

Chasing the Grey Evidence: A Standardised Systematic Literature Review Approach



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Acknowledgement

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Overview

- **Evidence based public health**
- **Grey literature**
- **Advantages and disadvantages of using grey literature**
- **Some challenges**
- **The way forwards**
- **Conclusions**



What is Evidence Based Public Health

- **Evidence based public health as a public health endeavour in which there is an informed, explicit, and judicious use of evidence that has been derived from any of a variety of science and social science research and evaluation methods.**

- Sacket et al 1996 BMJ 312 71-72



Evidence Based Public Health

- **The definitions highlights two aspects of evidence based public health**
 - **The use of a multiple methodologies evidence to inform public health decision; publication bias**
 - **An emphasis on clear reasoning in the process of appraising and interpreting evidence for policy and implementation**
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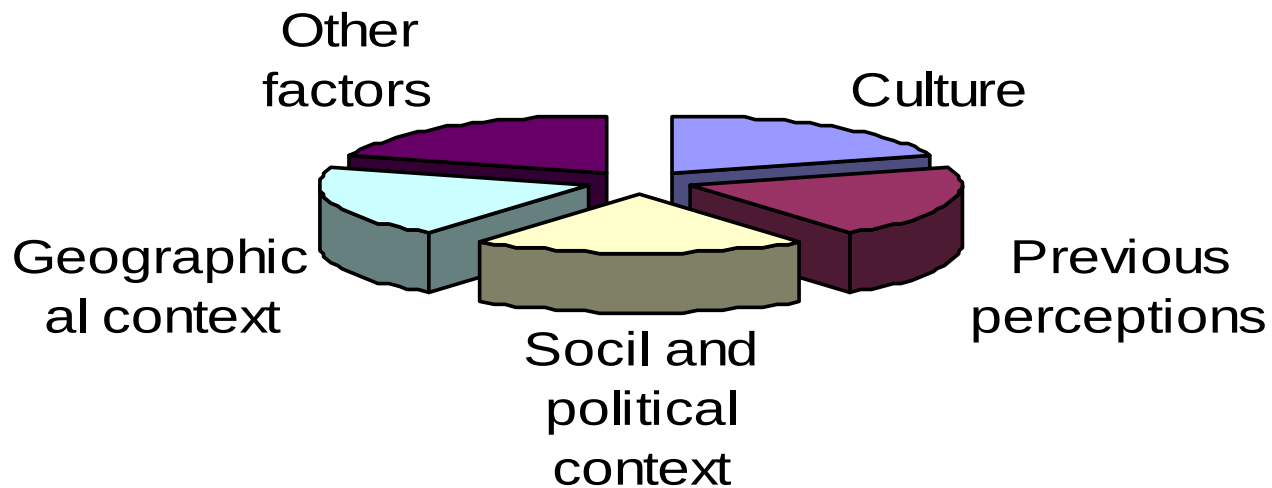


