FIND

TARGET PRODUCT PROFILE FOR CDSS

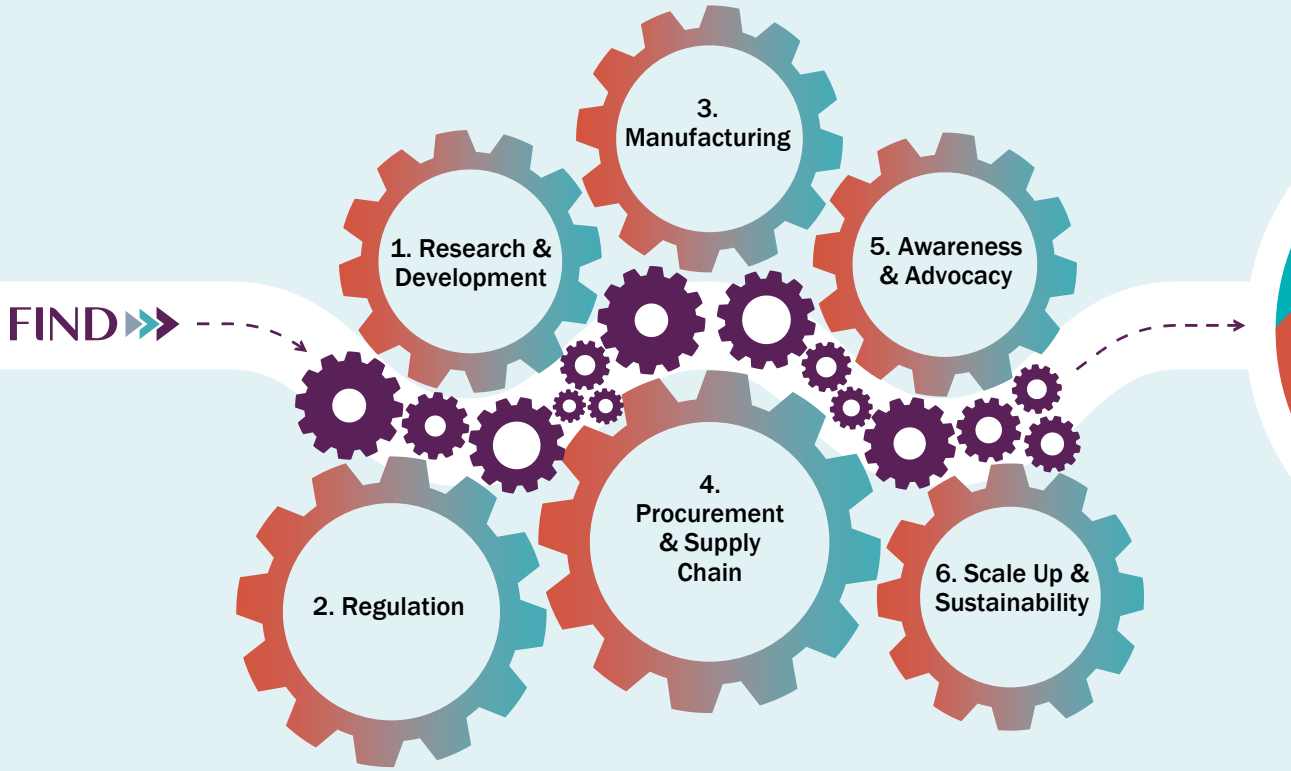
COLLABORATION FOR COMMON STANDARDS

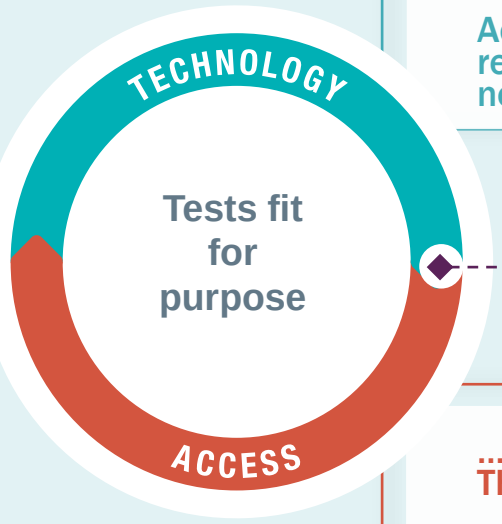
Karell G. Pellé, PhD, Senior Scientist

Clinical Decision Support Systems: Features, Future and Fostering Collaboration, 8 February 2023

FIND HAS BEEN WORKING WITH PARTNERS FOR 20 YEARS

DRIVING INNOVATION AND DELIVERY OF DIAGNOSTICS





ENSURING THE RIGHT DIAGNOSTIC TOOLS...

