

# VLEEM

Seminar on "Human Development and Sustainability of Energy Systems"

ADEME, Paris, 30 April 2003

## Introduction

<http://www.VLEEM.org>

## Content

**Context and objective of the seminar: the VLEEM project**

Questions addressed to the participants

Organisation



## Objectives VLEEM

Develop a **formalised model**

To address **energy-environment** issues  
**up to 2100**

Through a **back-casting** approach

In order to help decision on major EC  
**energy R&D programmes**

## VLEEM-2 consortium

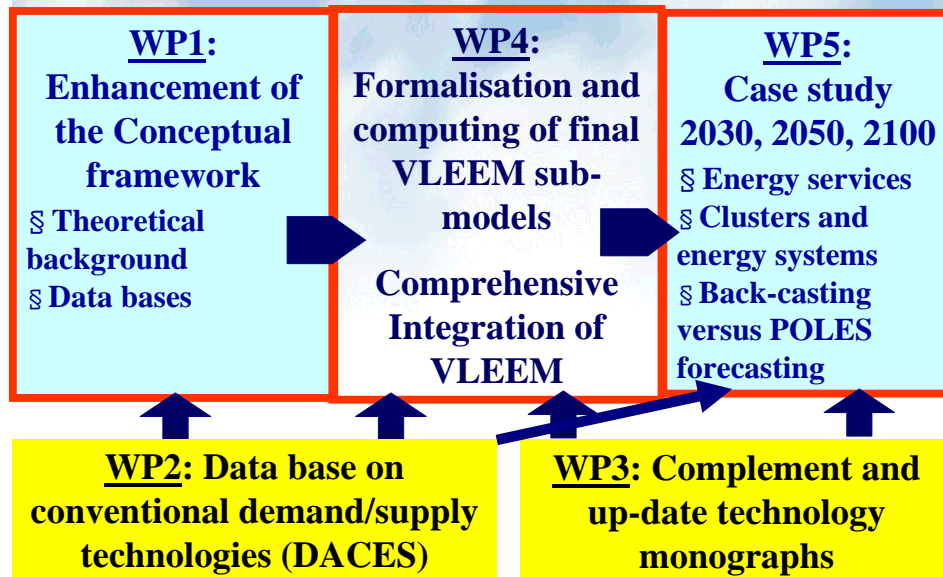
**France:** ENERDATA + ethno-sociologist + economist  
LET, IEPE

**Germany:** Max Plank – Plasma physics (IPP)  
Juelich Research Centre (STE)

**Netherlands:** Energy Research Centre (ECN)  
Utrecht University (UU)

**Austria:** Verbundplan (VBP)

## VLEEM-2 Work Programme



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## VLEEM2 – Work package 1

### WP1.1 : enhancement of the sustainability criteria for energy RTD strategies

WP1.2 : enhancement of the assessment of the very long term economic growth in relation to demographic transitions and technical progress in the world

WP1.3 assessment of the economic and energy exchanges and trade among regions

WP1.4 : enhancement of the assessment of the very long term transport systems and related needs for energy services, both from the households and production sides

WP1.5 : assessment of the production systems related to water delivery, self accomplishment and transport infrastructures and equipment

WP1.6 : socio-economic data collection related to life-styles and behaviours in selected developing countries

WP1.7 : integration of all above parts in the overall VLEEM framework

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## Sustainability of energy systems and policy decisions in RTD

- How to make sustainability criteria accepted by policy makers?

- How to make the results of the very long term study endorsed by them and turn into decisions in the next future?

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## social viability and sustainability of energy systems

- How to characterise social viability on the very long term so as to build relevant sustainable futures of the energy systems ?
- What quantitative assumptions on demography, life styles, economic development etc... are acceptable and not acceptable in the very long term

## sustainability of energy systems: which criteria?

- How to express limits on green-houses gases emissions, nuclear operation and wastes, land-use and other environmental impacts of energy realted activities ?
- How to express inter-generational equity as regard fossil fuels depletion? The role of renewables. Resources endowment and geopolitical risks: what limits in imports/exports inbalances?

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## Agenda - Morning

**10:00 a.m. Political and methodological issues related to sustainability**

- Sustainability concept in government policy ; M. Colombier (20')
- Sustainability and back-casting : lessons from EST;P. Wiederkehr (20')
- Discussion (20')

**11:15 a.m. Towards a socially viable world :Thematic discussions**

- Demography – Peoples' migration
- Time budget and life style change - Equal sex access to instruction and labour - Geopolitical regional and interregional universal cultural acceptability
- Welfare, poverty and social link – Economic

## Agenda - Afternoon

### **Building up an environmentally sustainable energy world, keeping resources for future generations and preventing geopolitical ruptures**

- CO2 emissions [Introduction (15') + Discussion (30')] ; B. de Vries, RIVM
- Nuclear issues [Introduction (15') + Discussion (30')] ; B. Dessus, GC
- Land-use, noise, and other industrial risks
- Resources [Introduction (15') + Discussion (30)]; M. Whiteley, ESD
- Geopolitics [Introduction (15') + Discussion (30)]; L. Cozzi, IEA

### **Conclusion**