Systematic Literature Review

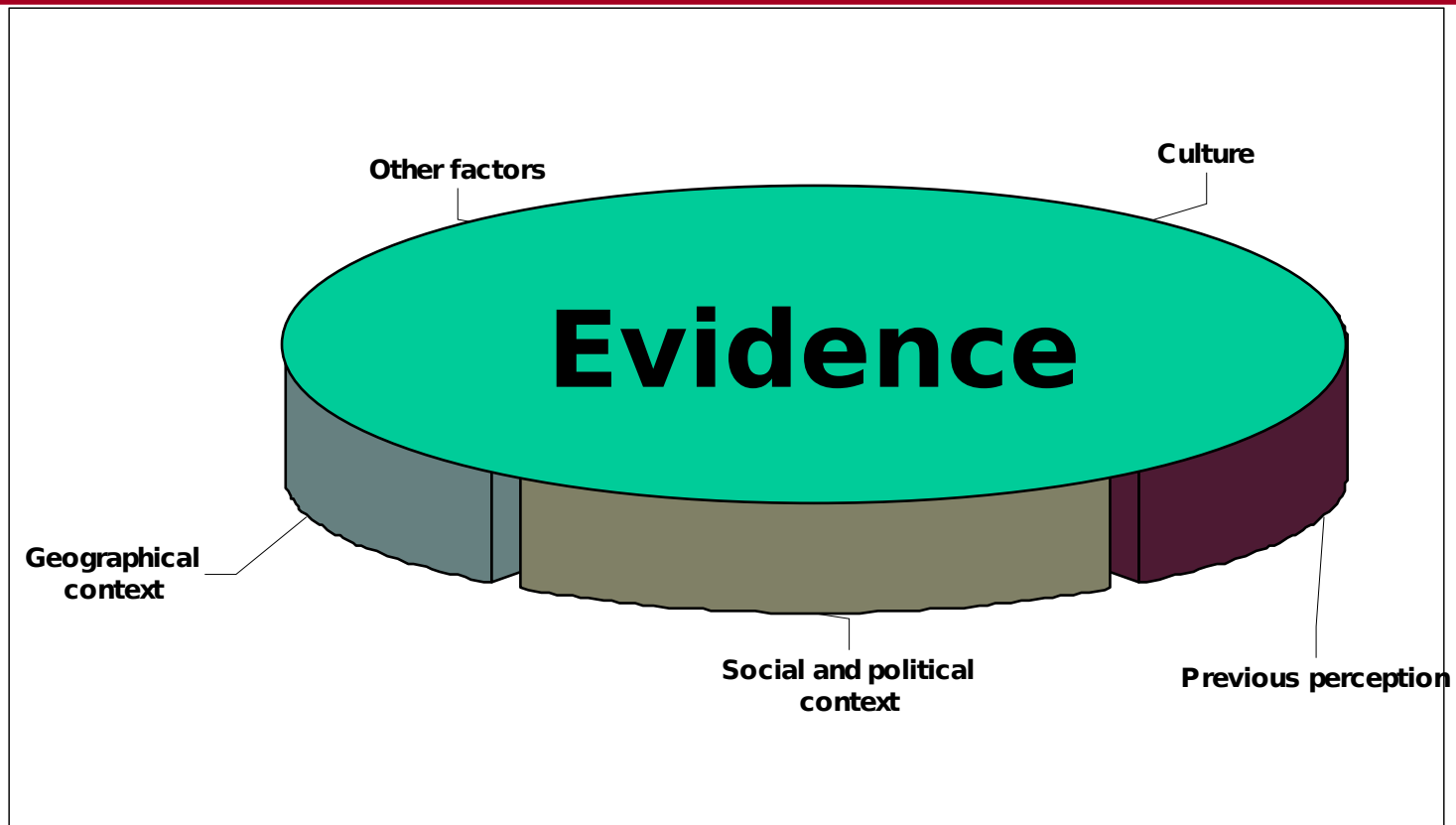
- **Searching for and locating appropriate literature**
 - **Critically examining the results and extracting relevant detail**