Accelerate development of quality, reliable tests adapted to local needs and resource constraints

A dynamic and healthy market for quality-assured, affordable diagnostics

...ARE ACCESSIBLE EVERYWHERE THEY ARE NEEDED

Remove barriers that prevent tests from getting where they are needed

TPPS ADDRESS PRIORITY HEALTH NEEDS IN LMICS

PLOS ONE

OPEN ACCESS PEER-REVIEWED

RESEARCH ARTICLE

Target Product Profile for a mobile app to read rapid diagnostic tests to strengthen infectious disease surveillance

Rigveda Kadam, Wallace White, Nicholas Banks, Zachary Katz, Sabine Dittrich, Cassandra Kelly-Cirino

Published: January 29, 2020 • https://doi.org/10.1371/journal.pone.0228311

Research

BMJ Global Health

Redefining typhoid diagnosis: what would an improved test need to look like?

Richard G Mather [1,2] Heidi Hopkins [2] Christopher M Parry [3,4] Sabine Dittrich [1,5]

FIND
Because diagnosis matters

TARGET PRODUCT PROFILE 5:

Rapid test for diagnosis of malaria and screening for human trypanosomiasis (HAT)

This target product profile (TPP) includes 31 test features. These features re requirements or specifications of the diagnostic tool to be developed. For each f desired (optimal) target and a minimally accepted target are defined in a table.

To facilitate consensus building around this TPP, a Delphi-like survey process each TPP feature, an agreement percentage was calculated. Agreement was sco ranging from 1 to 5 (1-disagree, 2-somewhat disagree, 3-neither agree nor disa agree, 5-fully agree). Participants were asked to provide comments when they did a statement (that is, when they scored a feature at 3 or lower).

BMC Cardiovascular Disorders

BMC

Development of a target product profile for a point-of-care cardiometabolic device

Beatrice Vetter, David Beran, [...], and Sigiriya Aebischer

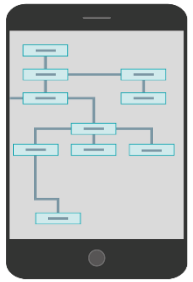
Perone

Meeting Report

High-priority target product profiles for new tuberculosis diagnostics: report of a consensus meeting

INTEGRATION OF «POINT OF CARE» TESTS IN CLINICAL ALGORITHMS

Algorithm

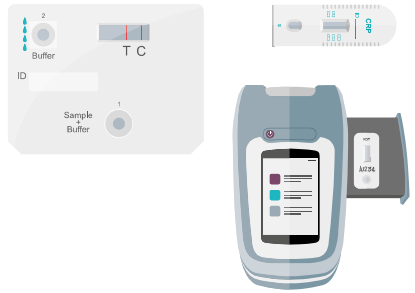


Guide the use of POCTs and inform patient management

Biosensors

Identify severe illness

Point of care tests



Differentiate the cause of fever

BUILDING MULTIDISCIPLINARY CONSENSUS FOR EVIDENCE-BASED CDSS

IDENTIFY PARTNERS, STAKEHOLDERS AND EXPERTS

↓

DEVELOP DRAFT TPP

Engage with experts for verification and optimization

↓

EXPERT CONSULTATION MEETING

Discuss TPP criteria and refine draft document

↓

DELPHI PROCESS

Online survey to reach consensus (≥75% Agreement)

↓

FINALISE AND PUBLISH

FIND/WHO website or peer reviewed publication

→

Section	Characteristic	Agreement Min	Agreement Opt
General Scope	Intended use	96%	96%
	Target Population	96%	96%
	Setting	96%	96%
	Targeted End User	100%	100%
	Algorithm Access	96%	96%
Scope of Toolkit Components	Algorithm Content	96%	96%
	Algorithm Treatment Recommendations	96%	91%
	Compatible Point of Care Tools	91%	91%
	Regulated Toolkit Components	91%	87%
	Compatible Devices	83%	87%
	Compatible Operating Systems	87%	87%
Electronic CDS Algorithm	Content Transparency	87%	91%
	Quality control	91%	91%
	Algorithm Validation	91%	91%
	Machine Learning	96%	87%
Point of Care Tools	POC Data Inputs	87%	87%
	Disease Likelihood	83%	87%
	POC Training	87%	87%
App	System Validation	83%	83%
	System Access (public API)	91%	96%
	Context Configuration	87%	91%
	Customisation	100%	100%
	User Access Rights	100%	96%
	Expert Support	87%	87%
	App Training	91%	91%
	Internet Availability	96%	96%
	Clinical Data Entry	87%	96%
	Patient Management Recommendation	96%	100%
	Navigation	96%	83%
	Workflow	83%	83%
	Task Management	87%	91%
	Follow up	100%	96%
	System Malfunction Protection	96%	96%
	Scalability	91%	91%
	Updates and Versioning	100%	100%
Data	Data Capture	83%	91%
	Data Validation	96%	96%
	Data Ownership	96%	96%
	Data Storage	91%	91%
	Data Recovery	100%	100%
	Data Flow	87%	87%
	Data Reporting	100%	100%
	Data Provenance	96%	96%
	Data Dictionary	91%	96%
	Data Security & Privacy	87%	91%
Procurement	Procurement Models	91%	87%
	Average	91%	91%

