TechNet-21

DEPLOYING AN ELECTRONIC LMIS: MAKING THE RIGHT CHOICE

Introducing OpenLMIS software and services

Vitalliance: David Crewe-Brown, Wes Brown
VillageReach: Felimone Amone

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INTRODUCTION

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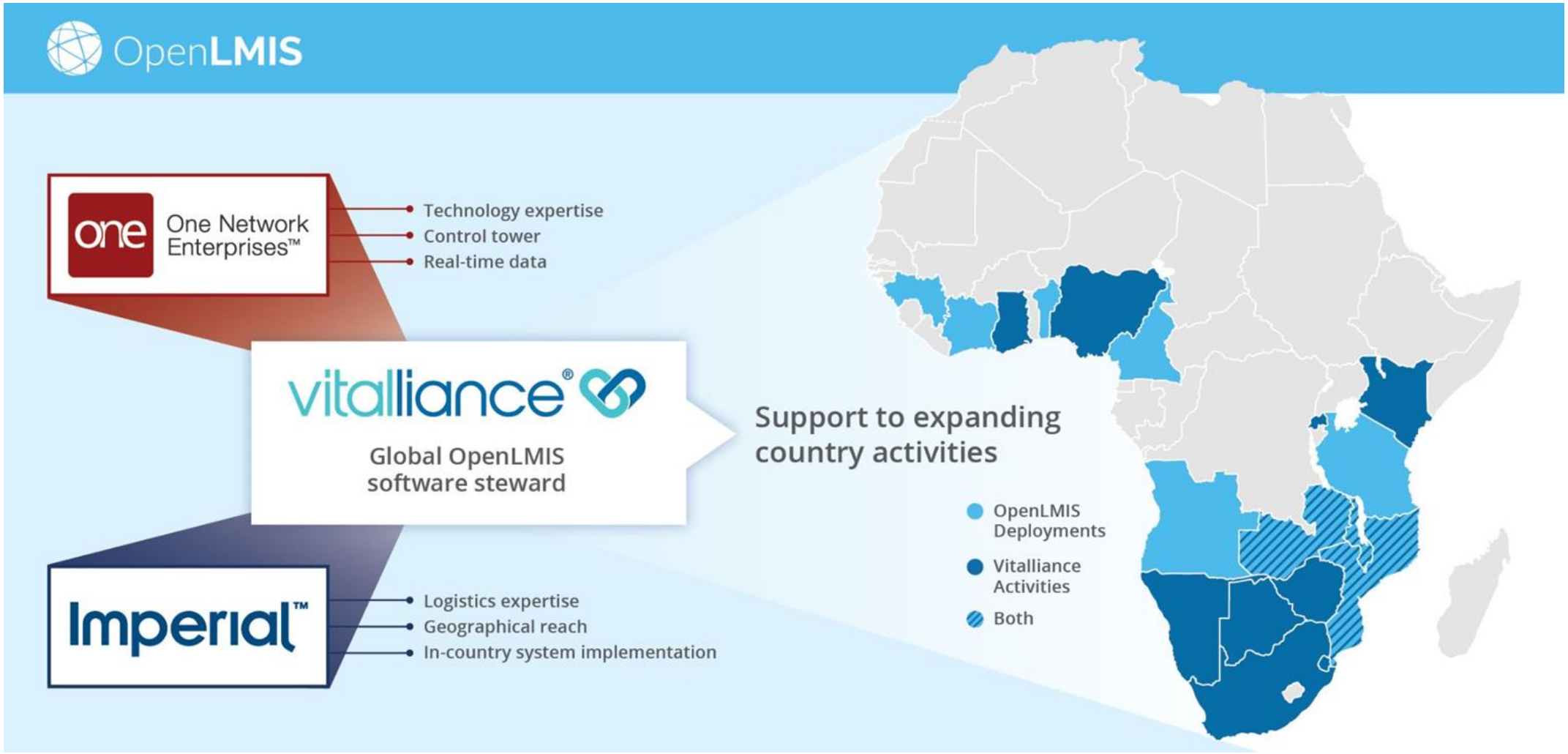
VITALLIANCE – OPENLMIS STEWARDS



