



## 21<sup>st</sup> Annual EUPHA Meeting

# Socio-economic disadvantage in childhood and its impact on health and development later in childhood: A European-wide perspective

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# Outline



- DRIVERS aims and consortium
- Early childhood health and development
- Systematic reviews
- Data analysis programme + example
- Case studies

# DRIVERS aims and consortium



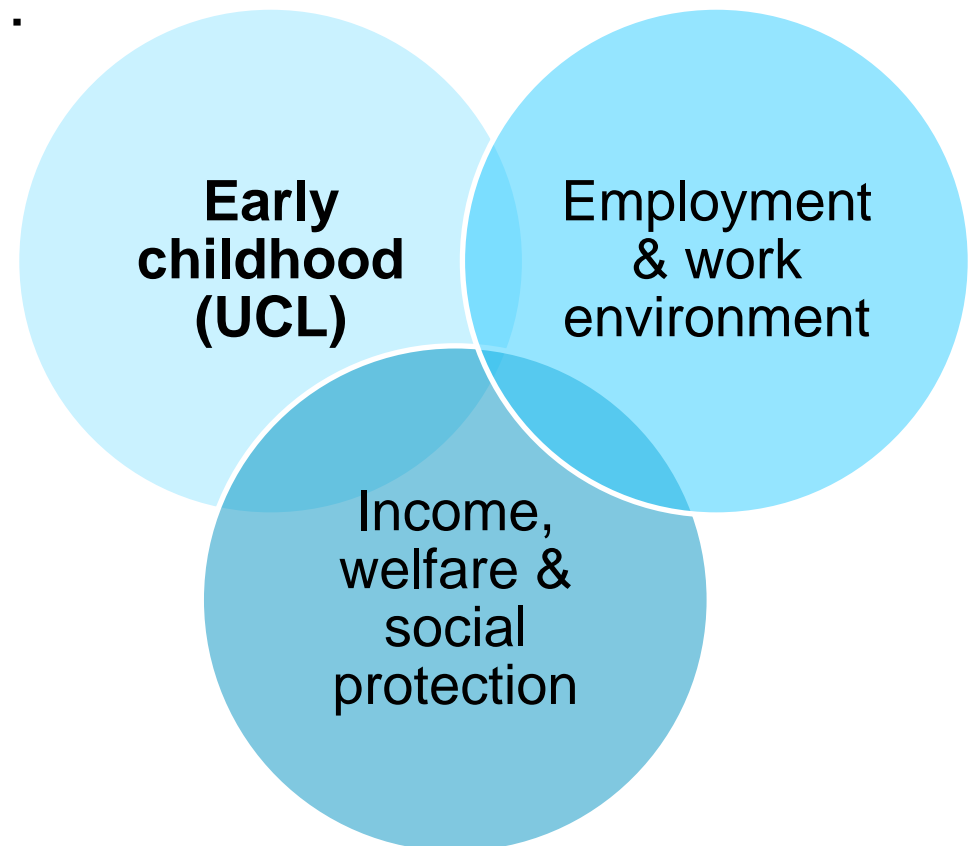
- To review evidence, improve methods and apply new information to assess the three influential areas of health inequalities
- To provide advocacy guidance and policy recommendations to ensure that policies and interventions in these 3 areas serve as ‘drivers’ towards greater health equity
- 3-year research project and consortium of 7 organisations working for health equity

# Three key drivers



The project builds on work of:

- WHO Commission on Social Determinants of Health (CSDH)
- WHO European Review
- European Commission Review
- Marmot Review of Health Inequalities



# Life course research across Europe



## Social inequalities in early childhood health and development: a European-wide systematic review

Pillas D, Marmot M, Naicker K, Goldblatt P, Morrison J, Pikhart H. *Pediatrics* (Under review; 2013).

