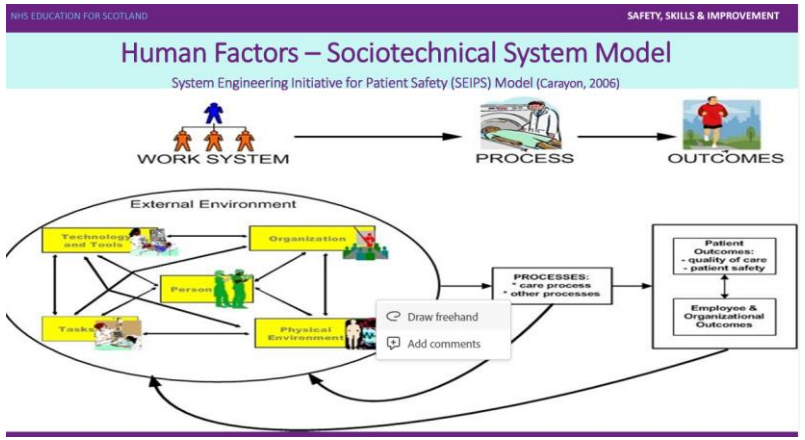
Patient Safety isn't Just About Incidents - We Need to Design for Safety, not Just Address Harm

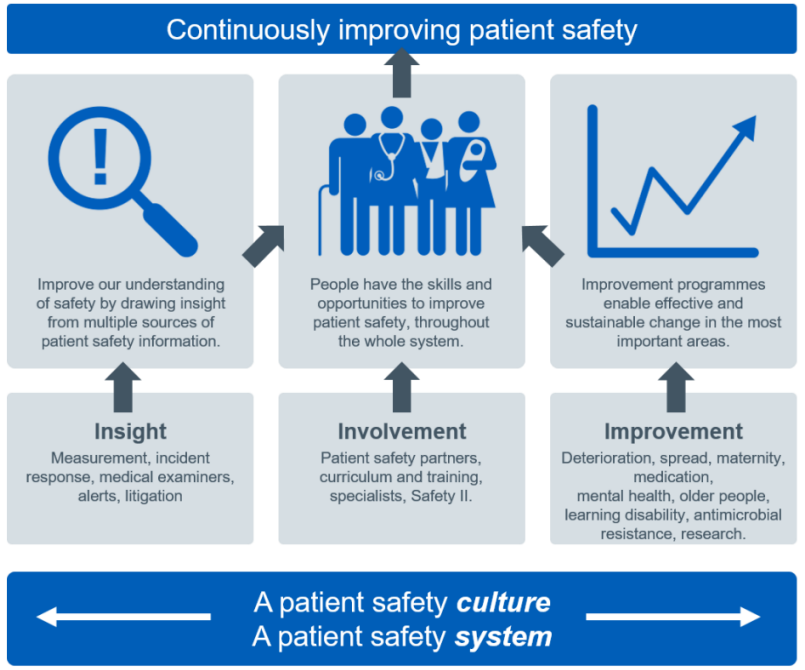




In Practice: NHS Priorities

- PSIRF: replacing the SI framework
  - Understand the factors that have contributed to an incident
  - Lessons are learned
  - And acted upon for improvement
  - Involving patients, families & staff meaningfully
- LFPSE: updated incident reporting system
- Patient Safety Partners & patient engagement
- Culture guidance
- AHSN / HINs: delivering elements of the NHSE strategy
- Highlighted in 2024/25 priorities and planning guidance





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Foundations of a Safe Culture

US CMS Structural Measure
5 Domains

- Leadership Commitment to Eliminating Preventable Harm
- Strategic Planning & Organisational Policy
- Culture of Safety & Learning Health System
- Accountability & Transparency
- Patient & Family Engagement

Patient Safety Learning's Standards
7 Foundations

- Strong alignment, also with WHO EMRO 'Patient Safety Friendly Hospital' initiative
- Patient Safety Learning Standards are greater in scope & more comprehensive
- Embeds WHO Global PS Action Plan & NHSE PS Strategy

