

# HOSPITALS - Intro

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# HOSPITALS - Aim

- The HOSPITALS initiative aims to demonstrate the significant reduction potential of the total energy demand in the European health care building sector.
- The project shall solve a number of key problems:
  - **high energy demands**
  - **and poor indoor climate and air quality conditions, lately recognised in the European health care sector.**
- Energy savings and CO2 emission reductions of up to 62% are demonstrated in 5 exemplar energy conscious health care buildings using various innovative designs and concepts based on renewable energy technologies.

# HOSPITALS - Objectives

- To implement and demonstrate innovative energy efficient building designs for the European health care sector through construction of 5 exemplary energy conscious and sustainable health care buildings in 5 different countries.
- To introduce the use of the Integrated Energy Design Process when renovating existing or constructing new health care buildings.
- To increase the use of innovative renewable energy technologies and rational use of energy in the health care building sector.
- To obtain significant reductions of primary energy use, CO2 emissions and peak electricity demand.

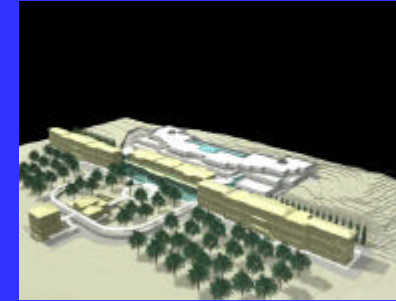
# HOSPITALS - Objectives

- To ensure large improvements of thermal and visual indoor climate for patients and for employees, thereby achieving improved comfort conditions, faster recovery of the patients and increased efficiency of the employees.
- To carry out comprehensive and careful monitoring and evaluation of the 5 sites.
- To disseminate the achieved experiences and results to key decision-makers, hospital managements, consultants and manufacturers, in order to obtain a wide spreading of knowledge and adoption of the successful techniques used.
- To stimulate that the use of energy efficient technologies will become standard measures for future building programmes set up by the European health care building sector.

# HOSPITALS - Participants

Co-ordinators	County of South Jutland (Adm.), DK Esbensen Consultants (Tech., DK)
Projects	Haderslev Sygehus (Aabenraa Sygehus), DK Fachkrankenhaus Nordfriesland, DE Torun City Hospital, PL MEYER Children Hospital, I Deventer Ziekenhuis, NL
Others	Fraunhofer ISE, Monitoring + Evaluation
Subcontractors	S&I Architects - Double Skin Facades
<i>Workshops &amp; Brochures + Design Reviews</i>	DHV - Ventilation & Cooling Marco Sala Ass. - Bioclimatic Design Concepts

# HOSPITALS - Participants



HOSPITALS - SCWP

Workshop, 10/5, Firenze, I

# HOSPITALS - Structure

## Co-ordination

CO1 Scientific and Technical co-ordination

CO2 Financial and Administrative co-ordination

## Five Common Work Packages

WP1 Integrated Design Process: Implementation and Integration of Renewable Energy Elements

WP2 European Design Workshops on Selected RE Elements & Design Review at European Level

WP3 Monitoring and Evaluation

WP4 Hospital Facilities Management & Psychological Working Conditions (employees and patients)

