



ORANEAT

Organization and attitudes in nursing home
antibiotic stewardship



Taking action to
improve health for all



A methodological framework for developing and evaluating programs fostering practice change tailored to their implementation context: **ORANEAT antimicrobial stewardship program in French nursing homes**

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#EHMA2025



Context

- Antimicrobial resistance: one of the top 10 global health threats

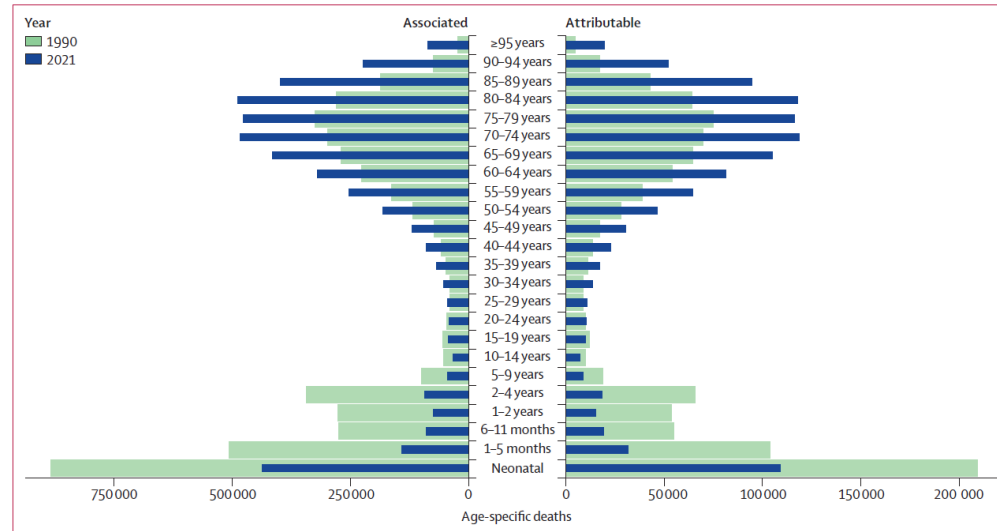


Figure 2: Deaths attributable and associated with antimicrobial resistance, by detailed age group, for 1990 and 2021
Counterfactuals have distinct x-axes.

Source: GBD 2021 Antimicrobial Resistance Collaborators. Global burden of bacterial antimicrobial resistance 1990–2021: a systematic analysis with forecasts to 2050. Lancet. 2024;404(10459):1199

Context

- Antimicrobial stewardship (AMS) programs: effective but sub-optimally implemented
- Need for **interdisciplinary approaches** (i) to identify targets in the development of AMS programs and (ii) to evaluate them
 - **Epidemiology and infectious disease expertise:** identifying key determinants, assessing effectiveness of AMS programs
 - **Social sciences:** identifying key determinants (organizational and psychosocial factors driving antibiotic use), assessing implementation of AMS programs
- Complex interventions prone to **interactions with context**
 - ↳ Need for **multilevel dynamic context-tailoring** during their development, implementation, and evaluation

Core Elements for Antibiotic Stewardship in Nursing Homes



Leadership commitment

Demonstrate support and commitment to safe and appropriate antibiotic use in your facility



Accountability

Identify physician, nursing and pharmacy leads responsible for promoting and overseeing antibiotic stewardship activities in your facility



Drug expertise

Establish access to consultant pharmacists or other individuals with experience or training in antibiotic stewardship for your facility



Action

Implement **at least one** policy or practice to improve antibiotic use



Tracking

Monitor **at least one process** measure of antibiotic use and **at least one outcome** from antibiotic use in your facility



Reporting

Provide regular feedback on antibiotic use and resistance to prescribing clinicians, nursing staff and other relevant staff



Education

Provide resources to clinicians, nursing staff, residents and families about antibiotic resistance and opportunities for improving antibiotic use

Source: <https://www.cdc.gov/antibiotic-use/media/pdfs/core-elements-antibiotic-stewardship-508.pdf>

