Section 3.4
Assessing barriers and facilitators to knowledge use

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Overview of chapter

- Why is it relevant to address barriers and facilitators to knowledge use?

- What are the key concepts and conceptual models for assessing barriers and facilitators to knowledge use?

- What are some tools for assessing barriers and facilitators to knowledge use?

- Future research

Key learning points

- Barriers and facilitators are the salient beliefs of self-efficacy, the most important determinant of behaviour change after intention.

- Taxonomies for barriers and facilitators have been developed and should be used when developing a knowledge-to-action project.

- Existing taxonomies should be further evaluated in other settings and contexts.

- Existing scales to assess barriers and facilitators to knowledge use need to be further evaluated.

Why is it relevant?

Diagnostic analysis:
N=329 physicians
Self-reported barriers
explained 39% of the self-reported performance.

IMPROVING PATIENT CARE

The Implementation of Change in Clinical Practice

Improving Patient Care
The Implementation of Change in Clinical Practice
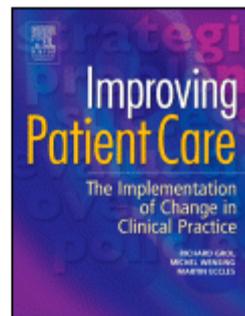
In th... health care, a very large number of valuable insights, procedures and technolog... ecome available each year. These come from well planned scientific research or careful exper...ents and evaluation in everyday practice. As many of these innovations are not adopted into daily practice, at the expense of improved patient care, it is crucial to understand how sucessful implementation can be achieved.

This book examinines the process of introducing change and innovation into practice. With chapters on identifying problems in the implementation, selecting strategies, effective implementation of policies, and evaluation of the success of the changes, this book provides a

Why is it relevant?

- 78 studies of behaviour change in healthcare providers (Godin et al. 2008):
  - 72: determinants of intention
  - 16: determinants of behaviour.

- Factors most consistently associated with prediction of healthcare provider's behaviours and intention (*i.e.*, at least 50% of the time)
  - intention
  - **beliefs about capabilities (perceived behavioural control)**

KEY CONCEPTS AND CONCEPTUAL MODELS FOR ASSESSING BARRIERS AND FACILITATORS TO KNOWLEDGE USE

Clinical Practice Guidelines Framework for Improvement

Cabana et al. 1999

- This framework was based on an extensive search of the literature of barriers to physician adherence to CPGs and was organized according to ***knowledge***, ***attitudes***, or physician ***behavior***.

- 76 published studies describing at least one barrier to adherence to CPGs.

- 293 potential barriers to physician guideline adherence.

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Barriers and Facilitators to the implementation of shared decision making

Légaré et al. 2006

- Primary health care professional's views on barriers and facilitators to the implementation of the Ottawa Decision Support Framework in practice

- Extension of Cabana's model:
  - A specific definition was identified for each type of barrier;
  - Inclusion of a list of potential facilitators of knowledge use in clinical practice.

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Barriers and Facilitators to the implementation of shared decision making

Légaré et al. 2006

- Cabana's model also extended with the attributes of innovation as proposed by the **Diffusion of Innovation theory** (*Rogers, 1995*).

# A systematic review of health professionals' perceptions

Légaré et al. 2008

- Application of the revised version of the Clinical Practice Guideline Framework for Improvement.

- Barriers and facilitators to implementing shared decision making in clinical practice.

- 41 publications covering 38 unique studies.

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Barriers and facilitators to SDM

Stages of the review process

Total references identified and screened for evaluation: 10710

Exclusion criteria: 10416

Articles retrieved for detailed evaluation: 294

Exclusion criteria: 253
- Not a study: 87
- Not about HCP: 84
- Not about B or F: 72
- Not F or E: 1
- Duplicate: 9