 - **Synthesizing and writing the review and produce a evidence**
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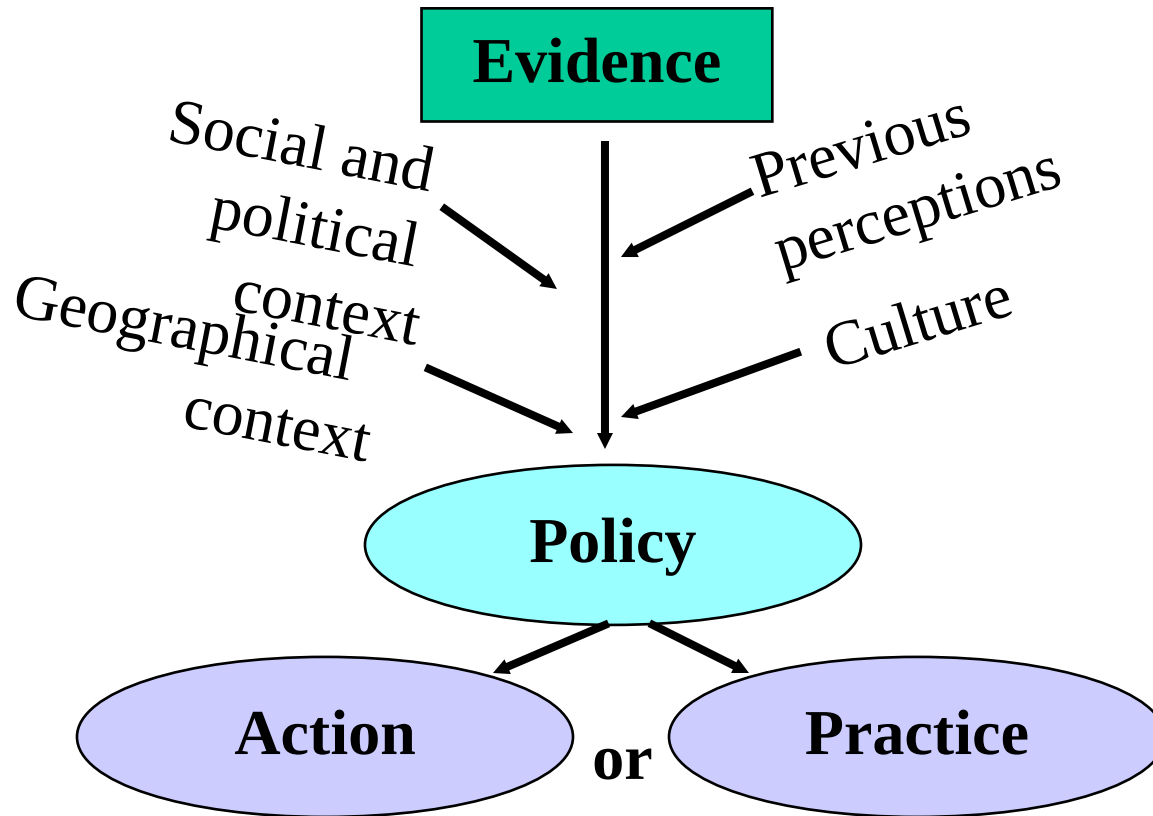
Evidence beyond RCTs



