## From Child to Adult with Cystic Fibrosis - a PhD study



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# How do we prepare adolescents with cystic fibrosis (CF) for adult life ?

- the adolescents' and parents' perspectives

## Outline

- Background
- Aim
- Qualitative study:
  - Parenting adolescents with cystic fibrosis

outline

- Questionnaire survey:
  - Barriers to adherence in CF
  - Support from the CF centre
- Conclusions
- Implications

## Adolescents with CF

- Reduction in lung function
- Psychosocial and psychiatric problems
  - Depression
  - Anxiety
  - Eating disturbances/eating disorders
- Risky behaviour
- Quality of life

## Chronic diseases in general: Parenting adolescents

- Parents are the best allies (Taylor 2008)
- Support 
  good adherence (Kyngäs 2001)
- Supervision  $\implies$  good adherence (Wysocki 2006)
- Premature withdrawal  $\implies$  low adherence (Wysocki 2006)
- Support good quality of life (Botello-Harbaum 2008)

## **Cystic fibrosis:** Parenting adolescents

- Little supervision  $\implies$  low adherence (Modi 2008)
- Families with only little support, warmth and openness is low adherence (DeLambo 2004)
- Better family functioning → better quality of life (Szyndler 2005)
- Non-supportive behaviour 
   psychological
   maladjustment (Graetz 2000)

# Adherence in adolescents with cystic fibrosis

- Low adherence → reduction in lung function
- Adherence vary depending on:
  - Kind of treatment
  - Age
  - Gender
  - Method of assessment
  - Family functioning

## Barriers to adherence

## Adolescents with CF:

- Treatment burden
- Lack of time
- Forgetfulness



# Adolescents' preferences for health care

- Physicians should be honest with them
- Participation in own care
- Their viewpoints and concerns should be taken seriously
- Information should be communicated directly to them