Publications deemed eligible: 41
38 unique studies
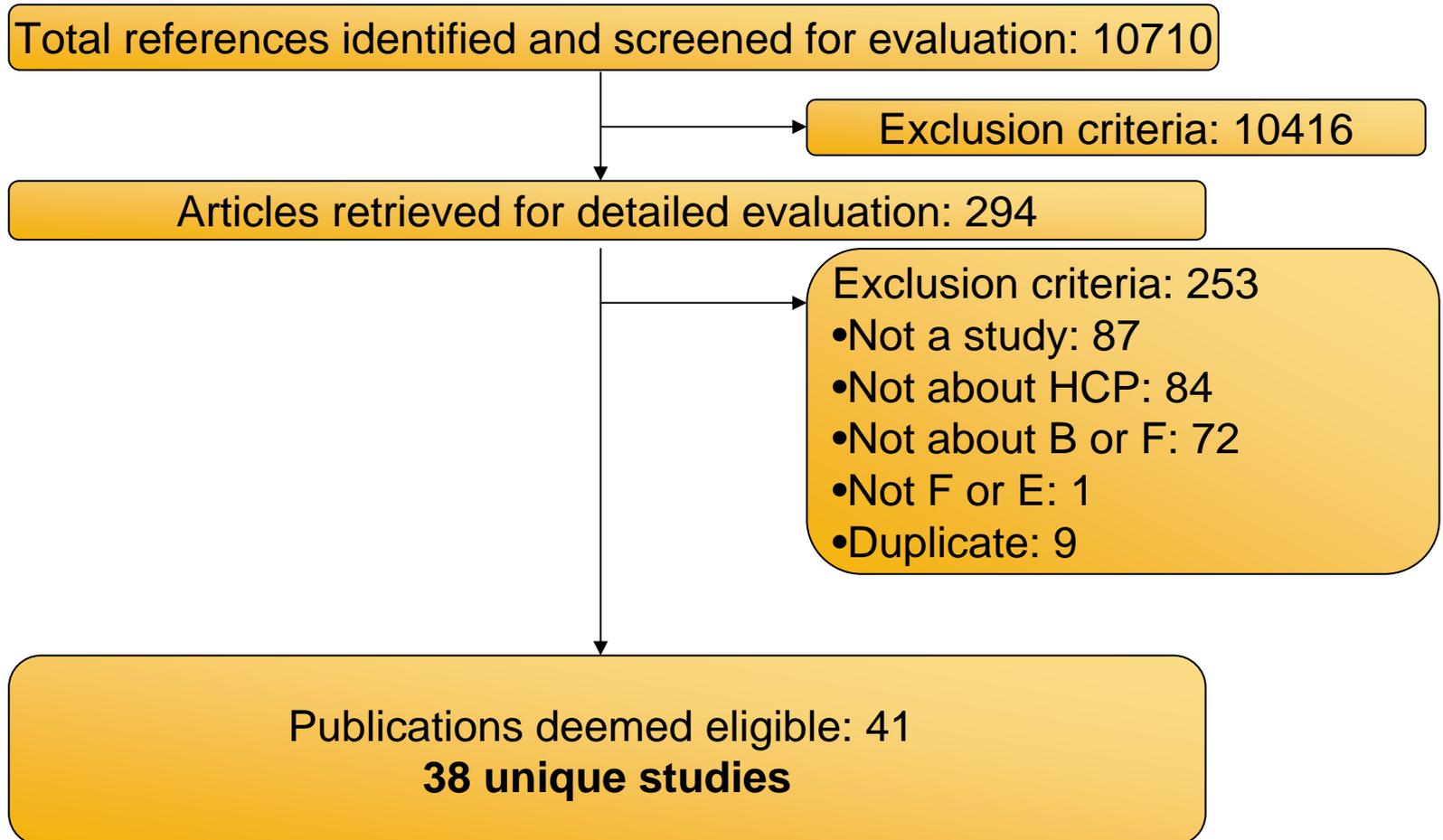
(Légaré, Ratté, Gravel, Graham. Pt Educ Counseling, 2008)

Health professionals surveyed

| Professionals	Number of Participants	%
Physicians	3253	90
Other professionals	341	9
Others	39	1
Total	3633	100

n=38 studies

*5 studies did not provide this information

(Légaré, Ratté, Gravel, Graham. Pt Educ Counseling, 2008)

Barriers

Knowledge → **Attitude** → **Behavior**

Lack of familiarity

Lack of knowledge

Lack of agreement Characteristics of patients (n=18/38)

Applicability to the clinical situation (n=16/38)