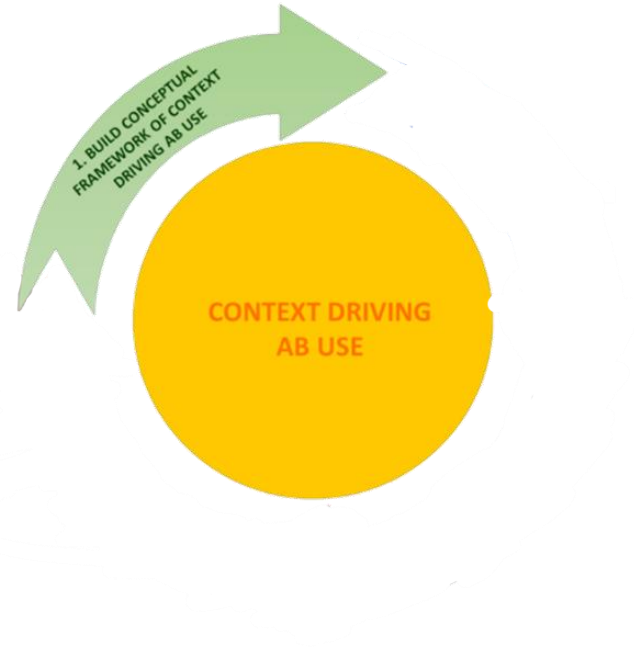
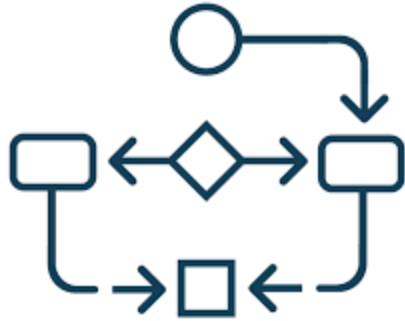
Objectives

