

## Cochrane Reviews along with Guidelines – Analysis of the benefit for the user



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## Agenda

- Background: German Medical eLibrary  
([www.arztbibliothek.de](http://www.arztbibliothek.de))
- Pilot Study: Cochrane Reviews along with current  
Guidelines – Analysis of the benefit for the user
- Conclusions

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## Background: German Medical eLibrary

- For physicians and interested lay persons
- Contains quality assessed information independent from healthcare industry a.o.:
  - Current evidence based German clinical practice guidelines (n= 280) along with
  - Patient information
  - **Abstracts of Cochrane Reviews of the last 5 years (2006-2011, n= 3072)**
  - Certified CME

## Background: German Medical eLibrary



**Arztbibliothek**  
Ein Service der Kassenärztlichen Bundesvereinigung  
und der Bundesärztekammer

KBV BÄK

Sie sind hier: Startseite

Suche Leitlinien in...

**Topic**

Neuigkeiten

Beitrag zur Nationalen VersorgungsLeitlinie (NVL) "Nierenerkrankungen bei Diabetes im Erwachsenenalter" erschienen 05.07.2011

Online-Fortbildung leicht zu finden: CME-Angebote der Arztbibliothek 05.07.2011

Neues Internet-Portal zur

Ärztliches Handeln verlangt zuverlässiges und aktuelles Wissen. Die zunehmende Informationsflut macht es jedoch immer schwieriger und aufwändiger, vertrauenswürdige und nützliches Wissen zu identifizieren. KBV und BÄK möchten deshalb mit der ARZTBIBLIOTHEK medizinisches Wissen gezielter verfügbar machen.

**Ich suche**

Depression

Bitte wählen Sie aus, welche Dokumente Sie sich anzeigen lassen möchten:

- Leitlinien
- Cochrane-Reviews
- Patienteninformation
- Evidenz-HTA-Berichte
- Fortbildung
- Arzneimittelinformation
- Literatursuche/Lexika
- Patientensicherheit
- Qualität in der Medizin
- Rechtsquellen
- Themen von A - Z

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## Background: German Medical eLibrary - aCR 2006-2011

**Im Kontext**

- Leitlinien (3)
- Cochrane Reviews (37)
- Patienteninformation (10)
- CHE Angebote (8)

Suche i Leitlinien in...

1/-/2011  
Call up for guidelines:  
n= 6.183

Call up for Abstracts of Cochrane Reviews (aCR):  
n= 2.176

35% use of aCR

**2011**

**Compulsory community and involuntary outpatient treatment for people with severe mental disorders**  
Kisely SR, Campbell LA, Freston MD ; 2011  
Leitlinienthema: Depression, Psychotische Störungen, Akute, Schizophrenie

**Pharmacologic treatment of depression in multiple sclerosis**  
Koch MW, Glazenborg A, Uyttenboogaart M, Nostert J, De Keyser J ; 2011  
Leitlinienthema: Depression, Multiple Sklerose

**2010**

**Acupuncture for depression**  
Smith CA, Ray PF, Macpherson H ; 2010  
Leitlinienthema: Depression

**Antidepressants for depression in physically ill people**  
Rayter L, Price A, Evans A, Valaraj K, Higginson EJ, Holzapfel M  
Leitlinienthema: Depression, Rehabilitation

**Fluvoxamine versus other anti-depressive agents for**  
Omori JM, Watanabe R, Nakagawa A, Cipriani A, Barbui C, H TA ; 2010  
Leitlinienthema: Depression

**Pharmacological treatment for depression during opioid agonist treatment for opioid dependence**  
Pani PP, Vasco R, Togo E, Amato L, Davoli M ; 2010

Cochrane Database Syst Rev. 2010 Jan 20;(1):CD00  
**Acupuncture for depression.**  
Smith CA, Ray PF, Macpherson H  
Centre for Complementary Medicine Research, The U