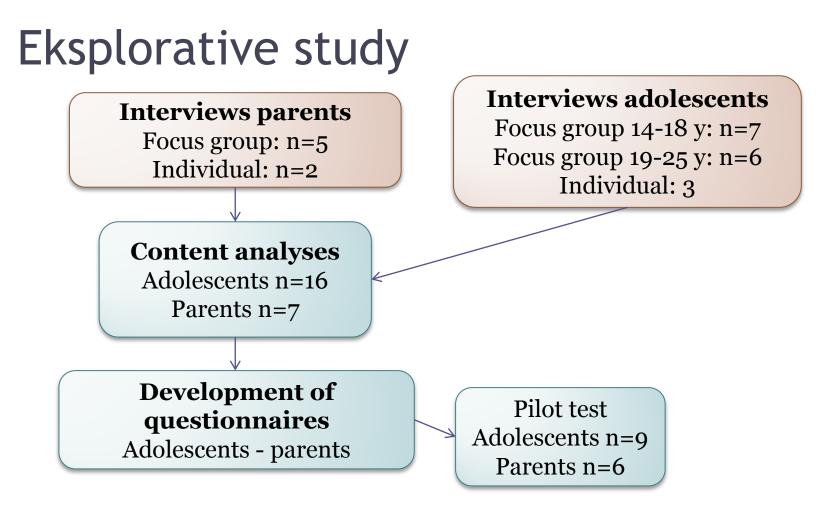
## Summary of the background

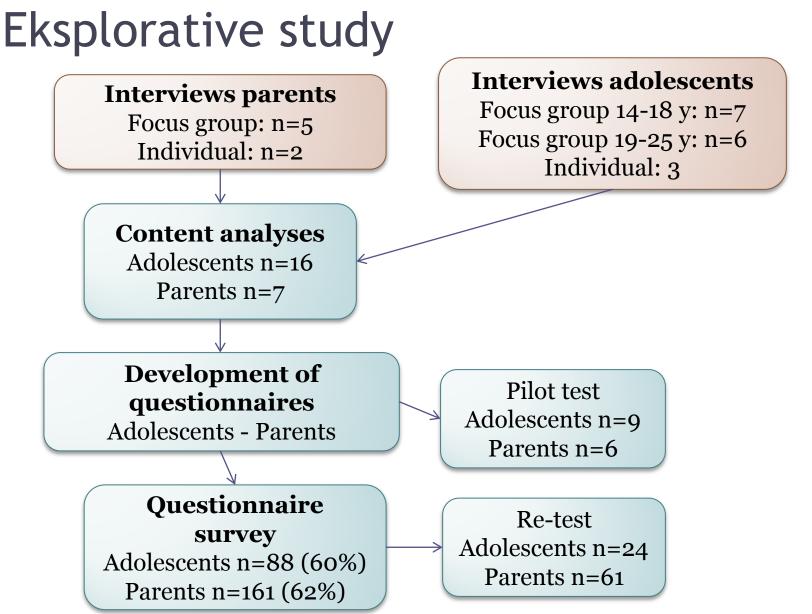
- Reduction in lung function
- Low adherence
- Risk of psycho-social problems
- Supervision and family function influences adherence
  - The adolescents' wishes for parental support is not yet investigated
- Only few studies about barriers to adherence
  - The parents' perspective is not yet investigated
- Only few studies about the adolescents' and parents' requests for support from the CF centre

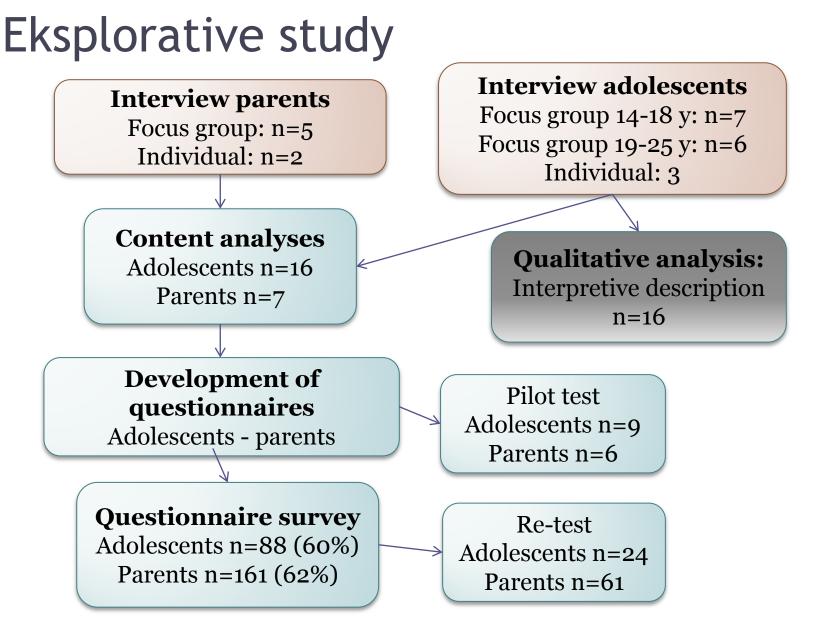
## **Eksplorative study**

### **Interviews parents**

Focus group: n=5 Individual: n=2 Interviews adolescents Focus group 14-18 y: n=7 Focus group 19-25 y: n=6 Individual: 3







## Aim

What kind of support do the adolescents want
 from their parents?

aim

- 2. Barriers to adherence?- the adolescents' and parents' perspectives
- 3. What kind of support do the adolescents and their parents want
  - from the health care system?

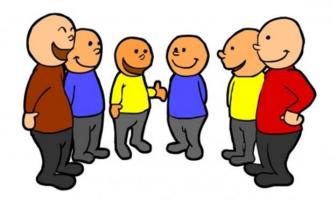
## Qualitative part - interview

- What kind of support do the adolescents want
   from their parents?
- 2. Barriers to adherence?- the adolescents' and parents' perspectives
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  - from the health care system?

method

# Method (1)

- Interviews of adolescents with CF
  - Focus groups
  - Individual interviews
- Qualitative analysis
  - Of selected topic
  - Secondary analysis
  - Interpretive description



#### method

## Interview guide

Support from the CF centre in the transition to adult life:

- Handling the disease in everyday life
- Balance between autonomy and adherence
- Risky behaviour
- The parents