GUIDING PRINCIPLES

Shared Investment, Shared Benefit

Promoting code reuse through microservices architecture and community approach

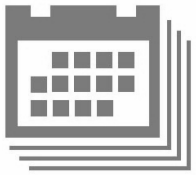
Interoperable

Standards-based, API-driven interoperability to work with almost any other system

Configurable and Extensible

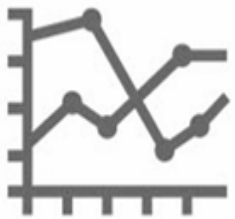
Modular architecture enables extensibility *without* forking

FEATURES



Requisitions:

Use stock data to generate orders, workflow management for approval and emergency requisitions



Analytics and Reporting:

Use and display data with intuitive visualization that supports decision making

Order Fulfillment:

Fulfill and ship orders based on stock on hand and send a Proof of Delivery

Mobile Integration & App:

Connect dispensing and supply information at the point of care through an integration with OpenSRP. Mobile application available from 01 November 2021.

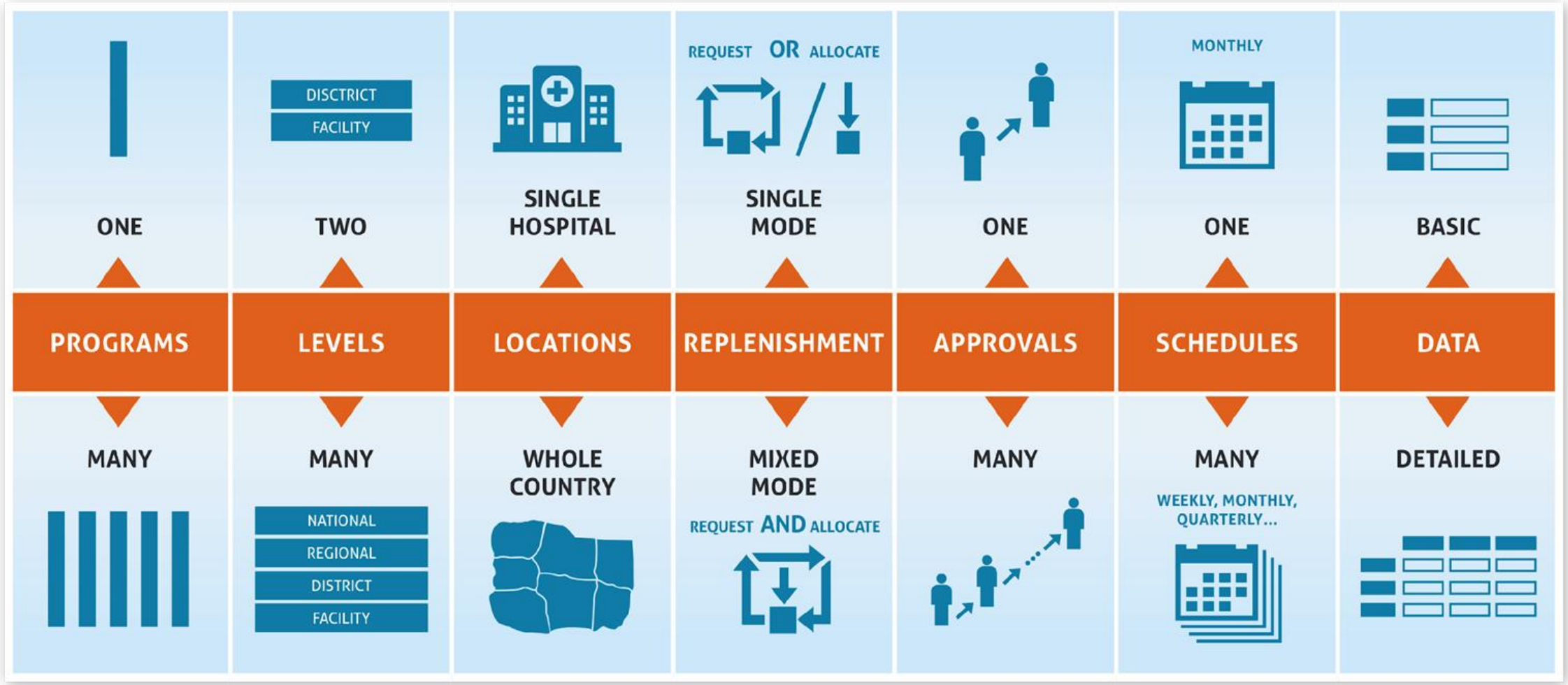
Stock/Inventory Management:

Capture inventory data and stock movements to provide an overview of stock availability

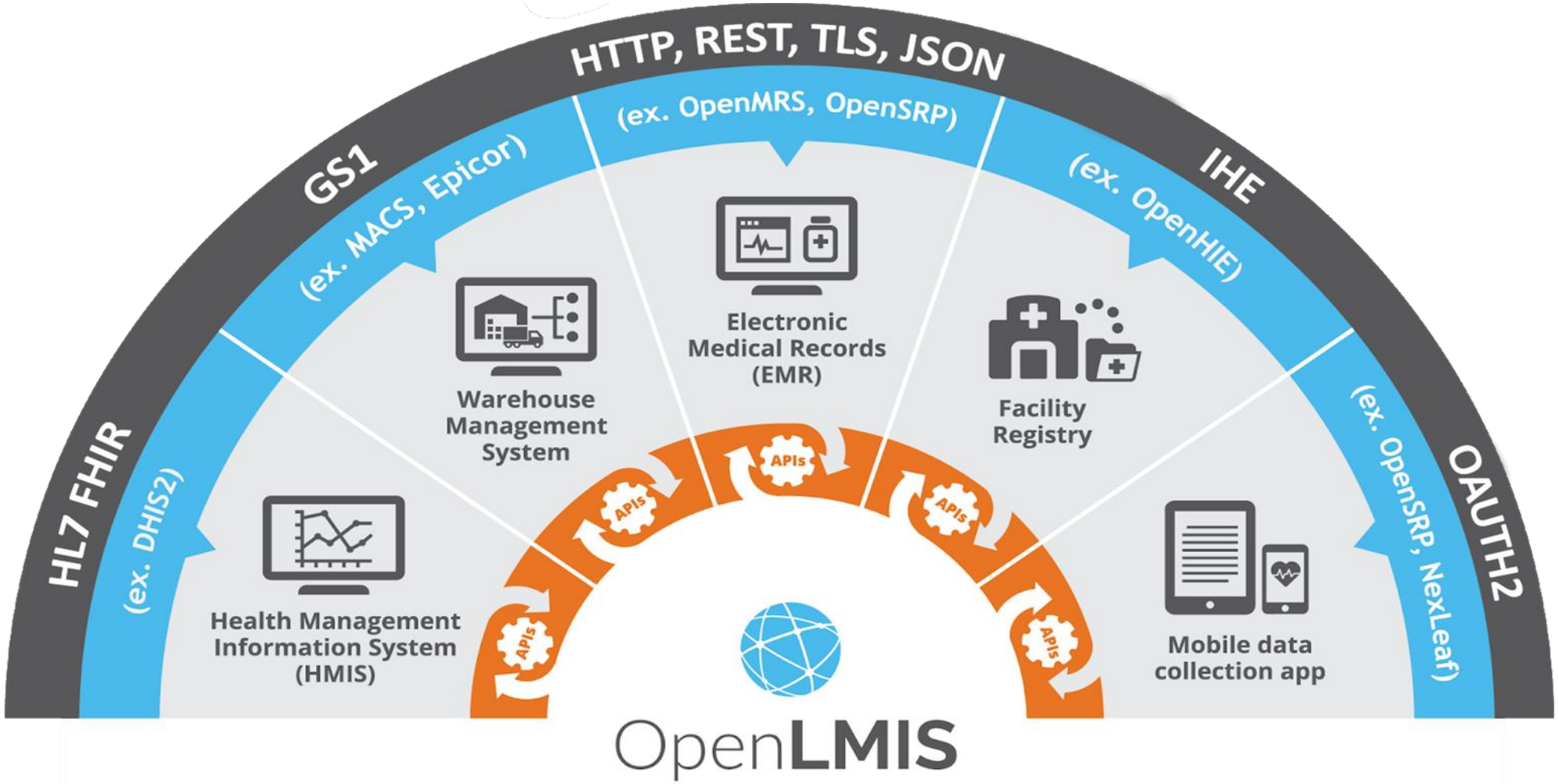
Equipment (CCE):

Track cold chain equipment inventory, functional status; real-time alerts on device temperature