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Leadership and governance **Aim 1:**	**Patient safety is a core purpose of the organisation. (Patient safety is central to priorities for service delivery, investment, reporting and support.)**		
Standards	**You should have...** (Outputs and evidence)	**You will want to see...** (Outcomes and behaviours)	**Accreditation level**
Standard 1.1 – Commitment There is an explicit commitment to patient safety in the organisation's mission statement, which is made available to the public[1]	• Document(s) containing the mission statement • Reference to the mission statement in patient information • Availability of the mission statement on the organisation's website	• Board, Executive and staff members able to articulate the organisation's commitment to patient safety and give examples of what this means to them	Essential
Standard 1.2 – Policy There is a formal up-to-date patient safety policy which has been approved by the Board and is made available to the public	• Documented patient safety policy, subject to regular review and available on the website • Approval of the policy recorded in Board meeting minutes • Reference to the policy in patient information	• Patient safety is a core purpose for the organisation with regularly reviewed and updated policies and plans	Essential
Standard 1.3 – Strategy Patient safety is a core part of the organisation's strategic plan[2]	• Specific actions aimed at reducing harm from high priority patient safety risks • Impact and evaluation of strategy	• Patient Safety priorities are evidence-based, informed by risk assessments, stakeholder analysis and engagement with staff and patients • Patient safety priorities are informed by current professional guidance, such as RCN Nursing Workforce Standards, GMC and NMC guidance, etc	Essential

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Organisational Snapshot Assessment: 7 Patient Safety Foundations

Do you have the foundations for safer care?	What else should you consider?	*Can you be certain?*
Do you have the right leadership & governance to deliver safe care?	Not just commitment, strategies & processes, but behaviours too.	*How do you know?*
Does your organisational culture promote & support patient and staff safety?	Or is your ambition undermined by blame & fear?	*Would your staff agree?*
Do you share & apply learning across your organisation?	Not just learning from incidents of unsafe care, but how to apply good practice to mitigate risk.	*Has it changed things?*
Are you professionalising patient safety?	Are your expert staff using 'What Good Looks Like' to design & deliver safer care?	*If not, why not?*
Are your patients & their families actively engaged in safety?	Are patients & their families involved in shared decision-making and do their insights inform the design & delivery of improvements, when things go wrong?	*Have you asked whether they feel encouraged to do this?*
Do you effectively measure & monitor your safety performance?	Is there sufficient emphasis on proactive risk assessment & quality improvement, rather than focusing overly on retrospective learning from harm?	*Do you feel confident in your ability to do so?*
Are your patient safety services safe?	Do you have the right conditions & systems to enable your staff to deliver safe care?	*How do you assure yourselves?*


Leadership and governance


Culture


Shared learning


Professionalisation of patient safety


Patient engagement


Data and insight


Delivery of patient safety services

patient safety learning

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Proof of Concept: GOSH & Patient Safety Learning

- Documented consensus assessment of patient safety
  - Foundations, Aims & Standards
- Board endorsed Patient Safety Transformation Programme
  - Cross organisational commitment and leadership SROs
  - Fully embedding NHSE PS Strategy eg PSIRF
  - Underpinning programmes
    - staff / patient engagement & communications, education
- Redefined patient safety & QI teams
  - Central teams & business partnership
  - PS roles in Clinical Directorates
  - New outcomes & measurement framework to monitor success
- Independent 'critical friend' support from Patient Safety Learning

