



Faculty of Humanities

# Bilingual Practices in Higher Education in Northern Europe:

## A case for terminology planning?

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## Outline

- Background
- Research Question
- Methodology
- Data
- Results
- Implications
- Conclusion



## Background: The Danish 'domain loss' debate

- Denmark 'expanding circle' (Kachru 1985) country
- Debate on 'domain loss' in science
  - Lack of 'Danish' scientific terms
  - Language shift



## Background: The Danish 'domain loss' debate

- Lack of Danish scientific terms may prompt speakers to switch to and continue talking in English (Kirchmeier-Andersen 2008, director of the Danish Language Council).
- Systematic work is needed to bring English scientific terms into Danish. Otherwise they will be used as they are and the result will be a mixture of Danish and English. If this mixture becomes too strange or cumbersome, people will give up speaking and writing in Danish (Olesen Larsen 2005, Danish professor of biochemistry).
- The Danish Language Council is able to offer advice on how to adapt (orthographically, phonologically and morphologically) English terms into Danish so that they cease being 'foreign', e.g. English 'chloride' => Danish 'klorid' (Davidsen-Nielsen 2005, chairman of the Danish Language Council).



## Research questions

- To what extent are concerns about 'domain loss' empirically warranted?
  - H1: Loans from English in spoken scientific Danish need to exceed 0.6% found in everyday language (Rathje 2010)
  - RQ1: Are there differences within the domain of science?
  - RQ2: What type of loans occur?



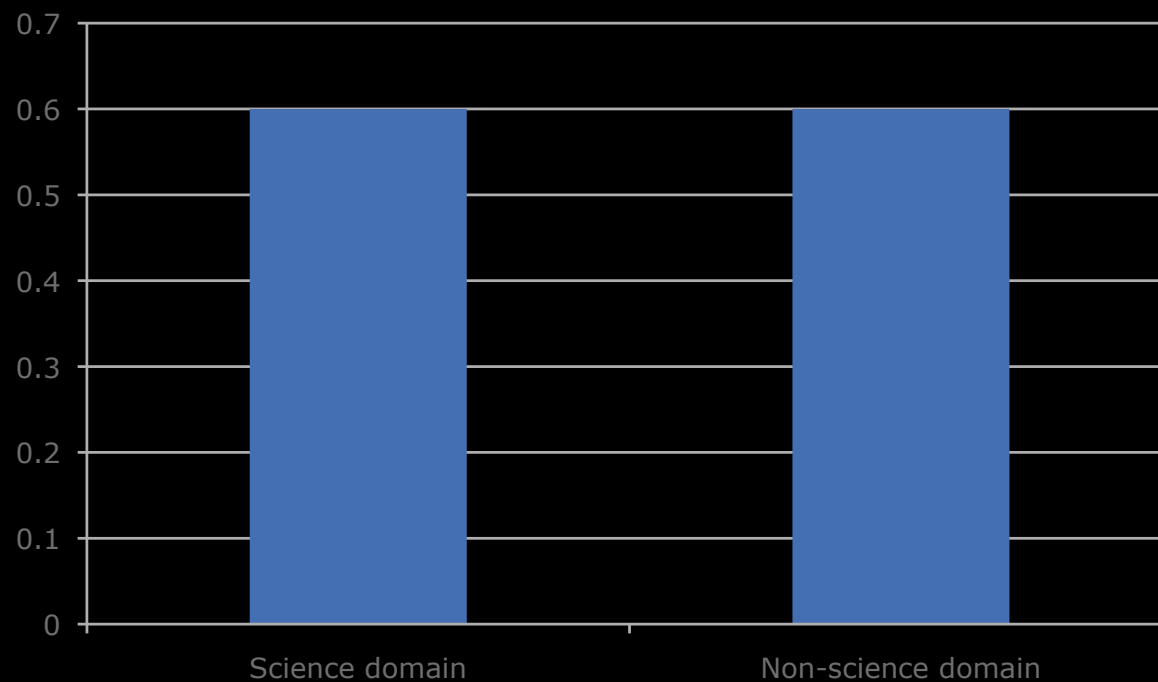
## Data

- 10 five-minute transcripts of naturally occurring science talk in Danish
  - Undergraduate teaching sessions at the University of Copenhagen
    - Physics
    - Chemistry
    - Computer Science
  - 2 modules in each discipline
  - 2 teaching sessions
    - Lecture
    - Exercise class