CONFIGURABILITY



INTEROPERATBILITY



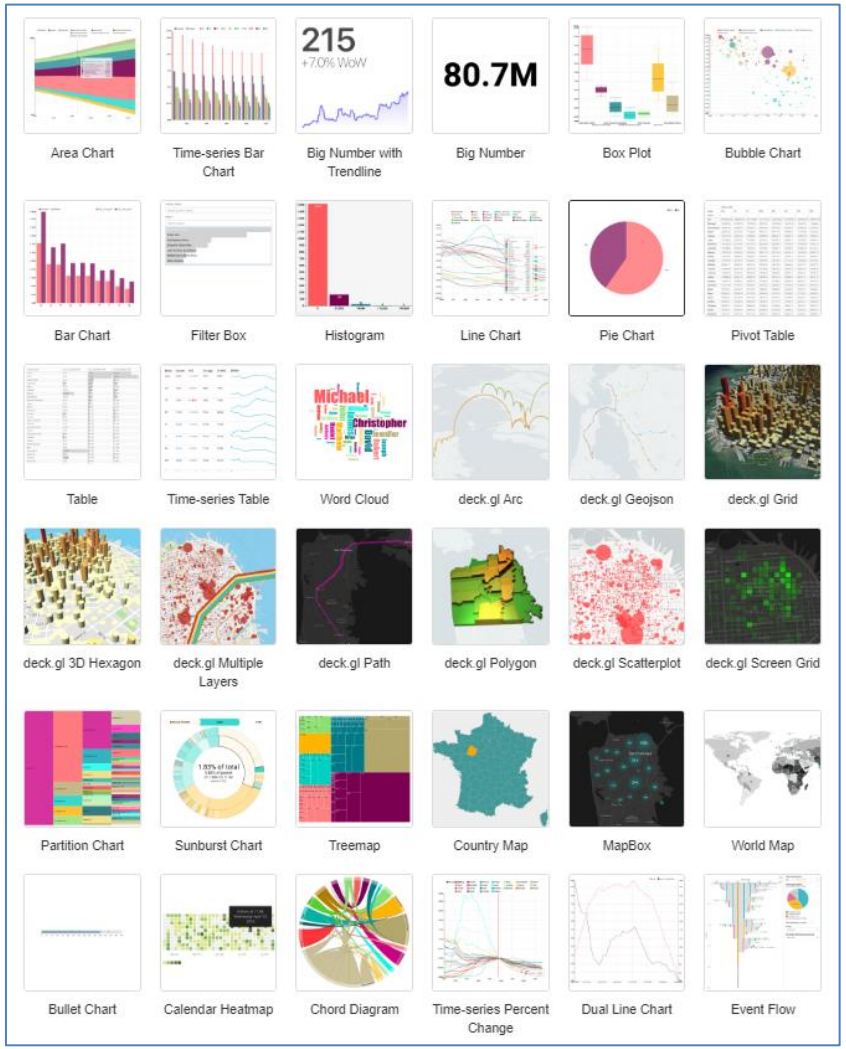
REPORTING AND DATA VISUALISATION

Create custom dashboards based on program priorities

Built in Reports include:

- Stockouts
- Stock Status (overstocked, understocked)
- Consumption
- Orders
- Reporting rates/timeliness

Filter by program, geographic region, date, facility



OPEN AND EXTENSIBLE

Open

- Source: **OSI**-approved license, github.com/openlmis
- Standards: **Web**, **Supply Chain**, **FHIR**, etc
- Documentation: docs.openlmis.org
- Community: forum.openlmis.org

Extensible Architecture

- Containerized Microservices
- REST API first
- Exemplars to get started

CRITICAL SUCCESS FACTORS FOR IMPLEMENTATION

Country Readiness

- Understanding and focus on processes and change management
- Detailed requirements and prioritization for the country context
- Preparation to support beyond the initial implementation
- Technical support available locally (for tier 1 and 2 at least)

Environment

- LMIS SOPs
- Digital health strategy /architecture
- LMIS and/or Digital Health technical working group
- Master data management processes
- 3G connectivity and reliable power source
- Devices (tablets/computers) at implementation sites

SUSTAINABILITY

Open and extensible architecture supported by a strong community.