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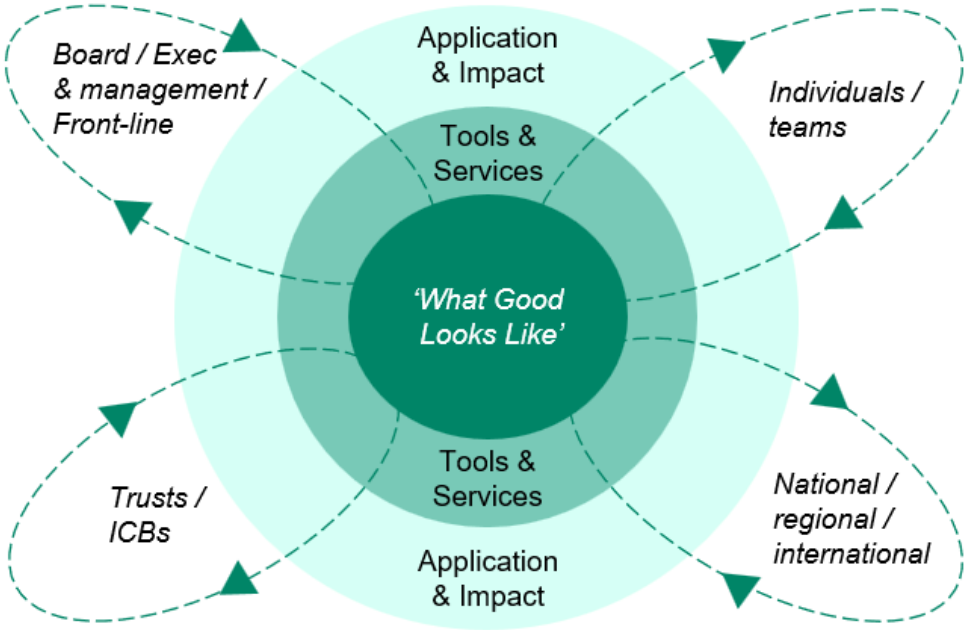
Our Collective Offer, Building on Our Evidence Base

- Sound methodological approach
- Improvement methodology
- Capability building at scale
- Clinical collaboration that demonstrates continuous improvement

- Diagnostic 'Snapshot'
- Create a plan & goals for improving patient safety
- Data & evidence aligned and embedded to help organisations



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Questions

- How has your organisation paid attention to clinical improvement for safer care post covid?
- How could a system based approach be an opportunity to measure outcomes wider than LoS, readmissions and mortality?
- Which pathway would you choose to reduce levels of unwarranted clinical variation and deliver safer care?
- If you were to improve the safety of care in your organisation where would you start?
- What defining characteristic have you heard that enables a patient safe culture?
- Could your organisation describe how your safety processes deliver quality outcomes?

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Further Information

www.aqua.nhs.uk

All of the slides and other helpful resources related to this presentation can be found using the QR code or visiting:

www.aqua.nhs.uk/internationalforum

You can also visit us at **Stand 7** in the Exhibition Hall

ADVANCING QUALITY
Reducing unwarranted clinical variation
Improving patient outcomes

Contact:
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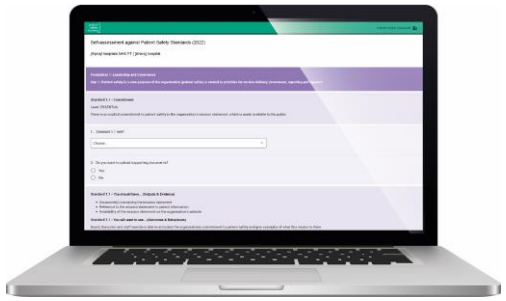
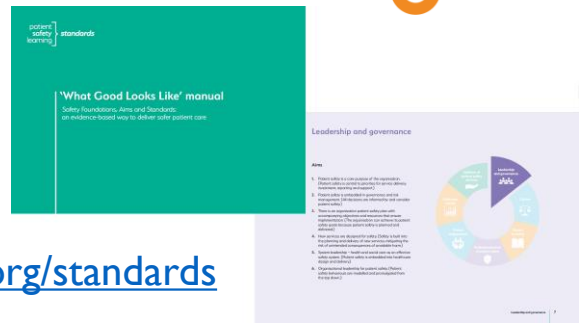
www.patientsafetylearning.org



Our free award-winning platform to share learning for patient safety www.pslhub.org

patient safety management network



Patient Safety Standards and resources

www.patientsafetylearning.org/standards

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