Implementation Science
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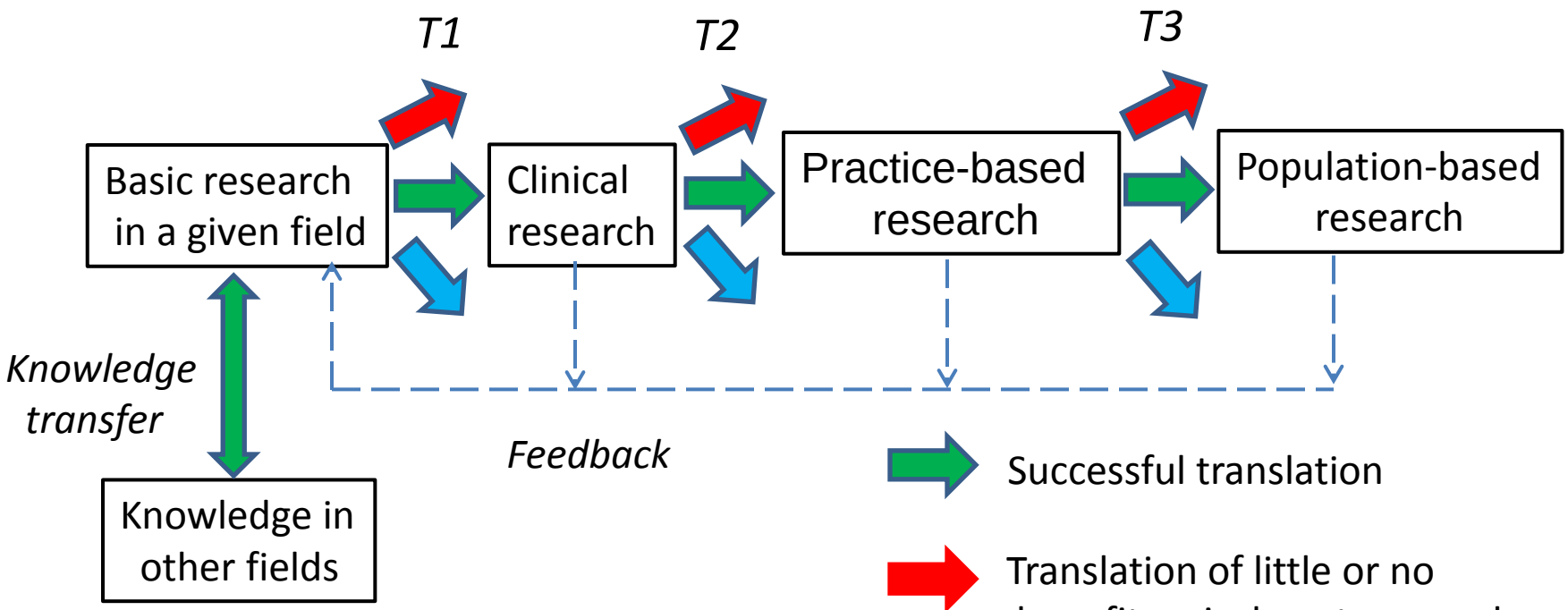
- *Disclosure: I have no relevant financial or nonfinancial relationship(s) within the products or services described, reviewed, evaluated or compared in this presentation.*

For implementation science and lots of other things:
"Sometimes it isn't obvious until it is obvious that it is obvious."

Implementation Science: Perspectives of a Basic Researcher

T1, T2, T3 = stages of translation research



Five Basic Questions of Transfer

- What? To Whom? By Whom? How? To what effect?
  - Lavis, Robertson, Woodside, McLeod, Abelson (2003). How can research organizations more effectively transfer research knowledge to decision makers? *Milbank Q*, 81:221–222.
  - Grimshaw, Eccles, Lavis, Hill, Squires (2012). Knowledge translation of research findings. *Implementation Sci*, 7:50.

1. What Should Be Transferred?

- Basic research is not just an isolated upstream element in the process.
- Basic research is concerned with knowledge utilization (including interdisciplinary knowledge) to ensure the most valid and robust science.
- The products of eventual transfer include:
  - decision aids for patients
  - clinical practice guidelines for healthcare professionals
  - actionable messages and policy briefs for policy makers

2. To Whom Should Research Knowledge Be Transferred?

- Many possible stakeholders: patients, clinical practitioners, general public, policy makers
- Identify facilitators and barriers for each stakeholder.

Stakeholder	Facilitators	Barriers
Patients		
Clinical practitioners		
General public		
Policy makers		
Organizations		

3. By Whom Should Research Knowledge Be Transferred?

- The basic unit of knowledge translation should usually be up-to-date systematic reviews or other syntheses of research.
  - Nature and strength of evidence
  - Potential for implementation
  - Risk of bias
- Basic scientists can and should be part of a team that conducts reviews and syntheses.

4. How Should Research Knowledge Be Transferred?

- Promoting Action on Research Implementation in Health Services framework (PARiHS) (Kitson, Harvey McCormack,1998, Enabling the implementation of evidence based practice: a conceptual framework. *Quality in Health Care,* 7:149).
- PARiHS is a conceptual framework emphasizing 3 key elements related to successful implementation of evidence-based practices:
    - Evidence bases (research and others)
    - Context (environment or setting)
    - Facilitation (support factors)

5. What Effects Should Transfer of Research Knowledge Have?

- Successful implementation (Helfrich et al., 2010, *Implementation Science*, 5:82):
  - Realization of the implementation plan or strategy.
  - Achievement and maintenance of the targeted EBP.
  - Achievement and maintenance of end-point patient or organizational outcomes.