Drive and maintain a strong community focus to ensure:

- All innovations, useful country developments and learnings are shared and incorporated into core software
- Guiding principles and policies are adhered to, to prevent software “forking”
- All members of the community share benefit and value

Training programs managed through in-country implementation partners

Post implementation:

- L1 to L3 support provided through in country implementation partners - transitioned to countries where maturity levels are attained.
- L4 support (i.e. software and implementation guidance) provided through the core steward team
- Development, maintenance and release of future versions of the software through core steward team

IN COUNTRY EXPERIENCE

OPENLMIS FOR COVID - MOZAMBIQUE

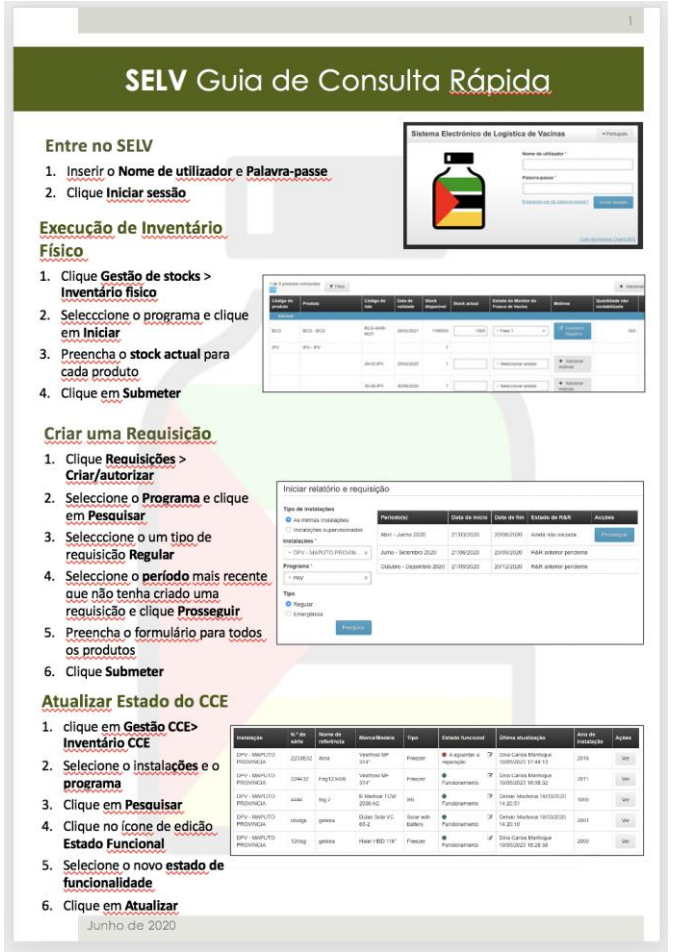
Background:

- Sistema Electronico de Logistica de Vacinas (SELV) was implemented by VillageReach and the Mozambique EPI in 2014, starting in Cabo Delgado and eventually expanding to 8 provinces.
- SELV was designed and customized to support the Dedicated Logistics System (DLS) in place in several provinces in Mozambique.
- As OpenLMIS Core development continued and SELV scaled, often encountering different requirements, limitations of the system became clear, and the additional benefits offered by OpenLMIS v3 increased
- In late 2019, VillageReach - supported by GAVI - began the process to upgrade SELV to OpenLMIS v3 to better serve the needs of EPI and support the MOH's long term goals of improved visibility and interoperable systems

OPENLMIS FOR COVID - MOZAMBIQUE

SELV v3 Upgrade Implementation:

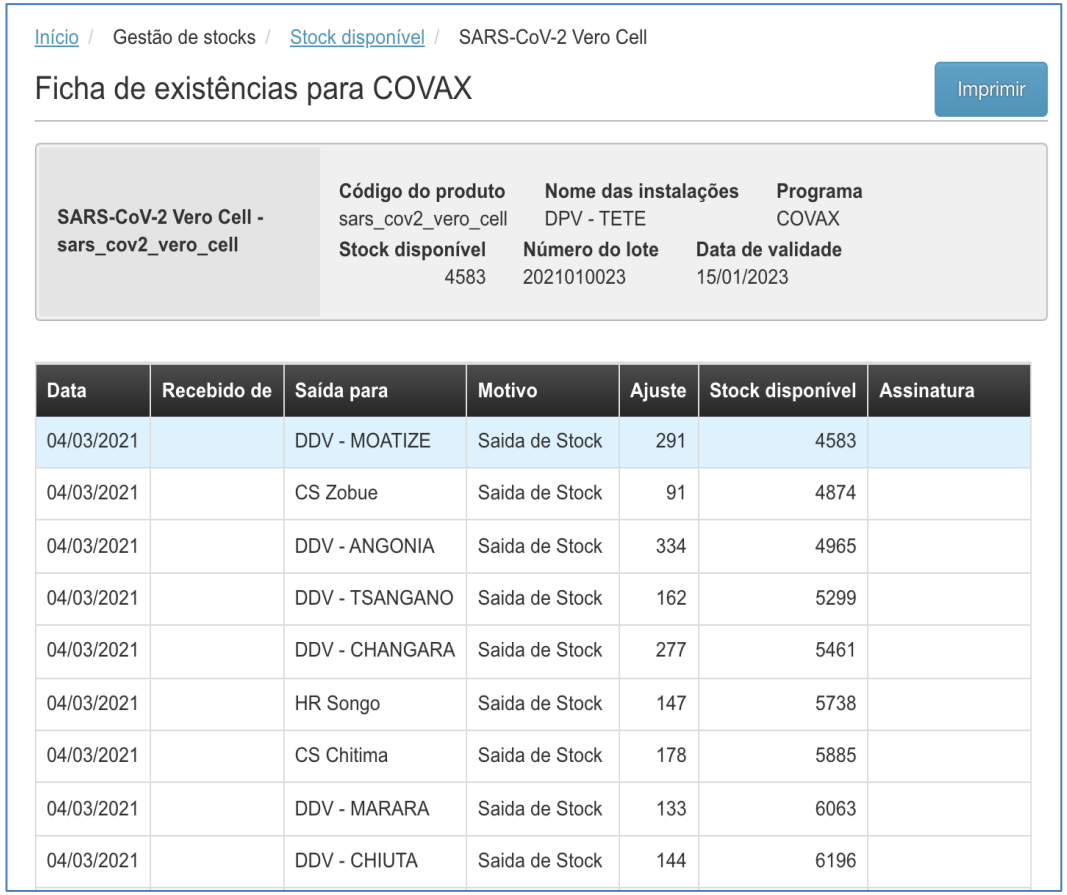
- Planned rollout to district level in 4 provinces in 2020
- Ministry requested accelerated rollout to national scale
- SELV v3 was deployed nationally (to all districts and provinces) between July 2020 - January 2021
- In addition to GAVI funding, accelerated rollout was supported by MISAU (MOH) funds and UNICEF



OPENLMIS FOR COVID - MOZAMBIQUE

COVID Vaccine Rollout

- Mozambique received its initial shipments of vaccines in March
- COVAX program, vaccines and other related configurations added to SELV
- Province & districts and using SELV stock management for vaccines
- SELV mobile app in development for facility-level stock management



Início / Gestão de stocks / Stock disponível / SARS-CoV-2 Vero Cell

Ficha de existências para COVAX

Imprimir

SARS-CoV-2 Vero Cell - sars_cov2_vero_cell

Código do produto	Nome das instalações	Programa
sars_cov2_vero_cell	DPV - TETE	COVAX