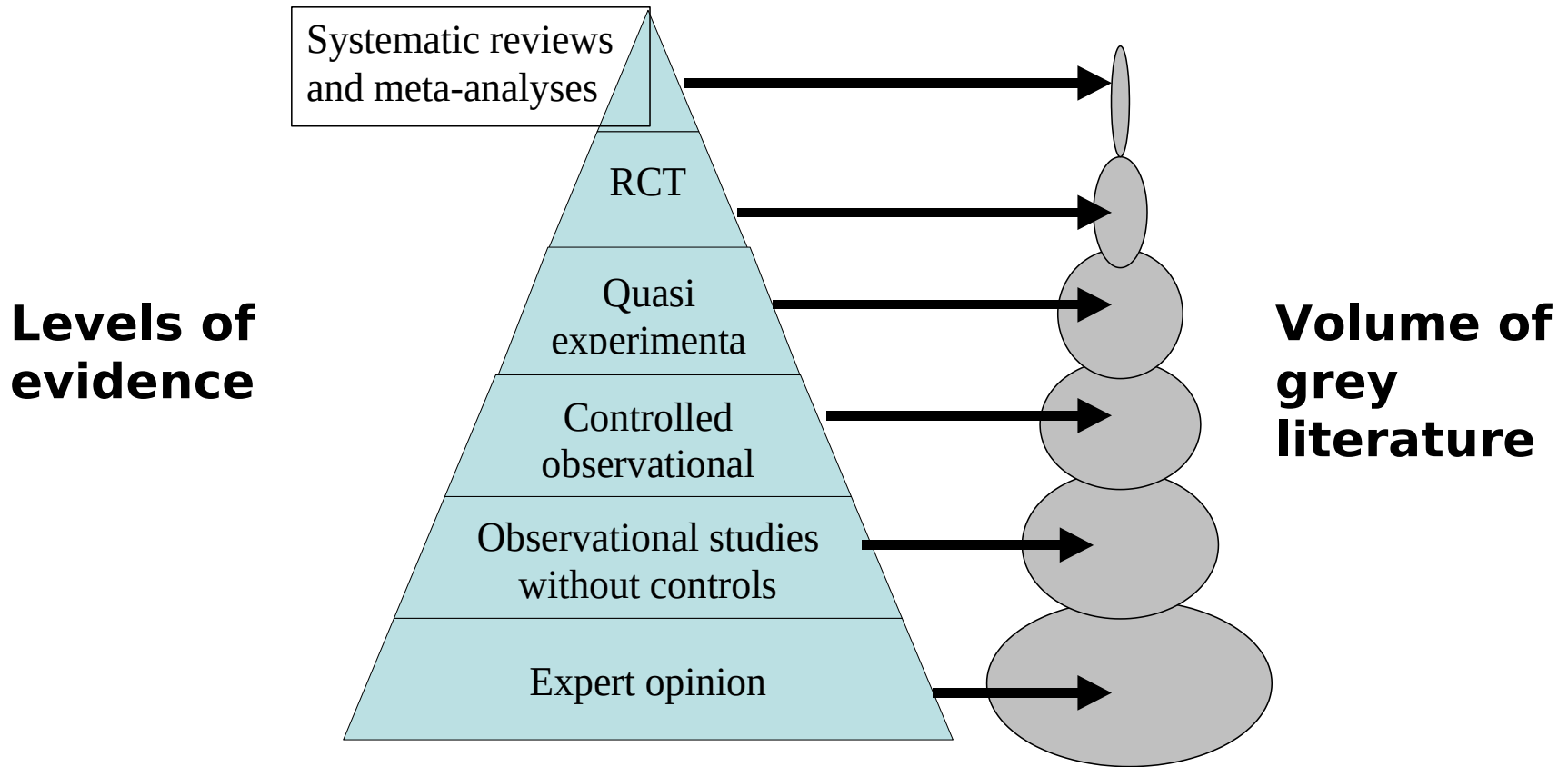
Evidence beyond RCTs



Evidence to Policy



Levels of evidence & volume of grey literature



Research Questions

- **Management of childhood malnutrition in complex emergencies**

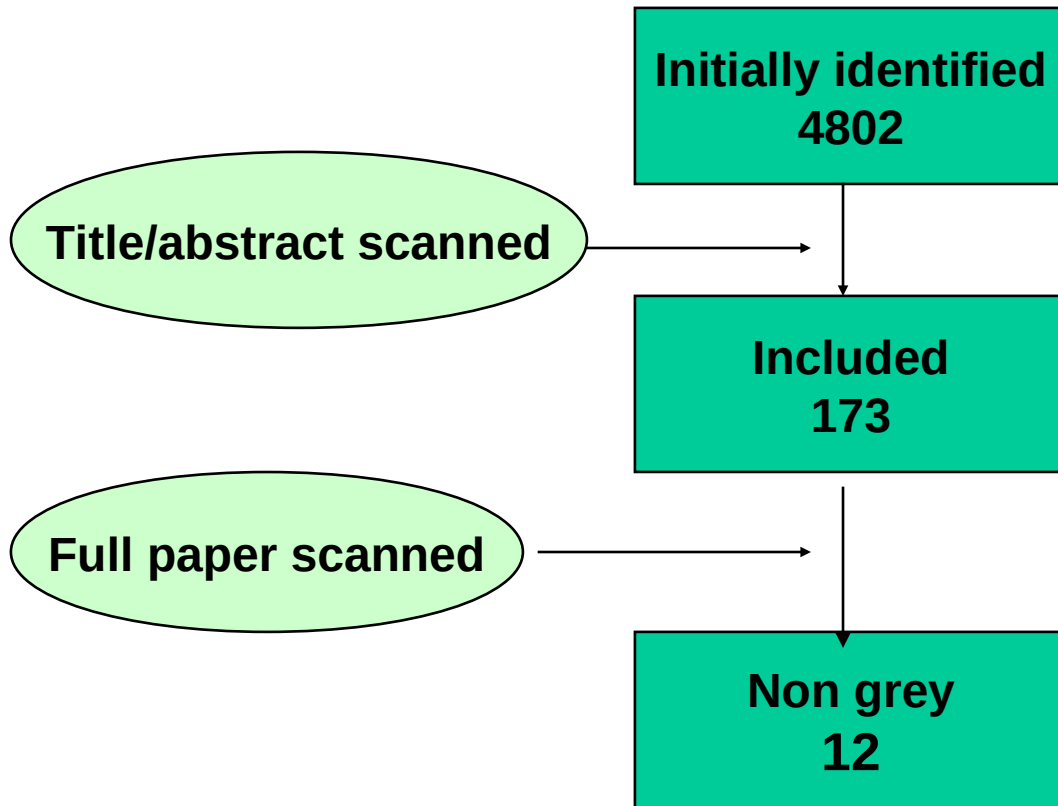


What is a Systematic Literature Review

- **Aim is to reduce uncertainty by a rigorous methodology that is:**
 - **Comprehensive**
 - **Transparent or explicit**
 - **Leads to minimum bias**
 - **Reproducible**