**Abstract**  
**BACKGROUND:** There is interest from the com  
evidence supporting the use of acupuncture to  
**OBJECTIVES:** To examine the effectiveness and  
**SEARCH STRATEGY:** The following databases:  
EMBASE (1980 to Dec 2008), PSYCINFO (1874  
to Dec 2008). The following terms were used:  
**SELECTION CRITERIA:** inclusion criteria include  
pharmacological treatment, other structured ps

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## Pilot Study: aCR along with guidelines

### Aim:

- To analyze the incremental benefit of information of abstracts of Cochrane Reviews (aCR) of the last 5 years for users of current clinical guidelines

### Questions:

- How many aCR published within the search date of current guidelines are used in the guidelines?
- To what extent are new aCR published during the period guidelines are valid?
- What kind of information do these aCR provide?

## Pilot Study: Methodology

### Methodology:

- Eligibility criteria for guidelines: common disease, current evidence-based guideline covering diagnostic and therapy in German or English  
(max. 4 diseases and 4 guidelines per disease – pilot study)
- Guideline and aCR selection 02/2011
- Analysis of aCR information according to 4 categories: additional topics, more specific, discordant or concordant information compared to guidelines

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## Pilot study: Results - Guidelines and aCR

### Results of selection:

- 4 German guidelines and  
8 international guidelines  
  
→ 12 guidelines (2007-2010) and 85 aCR (2006-2/2011)
- **Heart failure:** 4 guidelines (NDMG, SIGN, ACCF, NICE) / 10 aCR
- **Depression:** 3 guidelines (NDMG, APA, NICE) / 35 aCR
- **Lung cancer:** 2 guidelines (GRS, ACCP) / 15 aCR
- **Breast cancer:** 3 guidelines (GCS, NZGG, NICE) / 25 aCR

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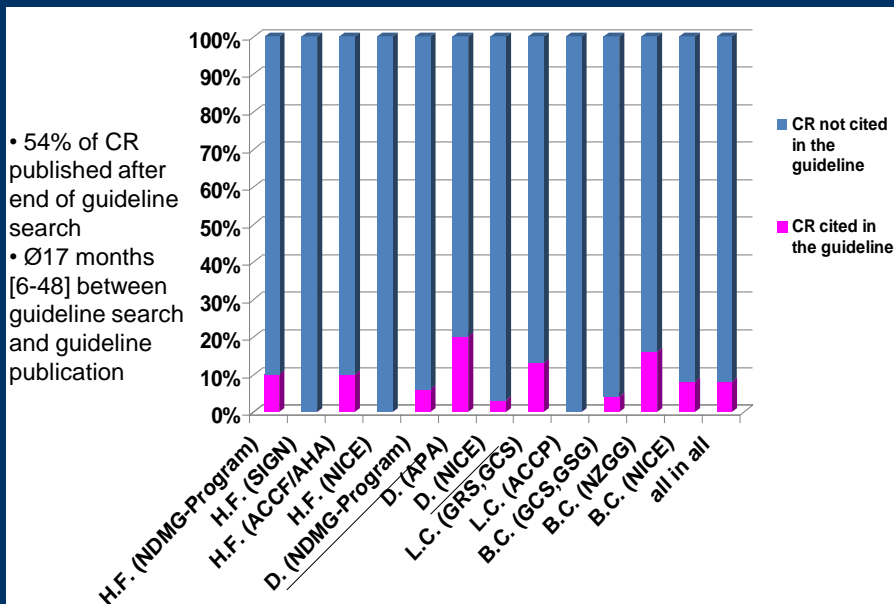
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## Results: Publication and Search Dates