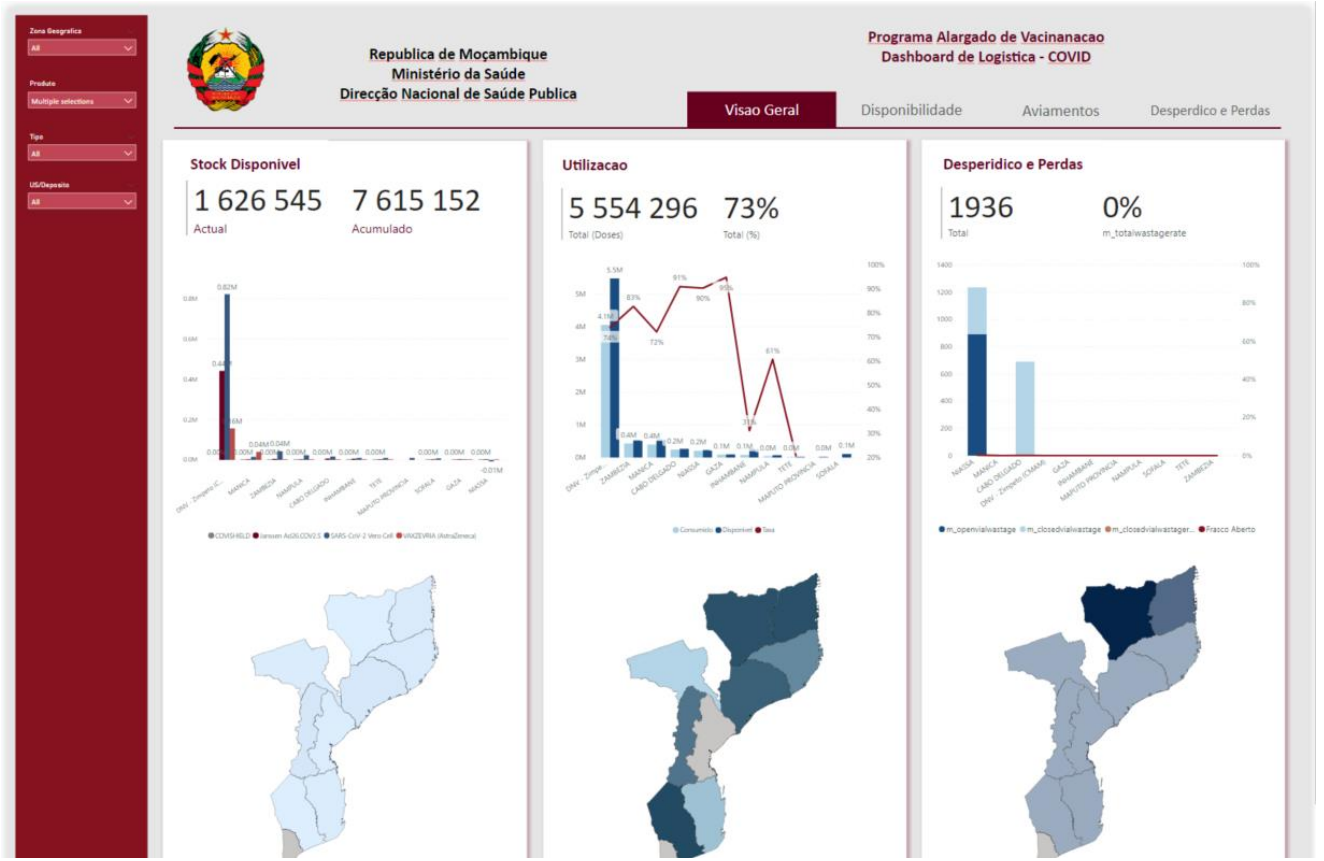
Stock disponível	Número do lote	Data de validade
4583	2021010023	15/01/2023

Data	Recebido de	Saída para	Motivo	Ajuste	Stock disponível	Assinatura
04/03/2021		DDV - MOATIZE	Saida de Stock	291	4583	
04/03/2021		CS Zobue	Saida de Stock	91	4874	
04/03/2021		DDV - ANGONIA	Saida de Stock	334	4965	
04/03/2021		DDV - TSANGANO	Saida de Stock	162	5299	
04/03/2021		DDV - CHANGARA	Saida de Stock	277	5461	
04/03/2021		HR Songo	Saida de Stock	147	5738	
04/03/2021		CS Chitima	Saida de Stock	178	5885	
04/03/2021		DDV - MARARA	Saida de Stock	133	6063	
04/03/2021		DDV - CHIUTA	Saida de Stock	144	6196	

OPENLMIS FOR COVID - MOZAMBIQUE

COVID Vaccine Rollout

- New COVID dashboard added for rapid, user-friendly visibility into COVID vaccine
  stock status.
- Continuous support to end-users
- Integration with RTM underway (Remote Temperature Monitoring)



OPENLMIS FOR COVID - MOZAMBIQUE

Key Lessons learned

- Further simplification of system administration mechanisms to address recurrent changes especially in a low information / dynamic requirement environment.
- Interaction and collaboration with all stakeholders are required to anticipate and implement changes in the system to ensure maximum uptime.
- Greater enforcement / adoption of information system use.

CONCLUSION

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