Childhood Malnutrition in Complex emergencies



Definition of grey literature

“Grey literature is defined as any literature that is not published in academic peer reviewed journals and available through indexed databases for review”



Search for grey literature

- **Call for information**
- **Personal and institutional contact**
- **World-wide web search**



Challenges for a representative search

- **Problems with call for information**
 - **personal interest/limitations**
- **Problems with personal and institutional contact**
 - **Staffs changes on NGOs**
- **World-wide web**
 - **large number and difficulties in filter**



Challenges for a representative search

- **Difficult to control bibliographically**
- **Grey database**
 - **not widely available**
 - **institutional subscribe**
 - **eg SIGLE (System for information on Grey Literature in Europe)**



Different type of grey literature

- **Annual reports**
 - **Theses/dissertations**
 - **Conference abstracts/proceedings**
 - **Working papers**
 - **Evaluation reports**
 - **Facts sheets and others**
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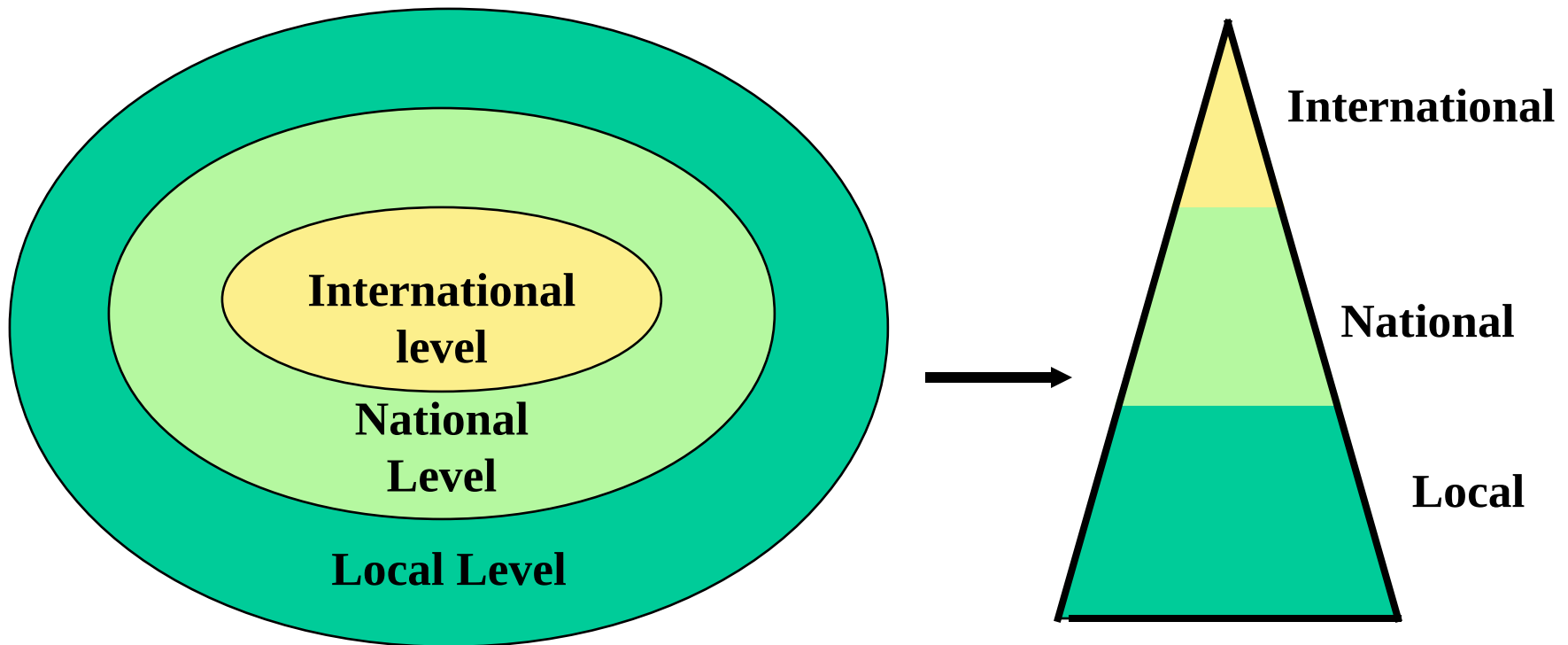


