### What makes evidence based clinical practice guidelines and recommendations credible? A joint venture between information specialists and methodologists

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### **CLINICAL GUIDELINES**

"systematically developed statements to assist practitioner and patient decisions about appropriate health care for specific clinical circumstances."

*Field MJ, Lohr KN (editors). Institute of Medicine Committee to Advise the Public Health Service on Clinical Practice Guidelines. Clinical practice guidelines: directions for a new program. Washington DC: National Academy Press; 1990* 



# THREE MAIN CHARACTERISTICS







# MULTIDISCIPLINARY GROUP

.... any member of the assembly, taken separately, is certainly inferior to the wise man. But the state is made up of many individuals. And as a feast to which all the guests contribute is better than a banquet furnished by a single man, so a multitude is a better judge of many things than any one individual .....

Aristotele "Politica"

### MULTIDISCIPLINARY GROUP



# SKILLS NEEDED FOR GUIDELINE DEVELOPMENT

- Literature searching and retrieval
- Epidemiology
- Biostatistic
- Health services research
- Clinical expertise
- Nursing care
- Consumer's empowerment
- Group process expertise
- Writing and editing

### **SYSTEMATIC SEARCH**



### **GRADING SYSTEM**

#### Classification schemes

Category of evidence:

Ia-evidence for meta-analysis of randomised controlled trials

Ib—evidence from at least one randomised controlled trial

IIa—evidence from at lease one controlled study without randomisation

IIb—evidence from at lease one other type of quasi-experimental study

III—evidence from non-experimental descriptive studies, such as comparative studies, correlation studies, and case-control studies

IV—evidence from expert committee reports or opinions or clinical experience of respected authorities, or both

- **A Net benefits** = the intervention clearly does more good than harm.
- **B Trade-offs** = there are important trade-offs between the benefits and harms.
- **C Uncertain trade-offs** = it is not clear whether the intervention does more good than harm.
- **D No net benefits** = the intervention clearly does not do more good than harm.

The extent to which one can be confident that an estimate of effect or association is correct.

The extent to which one can be confident that adherence to a recommendation will do more good than harm.



# What makes evidence based clinical practice guidelines and recommendations credible?

#### WHAT:

Diabetes Pre-operative examinations Pressure sores

#### WHERE:

- Medline, Embase, Cinahl
- National Guideline Clearinghouse, Guideline Finder, PNLG, SIGN, NICE, ANAES

#### HOW:

descriptor [MAJR] AND (guidelines [DE] OR guideline [PT]). Limits: 1995-2005; English, French, Spanish and Italian [la]

### RESULTS

#### HOW MANY GUIDELINES ? Problems with retrieving our sample data

#### **BIBLIOGRAPHIC DATABASES**

ΤΟΡΙΟ	UNIQUE RECORDS	TRUE GUIDELINES
Diabetes	307	9
Preoperative examinations	30	6
Pressure sores	79	2

#### **WEBSITES**

ΤΟΡΙΟ	RECORDS
Diabetes	47
Preoperative examinations	4
Pressure sores	12

# MEDLINE

### Two Mesh terms:

### - Guidelines

A systematic statement of policy rules or principles. Guidelines may be developed by government agencies at any level, institutions, professional societies, governing boards, or by convening expert panels. The text may be cursive or in outline form but is generally a comprehensive guide to problem and approaches in any field of activity. For guidelines in the field of health care and clinical medicine, PRACTICE GUIDELINES is available. Year introduced: 1993

### - Practice Guidelines

Directions or principles presenting current or future rules of policy for assisting health care practitioners in patient care decisions regarding diagnosis, therapy, or related clinical circumstances. The guidelines may be developed by government agencies at any level, institutions, professional societies, governing boards, or by the convening of expert panels. The guidelines form a basis for the evaluation of all aspects of health care and delivery.

Year introduced: 1993

# MEDLINE

### **Publication Type**

Work consisting of a set of directions or principles to assist the health care practitioner with patient care decisions about appropriate diagnostic, therapeutic, or other clinical procedures for specific clinical circumstances. Practice guidelines may be developed by government agencies at any level, institutions, organizations such as professional societies or governing boards, or by the convening of expert panels. They can provide a foundation for assessing and evaluating the quality and effectiveness of health care in terms of measuring improved health, reduction of variation in services or procedures performed, and reduction of variation in outcomes of health care delivered. Year introduced: 1992

### **EMBASE**

- Descriptor: PRACTICE GUIDELINE (without definition)
- No Publication Type
- Only Synonyms:
  - clinical practice guidelines; guideline adherence; guidelines; practice guidelines

### BIBLIOGRAPHIC DATABASES: PROBLEMS

Supplements

Scientific Societies

# WHO PRODUCED CLINICAL PRACTICE GUIDELINES?

 INTERNATIONAL AGENCIES AND/OR TECHNOLOGY ASSESSMENT AGENCIES
 published only on their websites

SCIENTIFIC SOCIETIES
 published on medical journals

## **WEBSITES: PROBLEMS**

- National Guidelines Clearinghouse provides complete summaries for each guideline specifying all relevant information
- A retrieval tool is still lacking: we need a kind of metaregister allowing a quick and effective way of retrieving good quality guidelines

MAIN RESULTS Working groups

 Multidisciplinary groups: all disciplines involved

Multiprofessional groups

### MAIN RESULTS Search Strategy

Poor description:

 Terms and strategies
 Databases

- Handsearching
- Cochrane Library

### MAIN RESULTS Grading

Level of evidence

Strength of recommendations

No common approach

# CONCLUSIONS

- Multidisciplinarity: a change in culture and additional training
- Search strategy: systematic literature search for systematically developed statements
- Grading: explicit judgements