- Largest systematic review of its kind
- Synthesises life course studies from prenatal period to 8 years of age throughout Europe
- Provides strong evidence that multiple social factors at different levels are associated with a wide range of adverse outcomes

# Life course research across Europe



## Pooled analysis of birth cohort studies in Northern, Southern, Western and Central Europe

- Further explores the associations identified in the systematic literature review in order to:
  - i) Describe the magnitude of social inequalities in early childhood health and development in all European regions
  - ii) Identify the key social factors and the pathways through which they drive these inequalities
  - iii) Evaluate the impact of multiple social disadvantage

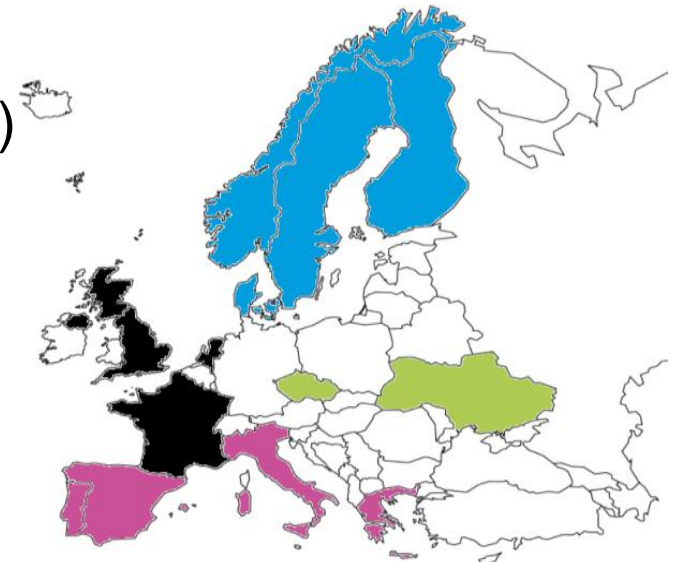
# Phase 1: Comparative analysis of European birth cohorts



## 13 countries:

Czech Republic | Denmark | Finland | France | Greece | Italy | Netherlands  
Norway | Portugal | Spain | Sweden | Ukraine | United Kingdom

- To **estimate** the magnitude of educational inequalities in health and development from birth to early childhood
- All European regions (North, South, East, West)
- 13 multi-purpose birth cohorts
- ~175,00 children

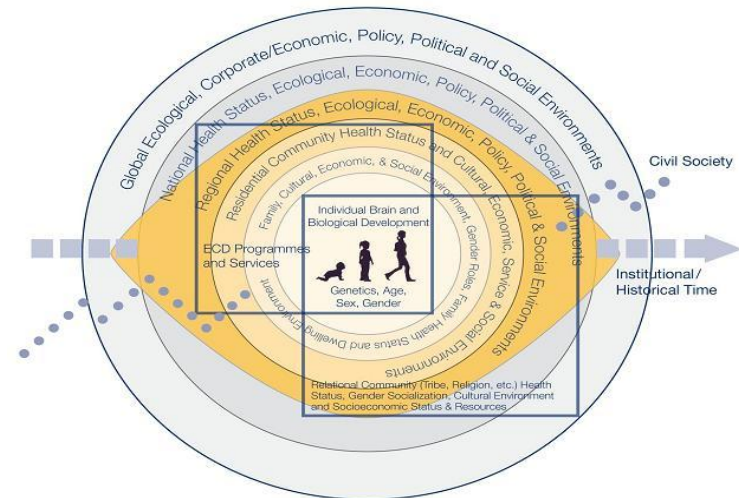


# Phase 2: In-depth analysis of 4 largest birth cohorts



Denmark | Norway | Sweden | United Kingdom

- To **explain** the magnitude of social inequalities in health and development from birth to early childhood using multiple SES indicators measured during several stages of childhood
- Represent 85% of the total sample
- Study pathways and examine complex relationships between social factors and health throughout childhood