Lack of outcome expectancy

Lack of self-efficacy

Lack of motivation

External barriers

-Patient

-Model

-Environment: Time constraints (n=24/38)
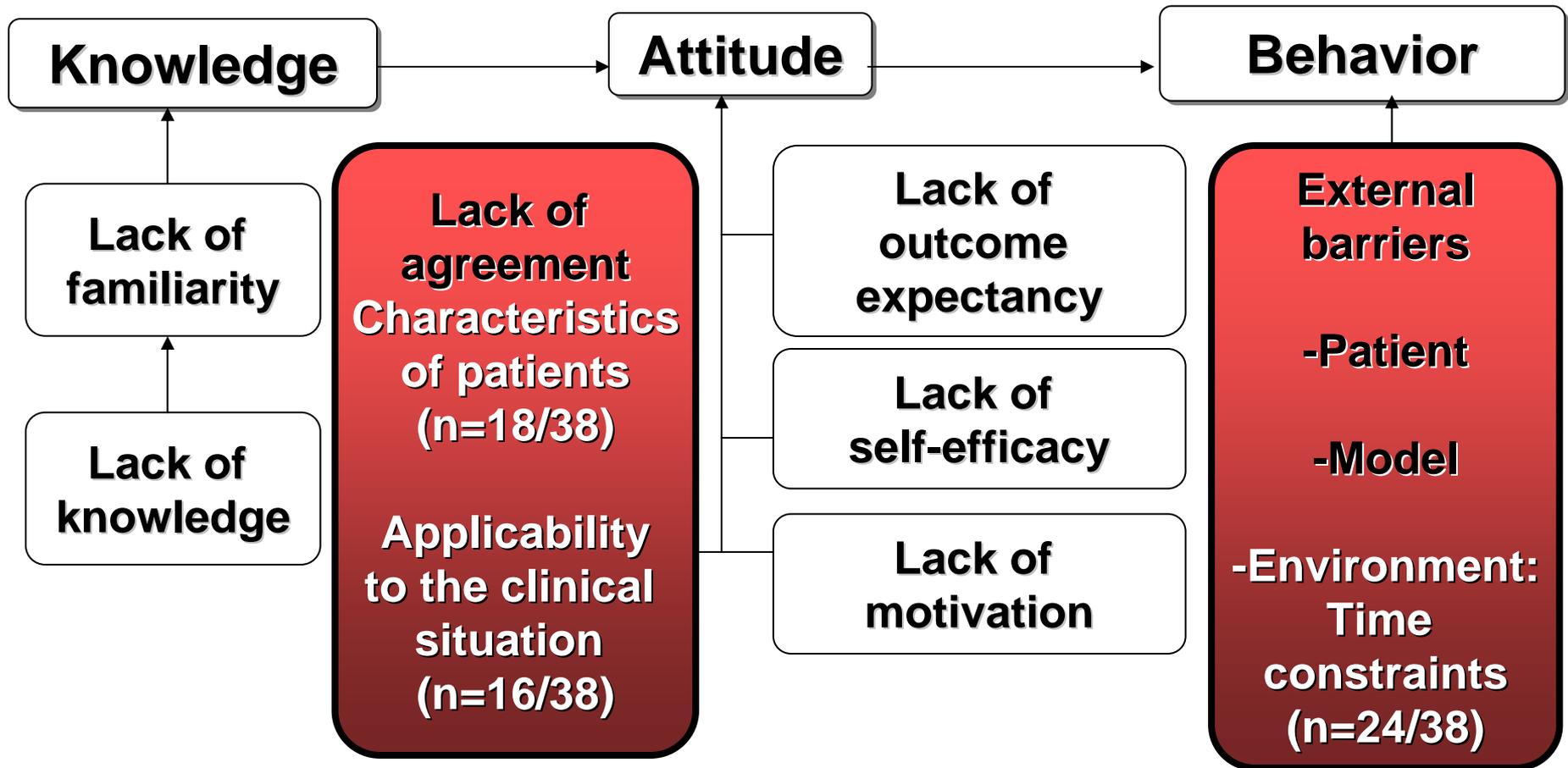
(Légaré, Ratté, Gravel, Graham. Pt Educ Counseling, 2008)