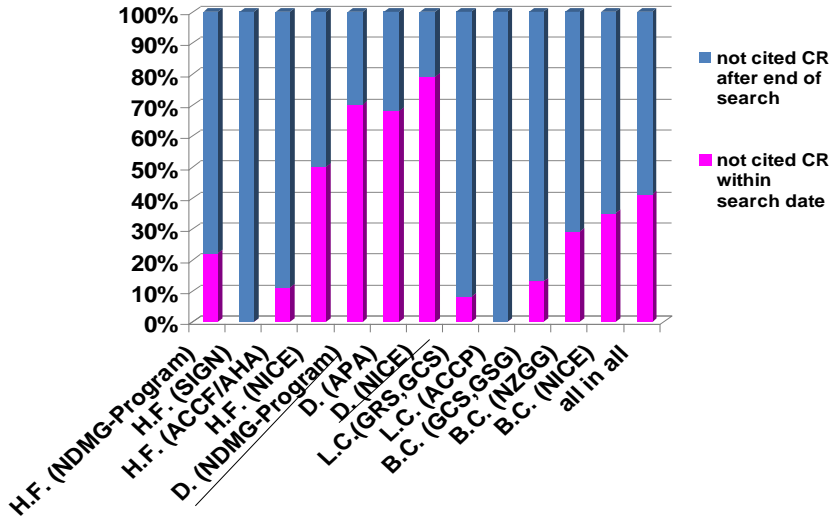
Guidelines	Publication date / End of the validity	End date of guideline literature search	Cochrane Reviews published after end date of guideline search (%)
<b>Chronic heart failure:</b> <ul style="list-style-type: none"> <li>SIGN</li> <li>ACCF/AHA</li> <li>NDMG-Program</li> <li>NICE</li> </ul>	2007/2012 2009/2014 2009/2013 2010/2015	2005 12/2007 07/2008 10/2009	100% 80% 70% 50%
<b>Depression:</b> <ul style="list-style-type: none"> <li>NDMG-Program</li> <li>NICE</li> <li>APA</li> </ul>	2009/2013 2010/2015 2010/2015	06/2009 12/2009 05/2009	31% 20% 26%
<b>Lung Cancer:</b> <ul style="list-style-type: none"> <li>ACCP</li> <li>GRS/GCS</li> </ul>	2007/2011 2010/2015	09/2005 12/2006	100% 80%
<b>Breast Cancer:</b> <ul style="list-style-type: none"> <li>GCS/GSG</li> <li>NICE</li> <li>NZGG</li> </ul>	2008/2012 2009/2013 2009/2014	12/2006 06/2008 02/2008	80% 60% 60%



## Results: Citation of CR in guidelines



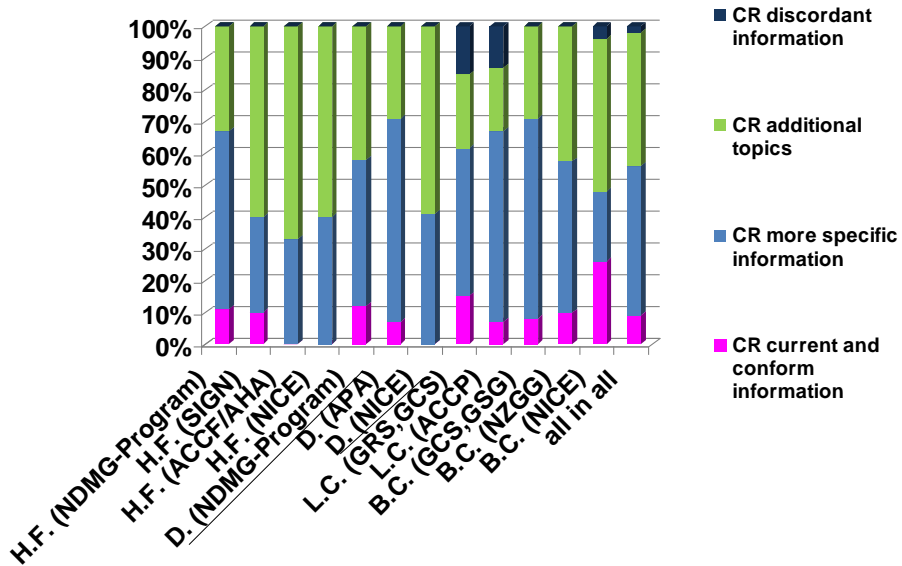
## Results: Non Citation of CR in guidelines