## Results

## Adolescents with CF:

Parents need support in handling adolescents with CF – they need to learn:

- A pedagogical parenting style
- To trust the adolescents
- To gradually hand over the responsibility for the treatment

## A pedagogical parenting style

- Parents should have a dialogue with the adolescents about the treatment
- Parents should give reasons and explanations for the treatments
- Adolescents wished their parents would forget about the disease now and then and treat them as any other adolescent

"If I had got a coin every time my mum or dad said, "Did you remember to take your treatment?" I would be a millionaire today"

Man 15 years

## Trust

 Parents should trust the adolescent and not always check whether the adolescents had taken their medication

"My father wanted to control, to control things. So when I was going to take over, we had many discussions because he would not let me, yes, he wanted to, but then he got anxious, if I could, if I was mature enough"

Woman 22 years

## Responsibility

• The parents should involve the adolescents at an early age in making decisions about treatment and healthcare

results

• The CF centre should guide parents in handing over responsibility

Tell them [the parents] that they should try for just one week and then see how it is. To ignore the disease for a week and then see if you [the adolescent] can handle it. And if you cannot, then they can interfere

Woman 22 years

conclusion

## Conclusion

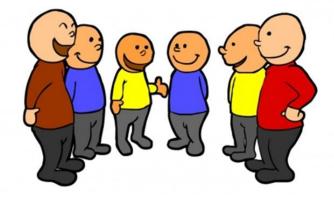
The adolescents: Parents need to learn skills to help the adolescents better manage their disease

# Quantitative part - questionnaires

- What kind of support do the adolescents want
   from their parents?
- 2. Barriers to adherence?- the adolescents' and parents' perspectives
- 3. What kind of support do the adolescents and their parents want
  - from the health care system?

# Method (2)

- Interviews of adolescents with CF and their parents
  - Focus groups
  - Individual interviews
- Content analysis
  - Questionnaire for the adolescents
  - Questionnaire for the parents



methods

## Questionnaires

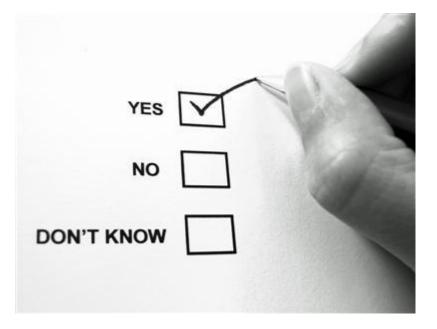
- 1. Barriers to adherence
- 2. Adherence
- 3. Reactions from mother father the adolescent
- 4. Communication about CF in the family
- 5. Support from the CF centre

participants

## Participants

## Adolescents 88 (60 %)

Parents 161 (62 %)