Agreement with Min / Agreement with Opt: 100% 75% 50% 25% 0%

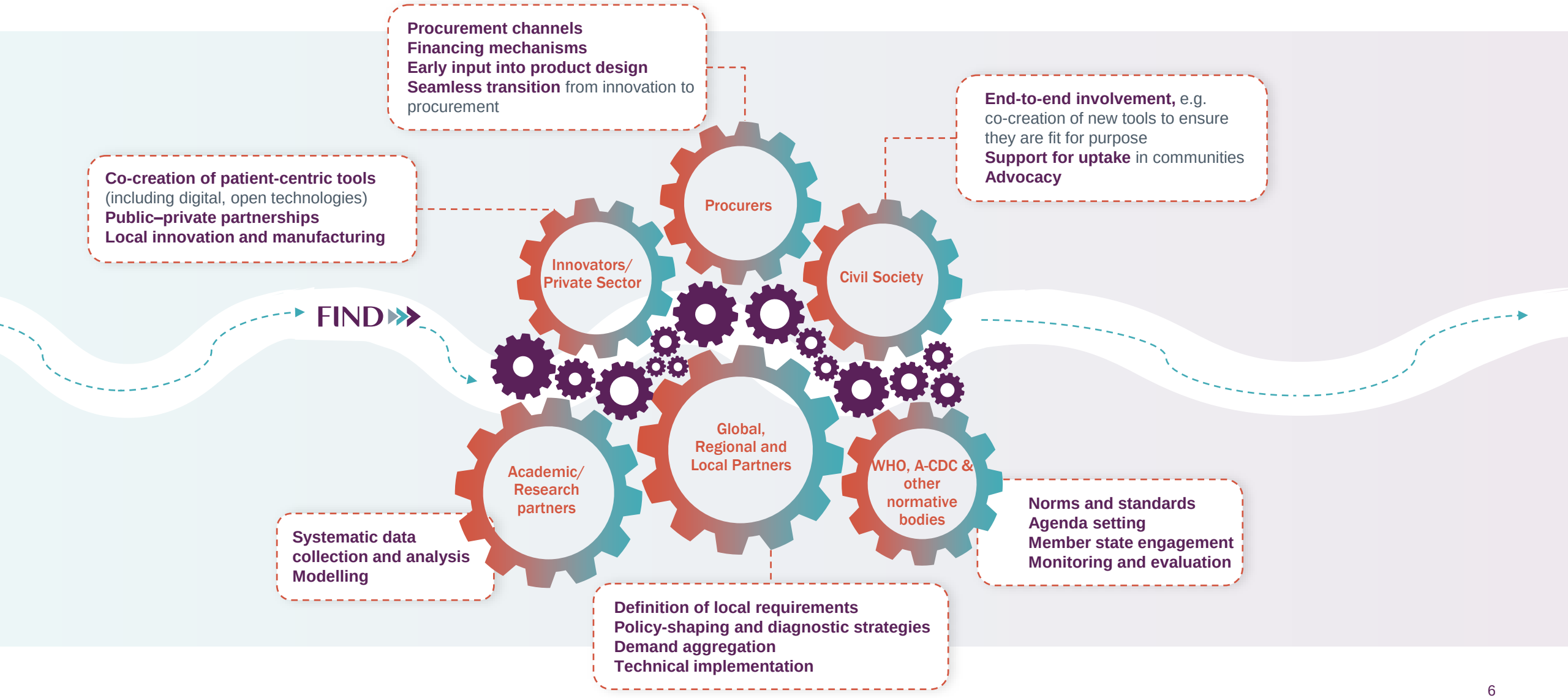
Legend: ≥50% ≥75%

Fully agree
Mostly agree
Neither agree nor disagree
Mostly disagree
Fully disagree

Final CDSS expert agreement for TPP characteristics*

*Pellé KG, Rambaud-Althaus C, D'Acremont V, *et al.* Electronic clinical decision support algorithms incorporating point-of-care diagnostic tests in low-resource settings: a target product profile. *BMJ Global Health* 2020;**5:**e002067.

A COLLABORATIVE ECOSYSTEM TO MAXIMIZE LONG TERM IMPACT



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