To develop a **methodological framework...**

... for the development and evaluation of AMS
programs

... **tailored to their implementation context**

Methodological framework



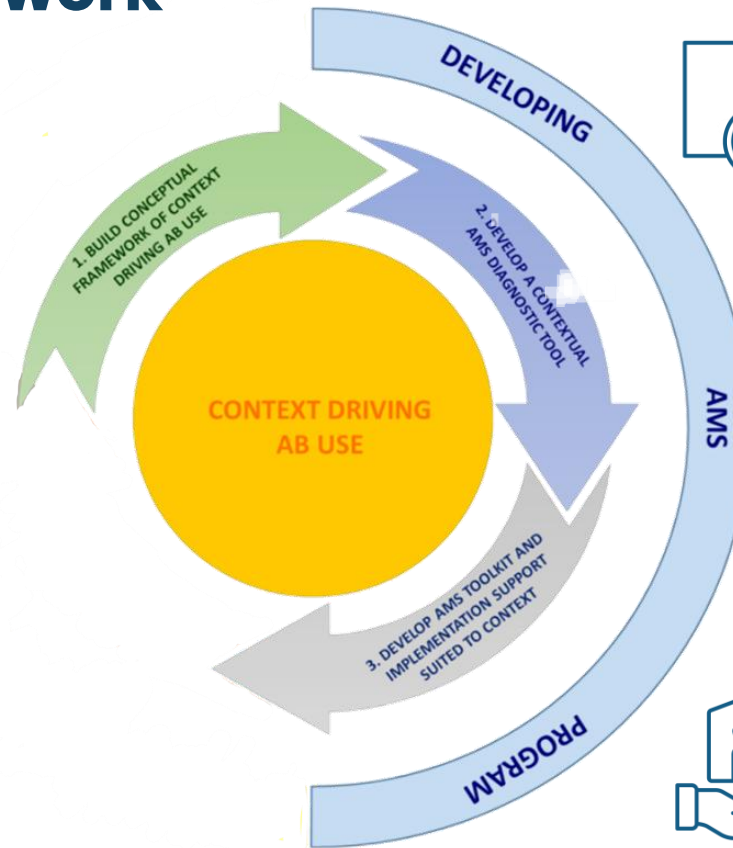
Methodological framework

Contextual AMS
diagnostic

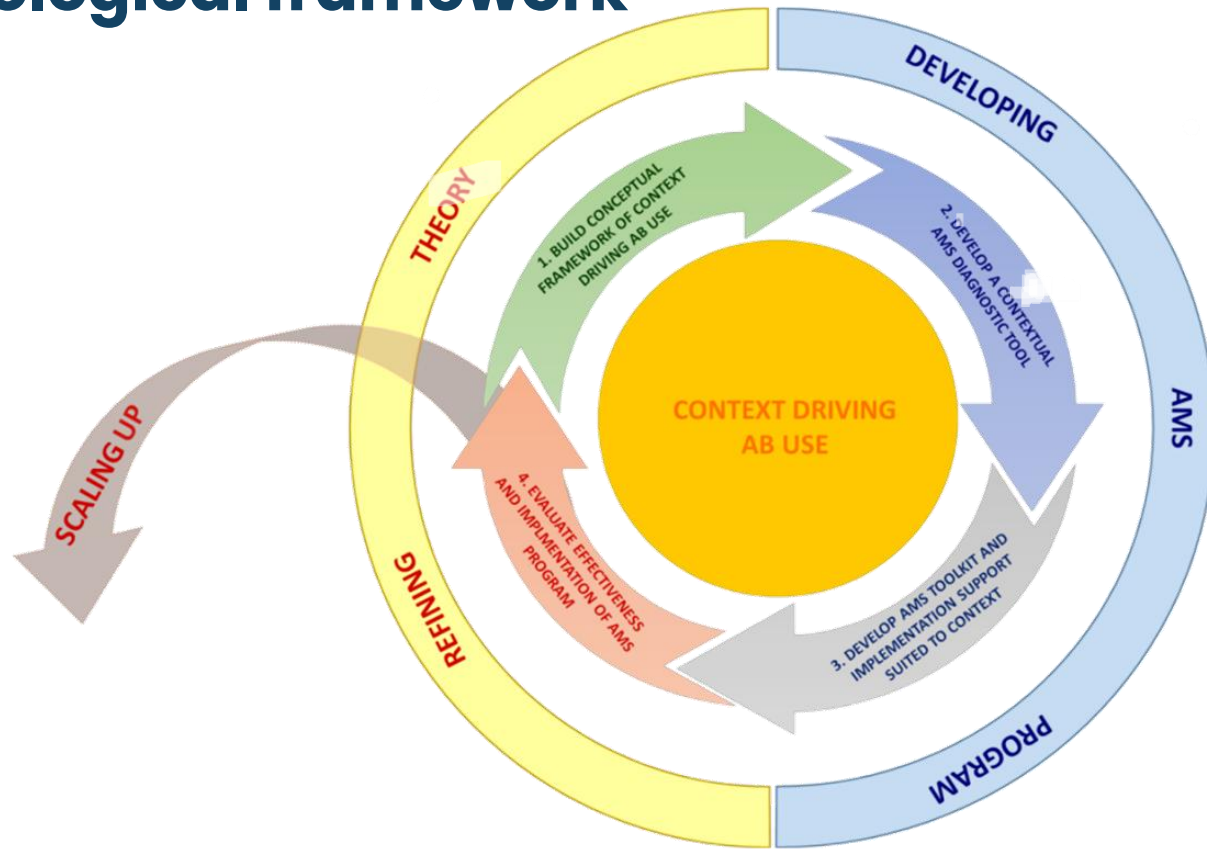


AMS toolkit


Implementation
support



Methodological framework



Expected results (1)

- Application of this methodological framework to nursing homes (NHs)
 - AMS programs are effective in reducing AMR in hospitals but results are inconsistent regarding NHs
 - Untargeted specific determinants of antibiotic use? Implementation issues?
-  The ORANEAT project (2021-2027)
- ORANEAT expected results:
 - A logic model mapping psychosocial and organizational factors driving antibiotic use in French NHs
 - An AMS program including a contextual diagnostic tool on NH AMS, an AMS toolbox and an implementation support tailored to the context
 - Evidence of effectiveness, implementation, and scalability of this AMS program



THANK YOU



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More information about the ORANEAT project at: <https://oraneat.fr/#/>