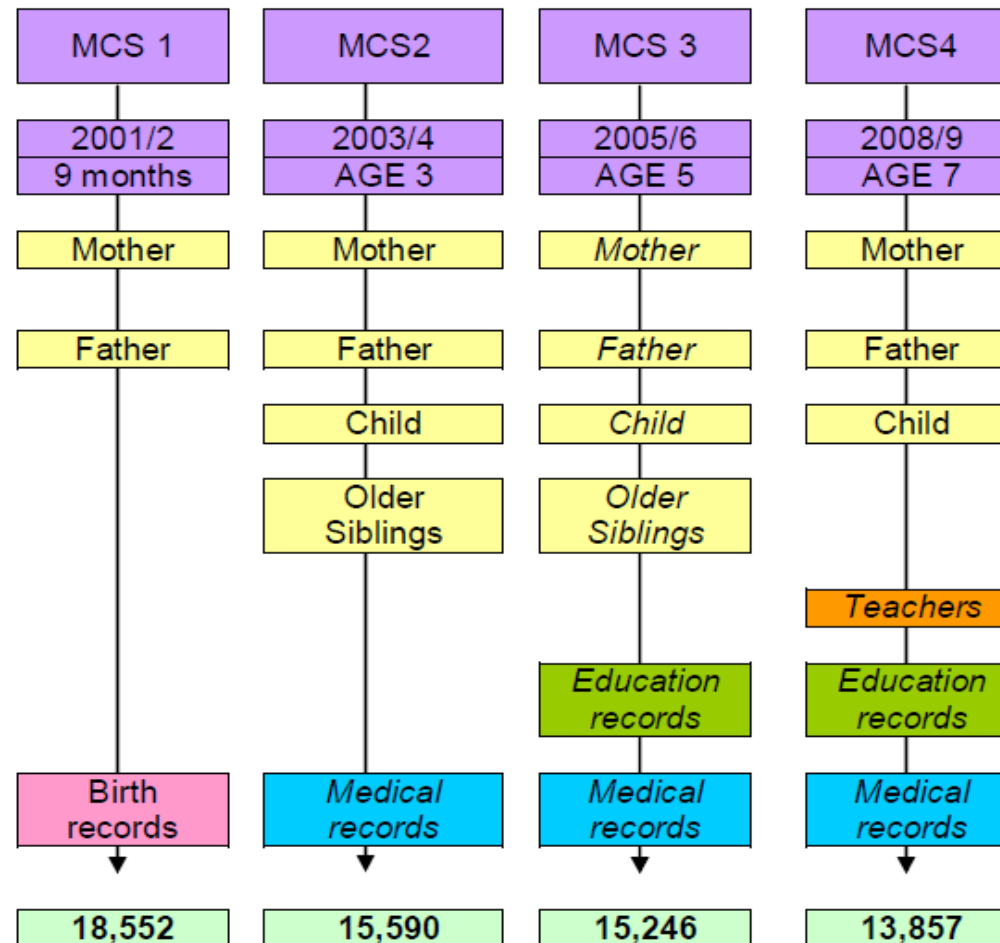


# Sample Analysis: Millennium Cohort Study (MCS), UK



- Aim:** To examine the impact of both individual- and neighborhood level- characteristics on asthma onset among children in the UK
- Method:** Multi-level statistical analysis
- Data:** Range of SES factors including household income, main carer occupation class and educational level, and measure of neighborhood deprivation represented by Index of Multiple Deprivation (IMD)