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## Results: Information of aCR compared to guidelines

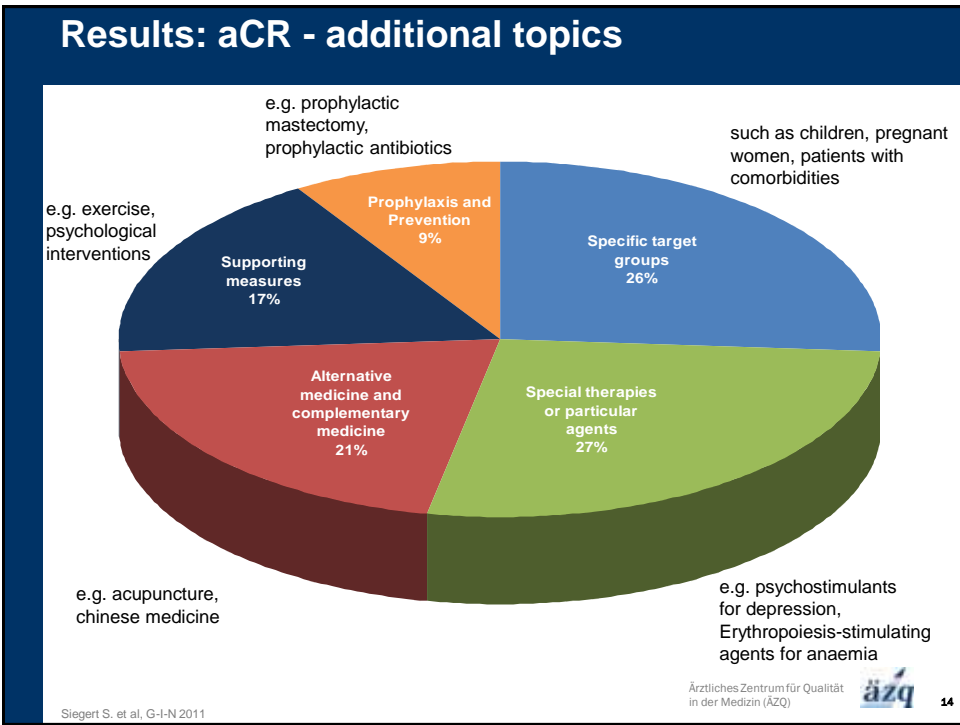
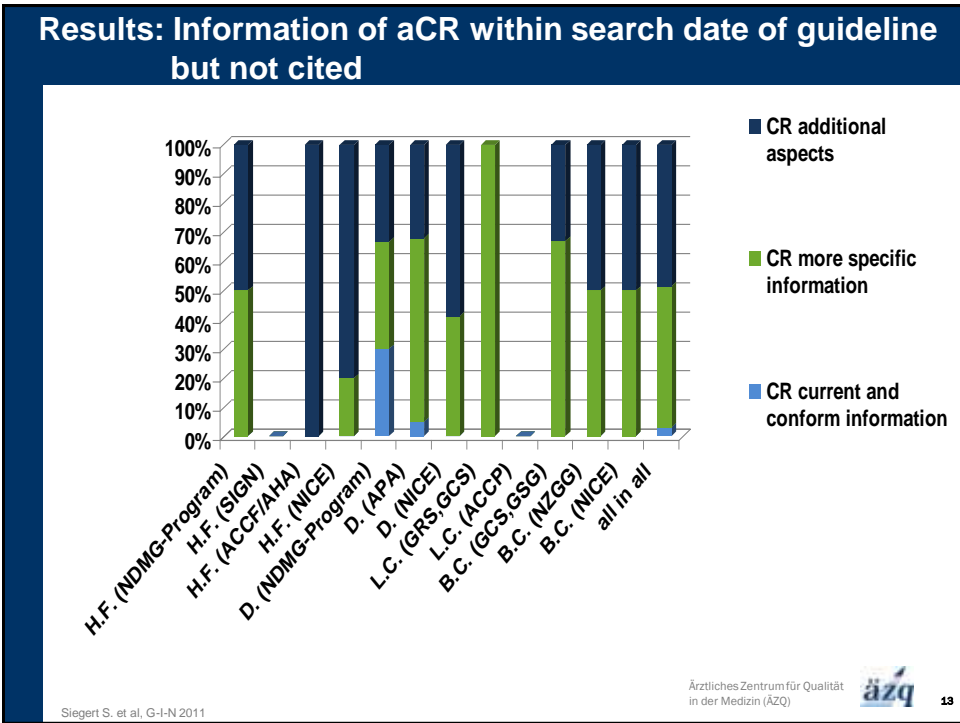