Facilitators

Knowledge → **Attitude** → **Behavior**

Knowledge
↑
Familiarity
↑
Knowledge

Agreement

Outcome Expectancy Process 13/38 Patient 12/38

Self-efficacy

Motivation 22/38

External factors

-Patient

-Model

-Environment:
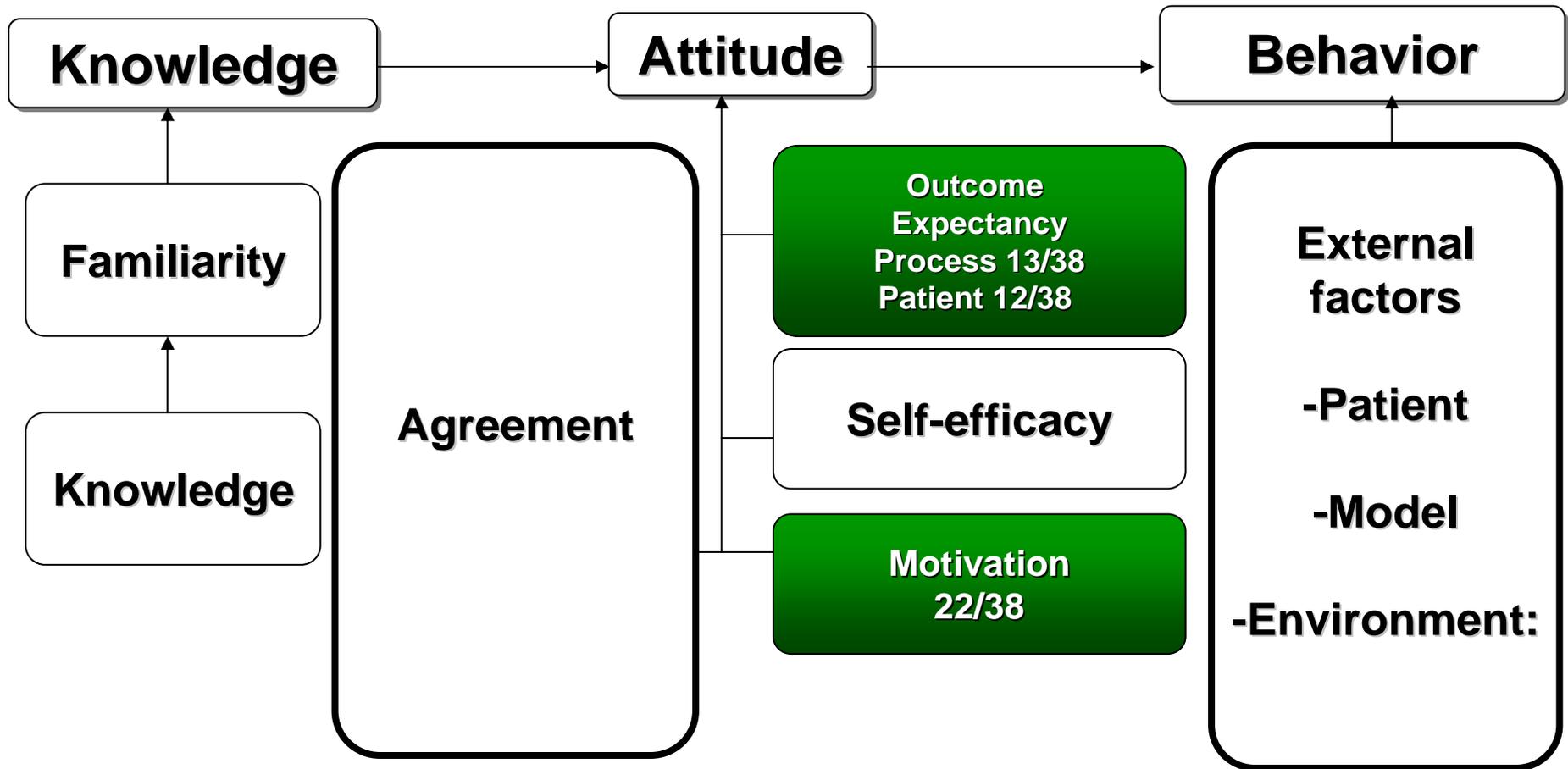
(Légaré, Ratté, Gravel, Graham. Pt Educ Counseling, 2008)

TOOLS FOR ASSESSING BARRIERS AND FACILITATORS TO KNOWLEDGE USE

Tool for assessing barriers to adherence to hand hygiene guidelines

Larson, 2004

- Was developed and tested on a group of 21 infectious disease clinicians.

- 6-point Likert scale

- 2 sections:
  - Attitudinal statements about practice guidelines in general
  - Specific statements regarding the Hand Hygiene Guideline

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Instrument to assess barriers and facilitators to knowledge use

Wensing et Grol, 2005

- Applied to 12 different implementation studies in the Netherlands.

- Literature analyses and focus groups with implementation experts to identify possible barriers to change.

- Validation studies to test psychometric characteristics of the questionnaires.

BARRIERS Scale
Funk et al. 1991

- Develop to assess barriers to research utilization based on four key dimensions: nurse, setting, research and presentation.

- 29 items

- 4 subscales that map 4 key dimensions :
  (1) characteristics of the adopter;
  (2) characteristics of the organization;
  (3) characteristics of the innovation; and
  (4) characteristics of the communication

FUTURE RESEARCH

Challenges that will need to be addressed

- Need to standardize the reporting of barriers and facilitators to translating research into clinical practice.

- Need to address barriers as well as facilitators to knowledge use because one factor can be perceived as both a barrier and a facilitator.

- Need to adapt existing instruments to the assessment of facilitators of knowledge.

- Need to test existing instruments in diverse clinical and cultural contexts.

Research questions

1. How should we measure barriers and facilitators to research use to infer what the collective is thinking?

2. Should we collect data from individuals to make sense of the group's thinking?

3. If we do, should we use the mean or the median to represent the group or should we focus on the variation or only on the outliers?

4. How many individuals in a group have to perceive something is a barrier before we decide to address it with an intervention?

5. Is the perception of the opinion leader the most important one?

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