# MCS Analytic Sample



# MCS Sample description

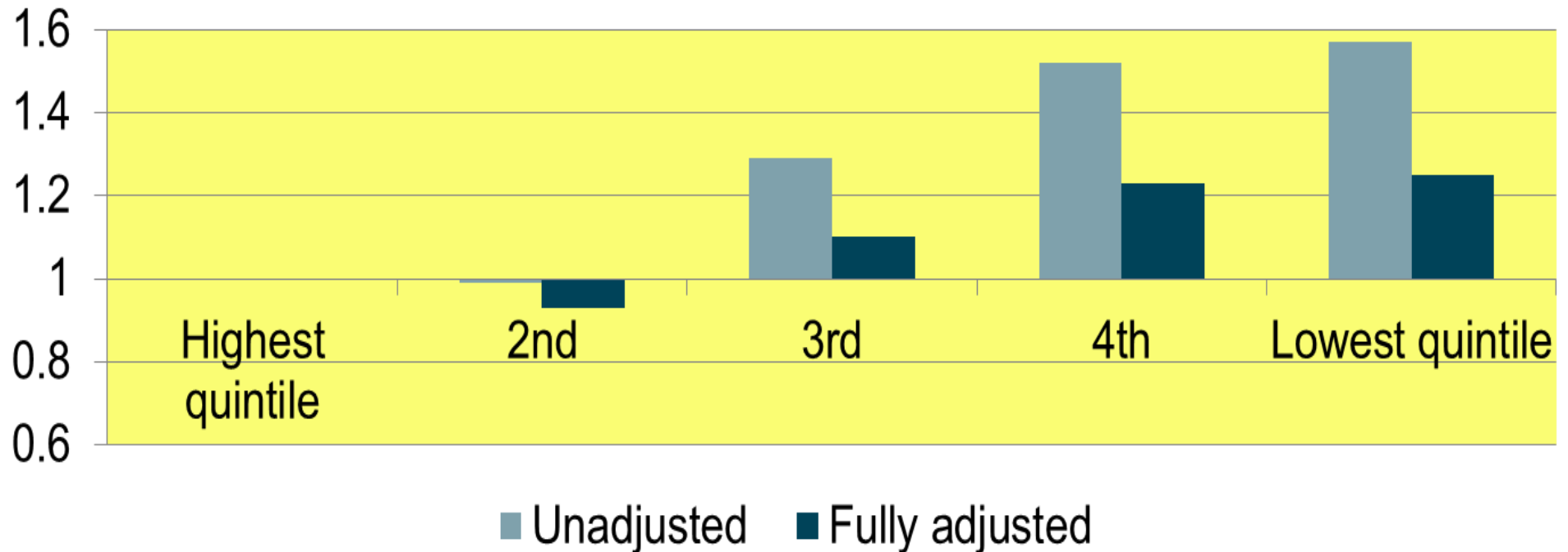


Variable	Category	N (= 12,844)	Percentage
Asthma at age 7	Yes	2,070	16.12
	No	10,774	83.88
Gender	Male	6,464	50.33
	Female	6,380	49.67
Ethnicity	White	10,873	84.65
	Mixed	341	2.65
	Indian	312	2.43
	Pakistani and Bangladeshi	764	5.95
	Black or Black British	400	3.11
	Other	154	1.20
Parents/Carers in household	Two parents / carers	10,225	79.61
	One parent /carer	2,619	20.39