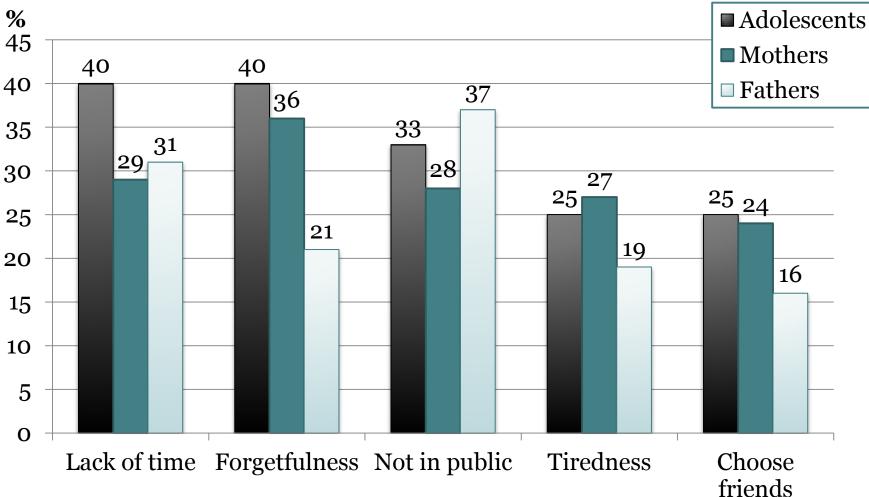
method

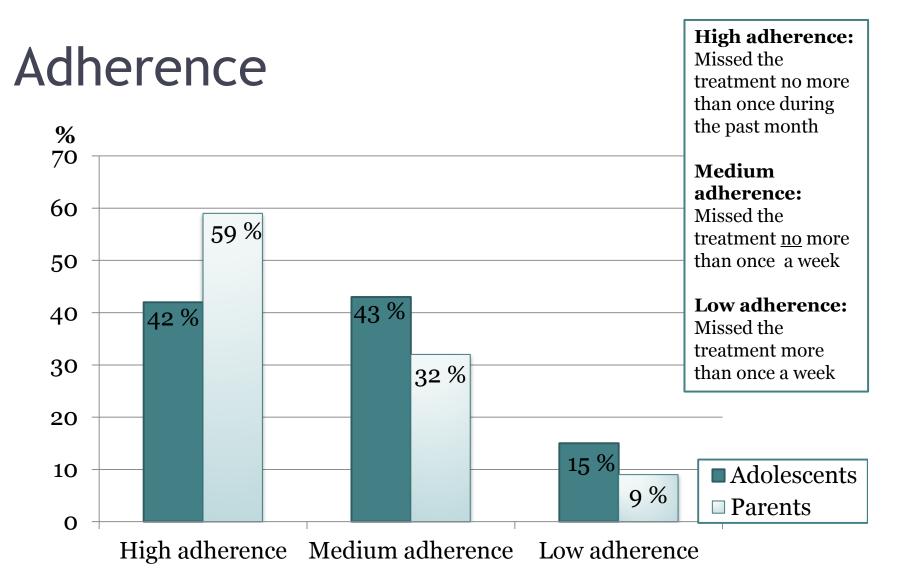
## Barriers to adherence?

- 1. It is difficult for me to find time to take CF treatment
- 2. I often forget to take CF treatment
- 3. I often choose to be with friends instead of taking CF treatment
- 4. I am often too tired to take CF treatment
- 5. I will not take CF treatment in public

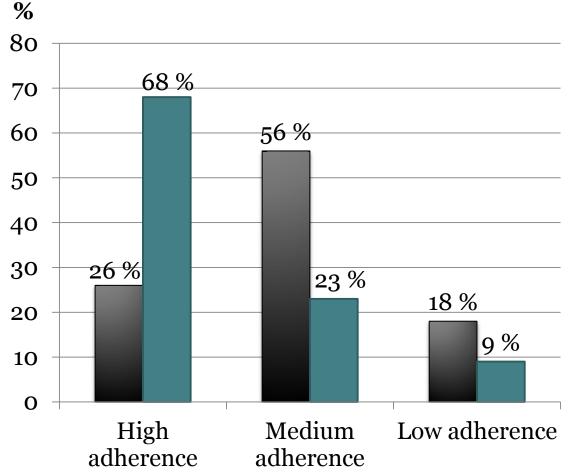
absolutely right
mostly right
mostly wrong
absolutely wrong
do not know

## Barriers to adherence





## Adherence



**High adherence:** Missed the treatment no more than once during the past month

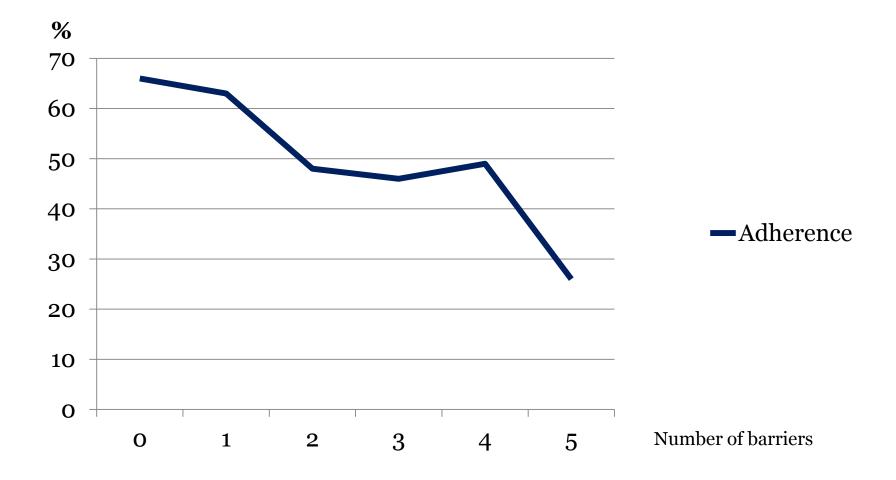
#### Medium adherence:

Missed the treatment <u>no</u> more than once a week

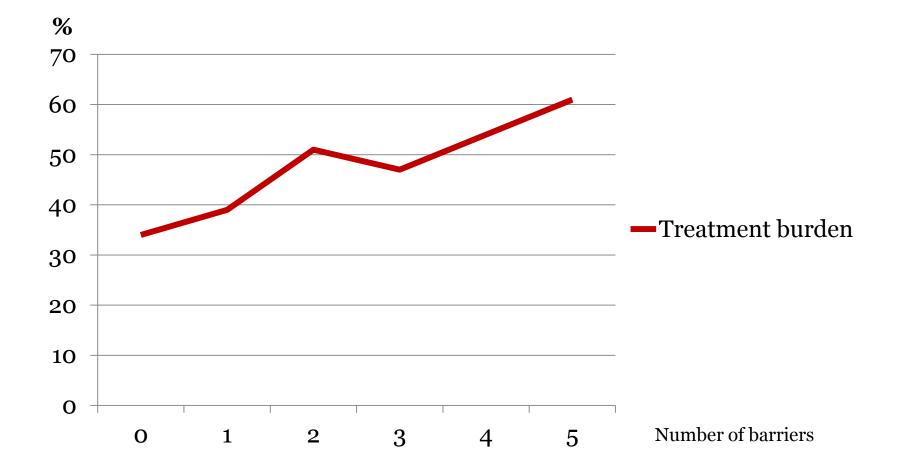
**Low adherence:** Missed the treatment more than once a week

- Adolescents with barriers
- Adolescents without barriers

### Number of barriers in correlation to adherence



### Number of barriers in correlation to treatment burden



method

# Reactions from the adolescent?

- 1. Get annoyed when my parents ask me to take treatment
- 2. Tell my parents that I appreciate their help
- 3. Get sullen when my parents ask me to take treatment
- 4. Ask my parents to mind their own business
- 5. Quarrel with my parents about treatment

never
monthly
weekly
daily
not relevant

method

# Reactions from mother/father?

- 1. Say you are good at remembering treatment
- 2. Scold you for forgetting treatment
- 3. Ask you to take your treatment although you are doing something else
- 4. Quarrel with you about treatment
- 5. Praise your effort to take treatment
- 6. Help you only when you ask for help
- 7. Check that you have taken your treatment
- 8. Trust that you have taken your treatment

never
monthly
weekly
daily
not relevant

method

### Communication in the family about CF

- 1. We communicate openly about CF
- 2. We are good at supporting each other when CF takes up all the time
- 3. We can express our feelings towards each other regarding CF
- 4. We can talk about everything concerning CF
- 5. We can talk about our anxiety concerning CF
- 6. We can communicate about CF although we are depressed

strongly agree
agree
disagree
strongly disagree

results

# Reactions from the adolescents, mothers and fathers

Quarrels and negative reactions were significantly more often reported by the adolescents reporting adherence barriers than by adolescents reporting no barriers

### Communication about CF in the family

Support and positive communication about CF in the family were significantly more <u>in</u>frequently reported by adolescents with adherence barriers than by those reporting no barriers

# Quantitative part - questionnaires

aim

- What kind of support do the adolescents want
   from their parents?
- 2. Barriers to adherence?- the adolescents' and parents' perspectives
- 3. What kind of support do the adolescents and their parents want
  - from the health care system?