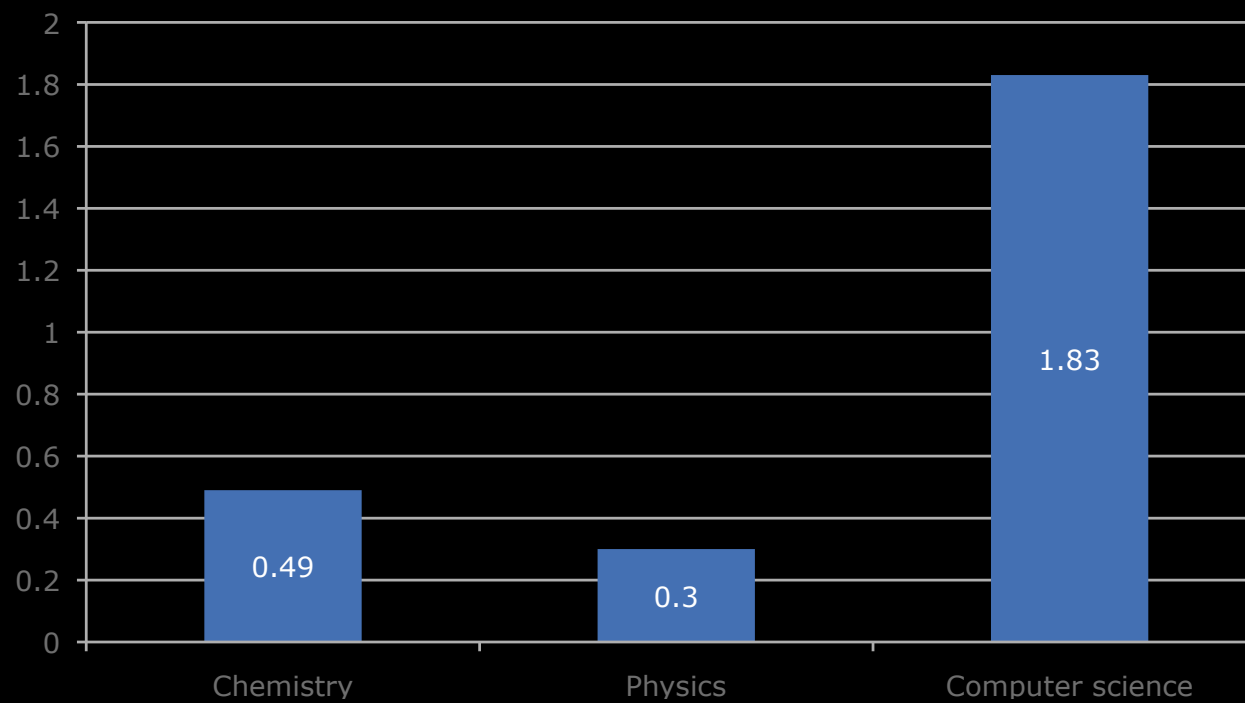
## Results

H1: Loans from English in spoken scientific Danish need to exceed 0.6% found in everyday language (Rathje 2010)



## Results

RQ1: Are there differences within the domain of science?





## Results: RQ2: What type of loans occur?

Loan (type)	Loan (tokens)			
	Chemistry (3084; 4)	Physics (1354; 2)	Computer (2508; 4)	Total (6946; 10)
OK	4	3	13	20
start (and derivatives)	7	0	7	14
smart	2	1	1	4
tjekke	1	0	0	1
test	0	0	1	1
matcher	0	0	1	1
elektronerne	0	0	1	1
cykelpumpe	1	0	0	1
Unicode	0	0	3	3
Turing-test	0	0	1	1
JAVA-streng (and derivatives)	0	0	2	2
ASCII-alfabetet	0	0	1	1
ASCII-definition	0	0	1	1
ASCII-tegn	0	0	1	1
Javadoc-kommentarer	0	0	1	1
Fortran	0	0	1	1
Vi	0	0	1	1
Emacs	0	0	1	1
C++-beregning	0	0	1	1
C++-specifikationen	0	0	1	1
C-streng	0	0	1	1
in-data	0	0	1	1
IFX	0	0	2	2
IF	0	0	1	1
garbage in garbage out-princip (and derivatives)	0	0	2	2
<b>Total</b>	<b>15 (0,49 %)</b>	<b>4 (0,30 %)</b>	<b>46 (1,83 %)</b>	<b>65 (0,94 %)</b>

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## Results: summary of main findings

- Greater variation *within* than *between* 'domains'
- Loans are
  - 'Necessary' loans (Onysko and Winter-Froemel 2011)
  - 'Loans'?



## Conclusion

- 'Domain loss' unhelpful
- Further research
  - science talk on cutting-edge topics



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