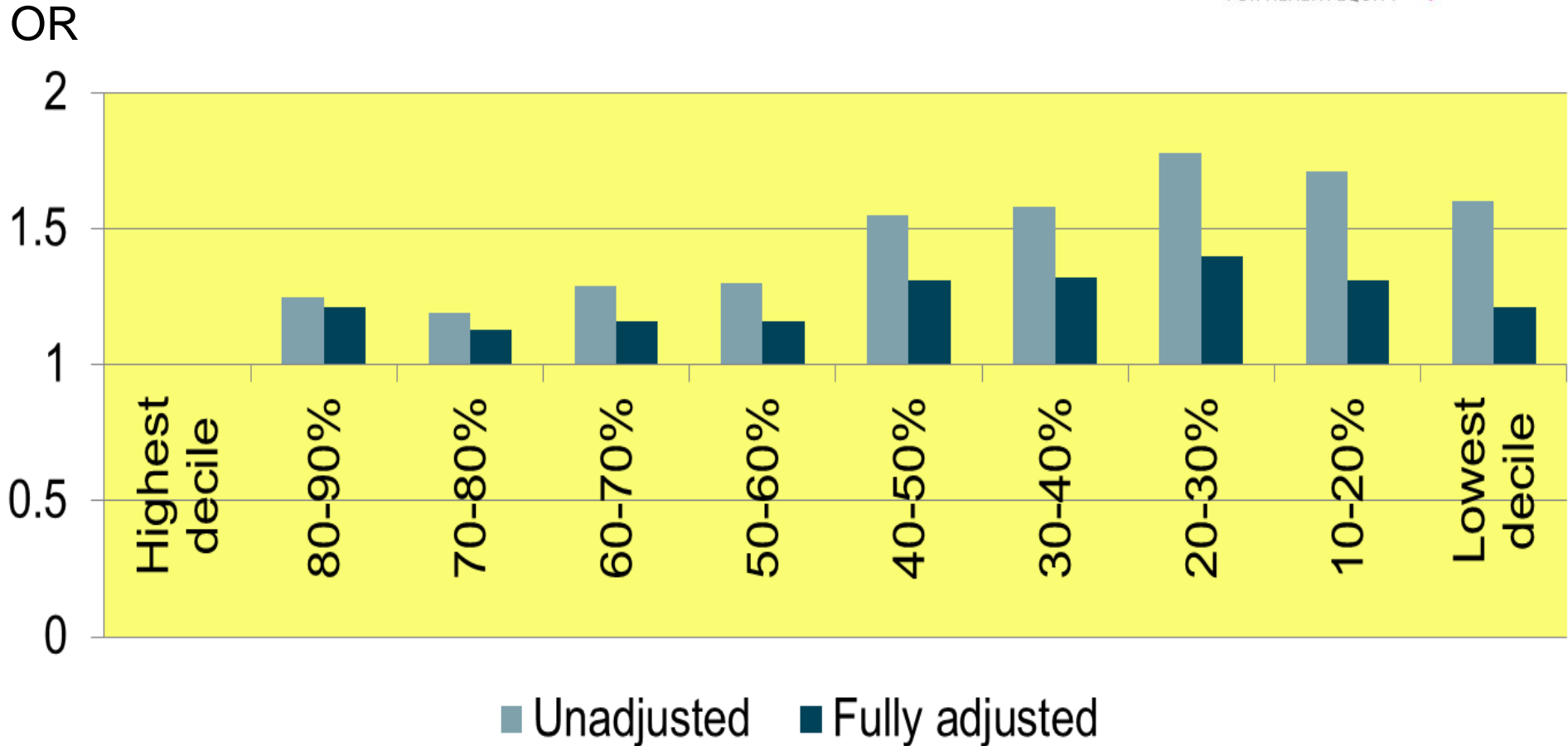
# Results – household income



OR



# Results - IMD



# Systematic review of European interventions



## Objectives

Systematic review (SR) on interventions carried out during early childhood in European countries (1990-2013) focusing on reducing inequalities in health and development and their social determinants

## Methods

PICOCS guidelines for SR following the Centre for Reviews and Dissemination guidance

# Systematic review of European interventions



## Search

- PubMed
- CSA Sociological abstracts
- Grey literature

## Preliminary results

- The majority of interventions were delivered in the UK
- These were aimed at population in deprived areas
- Few included all developmental domains

# ECD case studies

## Objectives

To describe the following characteristics of the selected European interventions and establish examples of good practice

- Socio-economic context
- Detailed description of the intervention
- Activities
- Funding and resources
- Transferability and scaling-up
- Evaluation
- Barriers





# ECD case studies



## Methods

- Several interventions were selected from those identified by institutions belonging to Eurochild and EuroHealthnet's networks
- Third parties and UCL will collect quantitative data and carry out in-depth individual interviews and focus groups among intervention professionals and users.
- Results are expected to be pooled together in early summer 2014.

# Milestones



- Project end date – 31<sup>st</sup> Dec 2014
  - 1<sup>st</sup> stage of analysis – by the end of 2013
  - 2<sup>nd</sup> stage of analysis – by June 2014
  - Case studies – by autumn 2014

# Thank you



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