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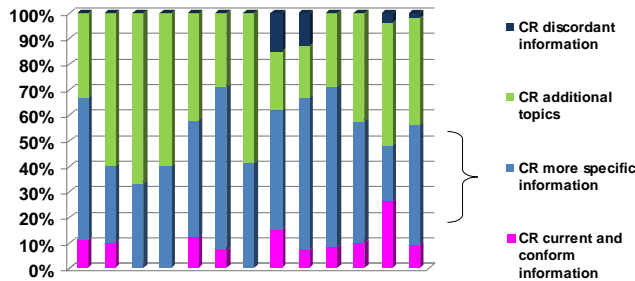
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## Results: aCR - more specific information



**Heart failure:** exercise based rehabilitation for heart failure, structured telephone support or telemonitoring programmes for patients with chronic heart failure

**Depression:** specific medication for depression and comorbidity, interventions to improve occupational health in depressed people

**Lung cancer:** specific palliative radiotherapy for a specific entity of lung cancer, comparison of different chemotherapy-schemes for a specific entity of lung cancer

**Breast cancer:** Addition of drug/s to a chemotherapy regimen for metastatic breast cancer, Methods of communicating a primary diagnosis of breast cancer to patients

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## Results: aCR- discordant information

### 5 cases of discordant information (2%)

#### 3x Intervention recommended in Guideline, not in aCR

- aCR concludes because of potential harm (Overall Survival = OS ↓) not to use intervention erythro- or darbopoetin for better quality of life in lung cancer, guideline recommends it (weak rec.)

- aCR concludes no practical recommendation can be drawn for use of morphin/codein, both guidelines for lung cancer give a weak recommendation

#### 2x Intervention stated without proved benefit in Guideline, but with effect in aCR

- aCR states better recurrence free survival und OS with preoperative chemotherapy in lung cancer, guideline states no proved effect and does not recommend preoperative chemotherapy

- aCR states no negative effect of hypofractionation in breast cancer radiation from weak evidence, guideline states research question

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## Limitations

- Selection and representativeness of the analyzed guidelines
- mostly descriptive analysis; no analysis of the reasons for use/non use of CR
- Analysis of the contents of CR is based on the abstract and not on the full-text; conclusions of aCR could possibly distort the results of the CR

**Olsen O. et al, BMJ 2001 (n=53)** : Analysis of CR 1998: The evidence did not fully support the conclusion in nine reviews (17%), the conduct or reporting was unsatisfactory in 12 reviews (23%), and stylistic problems were identified in 12 reviews (23%). The problematic conclusions all gave too favourable a picture of the experimental intervention.

- Guideline Recommendations include clinical expert judgement, conclusions in CR are only based on study findings – not 1:1 comparable

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## Conclusions

- aCR indexed in the context of guidelines offer substantial supplementary information for all analyzed guidelines, especially more specific aspects and additional topics
  - users with focused interest might benefit most
- There is only little conflicting information – only 2% aCR provide information discordant from guideline recommendation
- We conclude that our concept to put aCR in the context of a guideline theme is a useful service\* – still we would look forward to be able to provide full texts

\* internationally about 60% of CR are only read as abstract [08/11 Cochr. Coll.]

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## Thank you for your attention!

No conflicts of interest declared,  
Dr. Antes and Dr. Bluemle are members of the Cochrane Collaboration

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