Searching for representative literature

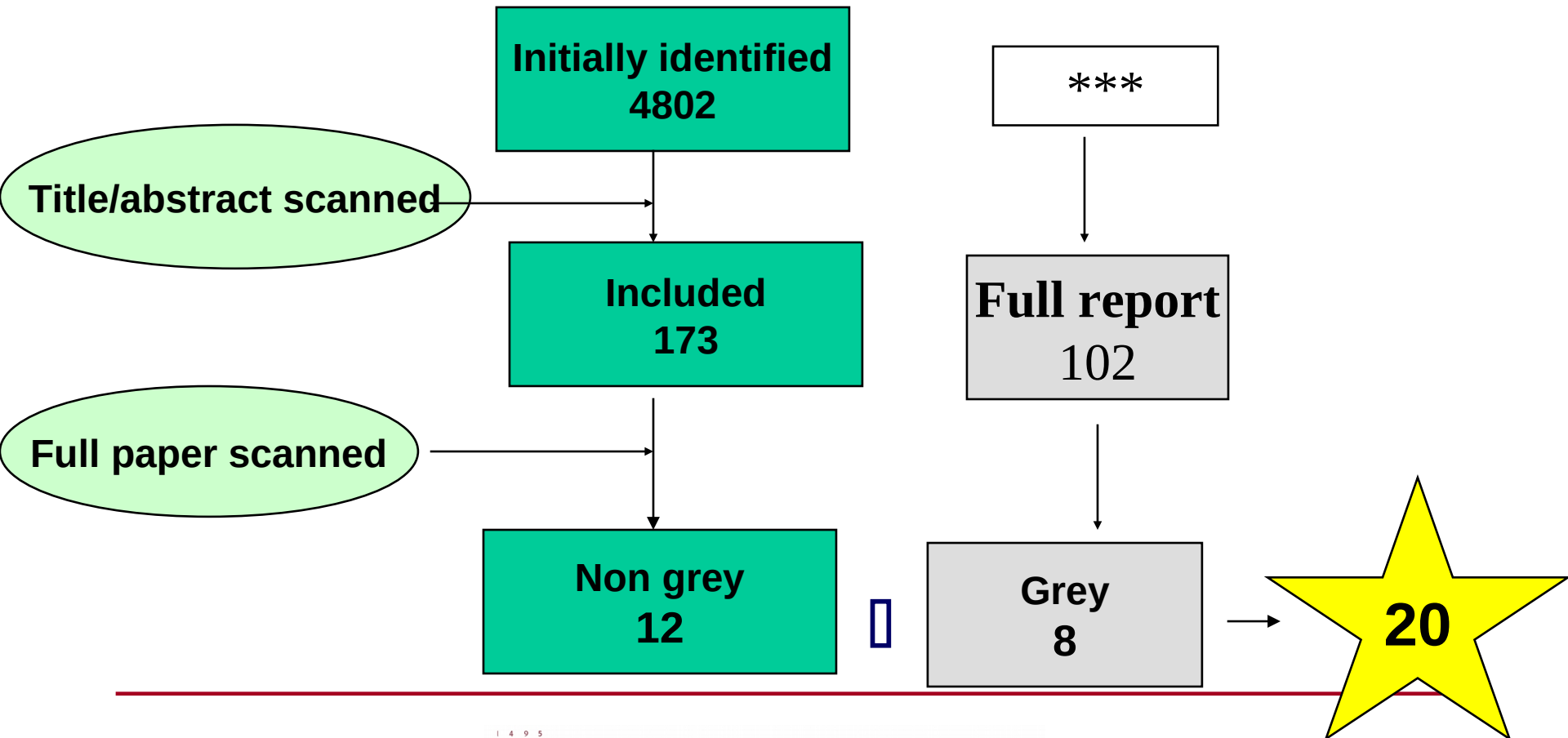
- **Which organisations?**
- **Which key opinions?**
- **Which databases?**
- **Which web sites?**



