

A literature review and proposed learning agenda on Immunisation-Nutrition Integration

Executive summary

Infection and malnutrition form a vicious cycle, in which diseases deplete a body's nutrients and increase risk of malnutrition, while malnutrition reduces immune response and increases risk of serious infection and death. Immunisation and nutrition programmes are among the most cost-effective approaches to help children survive and thrive, but despite some successes in scaling these programmes, too many children still do not have access to the services they need – and in many cases, the children with the greatest risk of malnutrition are the same children who are under-immunised. Integrated Nutrition Immunisation (INI) programming is one approach to closing these gaps. For this reason, Gavi and the Eleanor Crook Foundation (ECF) worked together to explore what the literature can teach us about pairing nutrition interventions with vaccine delivery to save more lives.

Many stakeholders have called for greater integration of these sometimes-vertical programmes, including in the WHO/UNICEF *Global Immunisation Vision and Strategy 2006-2015 (GIVS)*, WHO's *Immunisation Agenda 2030*, UNICEF's *Immunisation Roadmap 2018-2030*, and the Gavi five-year strategy, *Gavi 5.0*. Despite the high-level political commitments and strong theoretical benefits of integration, there is limited consensus on “what works” in INI programming. This review attempts to fill this gap by consolidating the latest evidence on the effectiveness of INI programmes and the operational factors that influence their success. It recommends a path forward for programming and further evidence generation.

INI can take many forms. This review distinguishes between two main types of INI (which sometimes intersect) with slightly different rationales and operational requirements or enablers:

1. *Combined service provision*, where both immunisation and nutrition interventions are delivered in the same high-coverage health system touchpoint (i.e. “Supply-INI”). These approaches generate value primarily through efficiency, co-delivering compatible interventions that have overlapping target populations.

2. *Enhanced demand generation and case finding* through a wider range of integrated approaches (i.e. “Demand-INI”), including joint demand generation, incentive approaches, and cross-referral. These approaches can increase programme reach by leveraging complementary strengths of immunisation and nutrition programmes.

While the promise of INI is high and integration is taking place in many contexts, the formal evidence base as detailed in this document is still limited. Stakeholders should therefore deploy the most proven approaches, but also proactively build the evidence base on opportunities for effective INI. This review suggests three major paths forward:

On Supply-INI, stakeholders should deploy INI approaches that bundle interventions with similar delivery modalities, human resource requirements, logistical requirements, and other factors that allow for efficient co-delivery. The best documented of these approaches is integration of immunisation with vitamin A supplementation (VAS). Given the critical importance of reaching zero-dose children (defined for Gavi 5.0 as children who have not received a DTP1 or Penta1 dose), but limited evidence base on how INI can achieve this, we recommend proactive exploration and evidence generation on how Supply-INI can specifically target expanded coverage to zero-dose children.

On Demand-INI, stakeholders should deploy proven community-based integrated demand generation approaches, such as the care group approach, where appropriate. Given strong theoretical benefits, but limited evidence, further proactive exploration of demand-side incentive approaches and a broader set of screening/referral approaches should be explored to take advantage of immunisation and nutrition programmes reaching different families.

Across both INI types, emphasis should be placed on capturing cost data for INI approaches. While cost savings and cost-effectiveness are potentially powerful arguments for adopting INI, only a few studies have captured benefits of INI to nutrition and immunisation outcomes alongside associated costs.