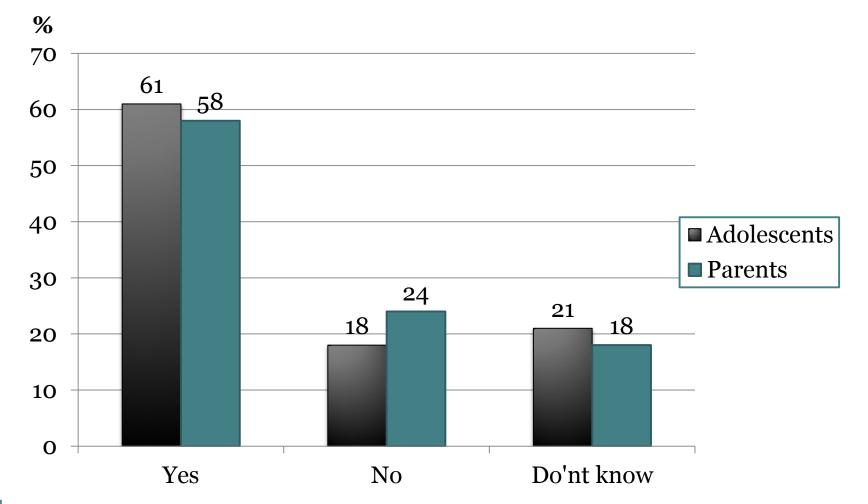
results

# Requests for support from the CF centre

	Adolescents % (n)	Parents % (n)
Ask about adherence	<b>33</b> (29)	<b>38</b> (61)
Suggest ideas on how to remember the treatment	<b>33</b> (29)	<b>30</b> (48)
Provide information about conquences of low adherence	<b>43</b> (38)	<b>50</b> (81)

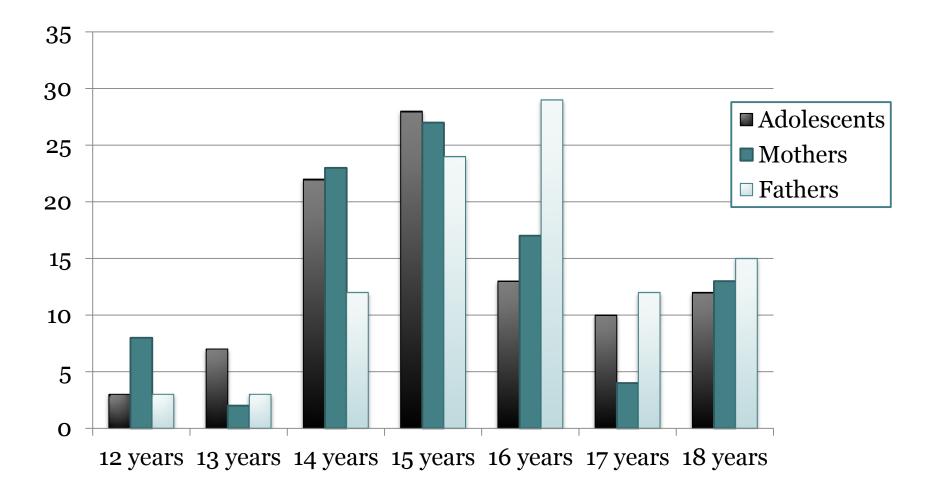
Those who wanted support had lower adherence than those who did not want support

## **Adolescent consultations**



results

### Adolescents consultations



# Conclusion of the whole study

- Guidance to parents on how to parent adolescents with CF
- The majority had barriers to adherence
  - Lack of time, forgetfulness, unwillingness to take treatment in public
  - The parents knew the level and types of barriers
- Correlations:
  - Barriers and adherence
  - Barriers and treatment burden

conclusion

# Conclusion

- Negative reactions and unsupportive communication was more often reported by adolescents with barriers to adherence
- Adolescents and parents wanted more information about potential consequences of low adherence
- Those who wanted support had low adherence
- Individual consultations from the age of 15

perspectives

# Implications for practice

- Guidance on how to parent adolescents with CF
- Focus on barriers to adherence
- Ask about adherence
- Focus on treatment burden
- Individual consultations

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