Framework for a representative search



Childhood Malnutrition in Complex emergencies



Advantages of including 'grey' in a literature review

- **Access to wider variety of information**
 - **Reduces publication bias**
 - **Contain more local information-
important for planning**
 - **Contain process information-
important for policy makers**
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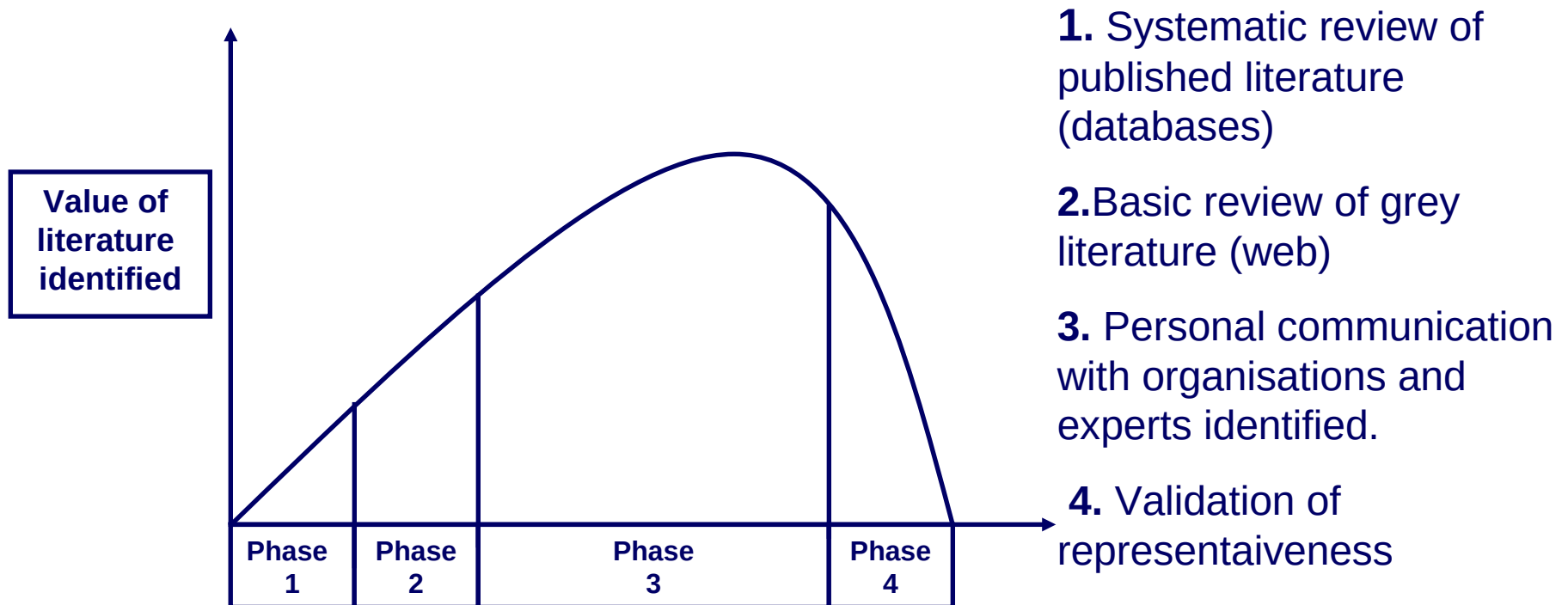


Advantages of including 'grey' in a literature review

- Reports not published in peer reviewed journals (e.g. UN, WHO, HTA)
- Access to new research
- World Wide Web (4-6 Billion web pages)
- Contain valuable and unique information, which is not found elsewhere



Searching for representative literature



Literature review framework

Process	Published literature	Grey literature
Searching for and locating appropriate literature	Standard tools and procedure developed	<ol style="list-style-type: none"> 1. Call for information 2. Personal and institutional contact 3. World-wide web base search and grey literature data base search
Critically examining the results and extracting relevant details		<ol style="list-style-type: none"> 1. Assessment of methodological quality 2. Data extraction
Synthesising and writing the review		<ol style="list-style-type: none"> 1. Combination with other evidence 2. Same as peer reviewed



Conclusion

- **The identification of relevant studies in the grey literature and their inclusion in systematic reviews can be particularly time-consuming and difficult.**
 - **However, the inclusion of grey literature in systematic reviews will help to overcome some of the problems of publication bias and evidence for process and context**
 - **PREN at Aberdeen University is taking forward the development the tools which can be used to review the grey literature**
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For further information

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Questions and comments