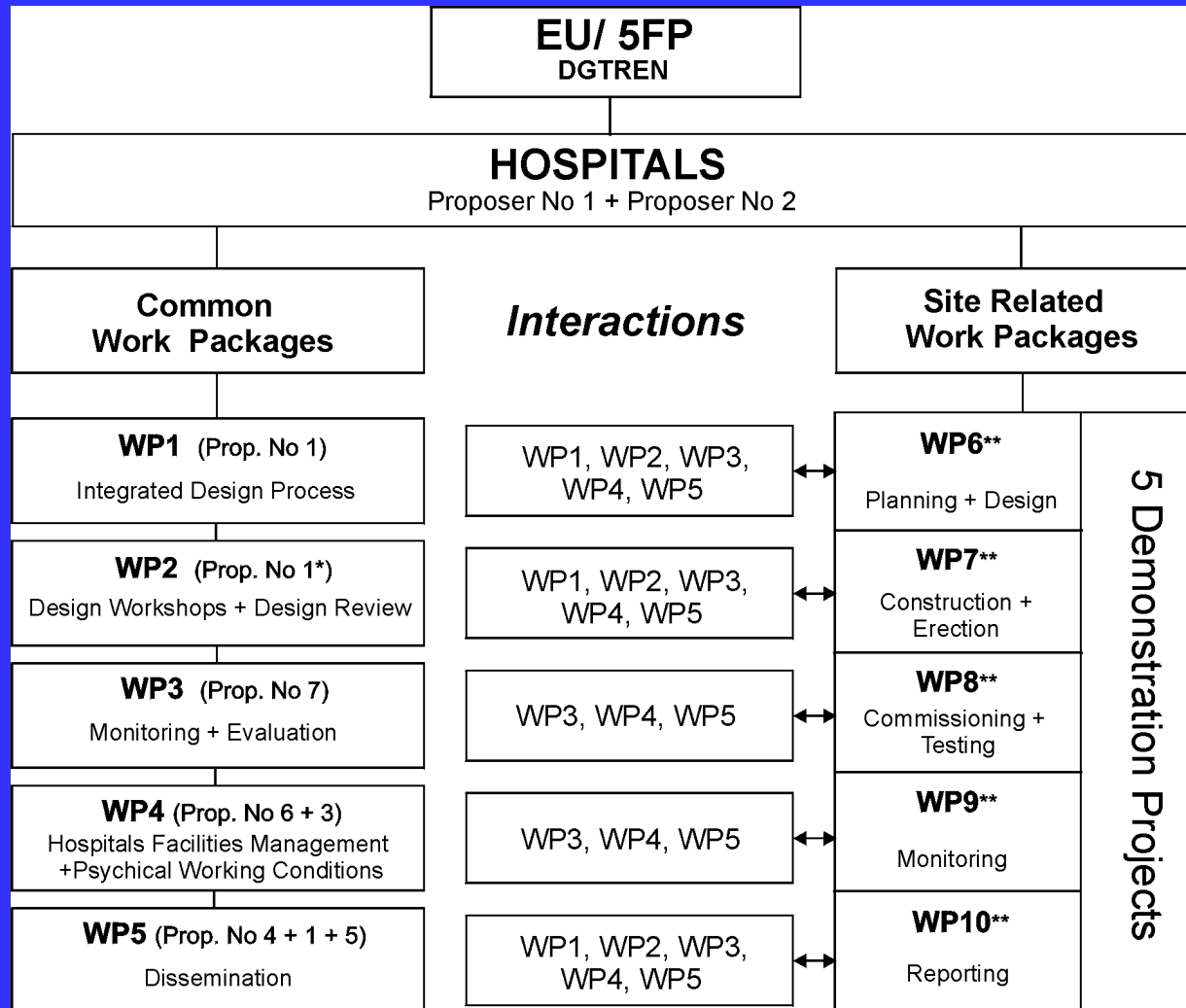
WP5 Dissemination

# HOSPITALS - Structure

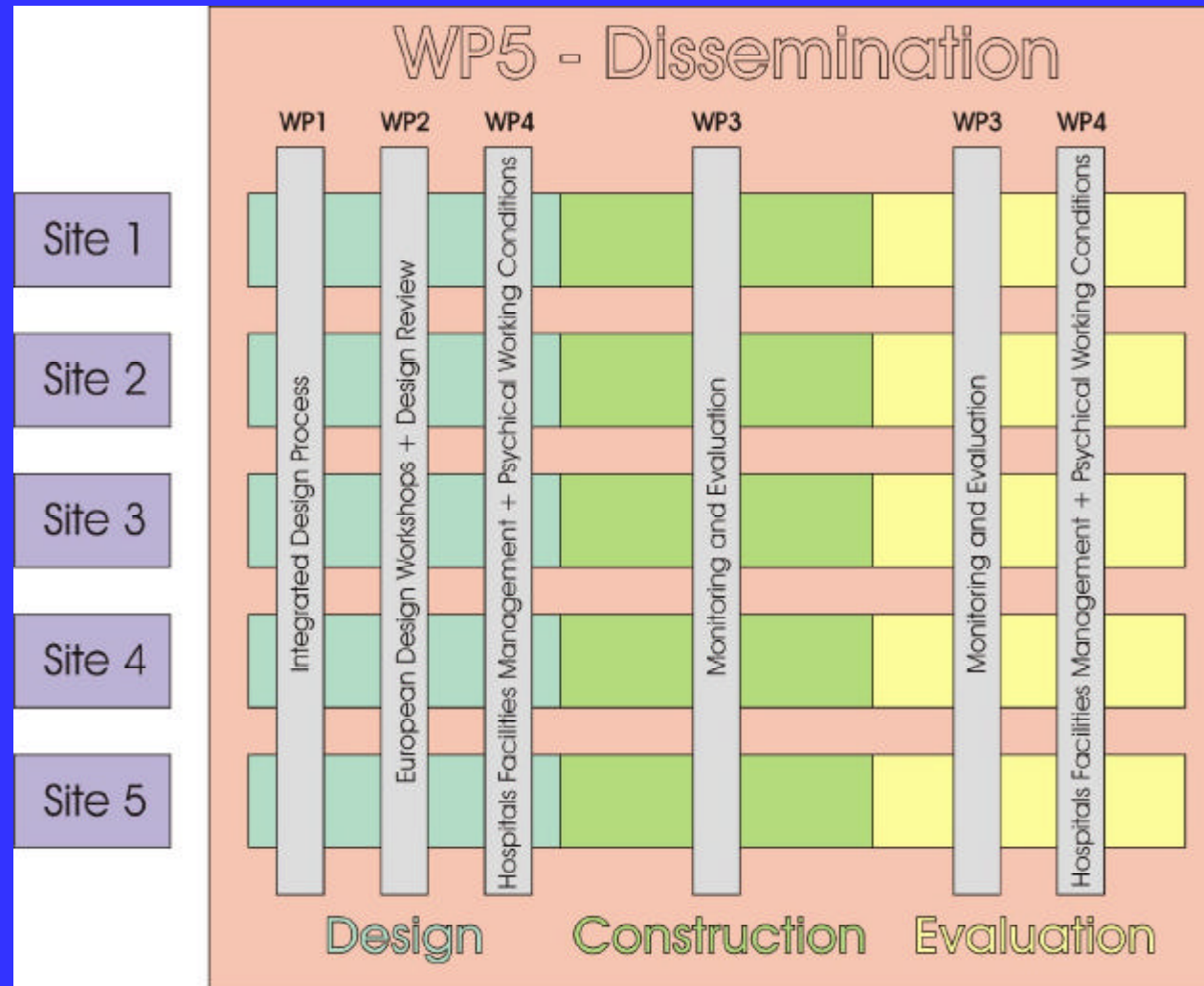
Five Site Related Work Packages Demonstration projects

- WP6 Planning and Design
- WP7 Construction and Erection
- WP8 Commissioning
- WP9 Monitoring
- WP10 Reporting

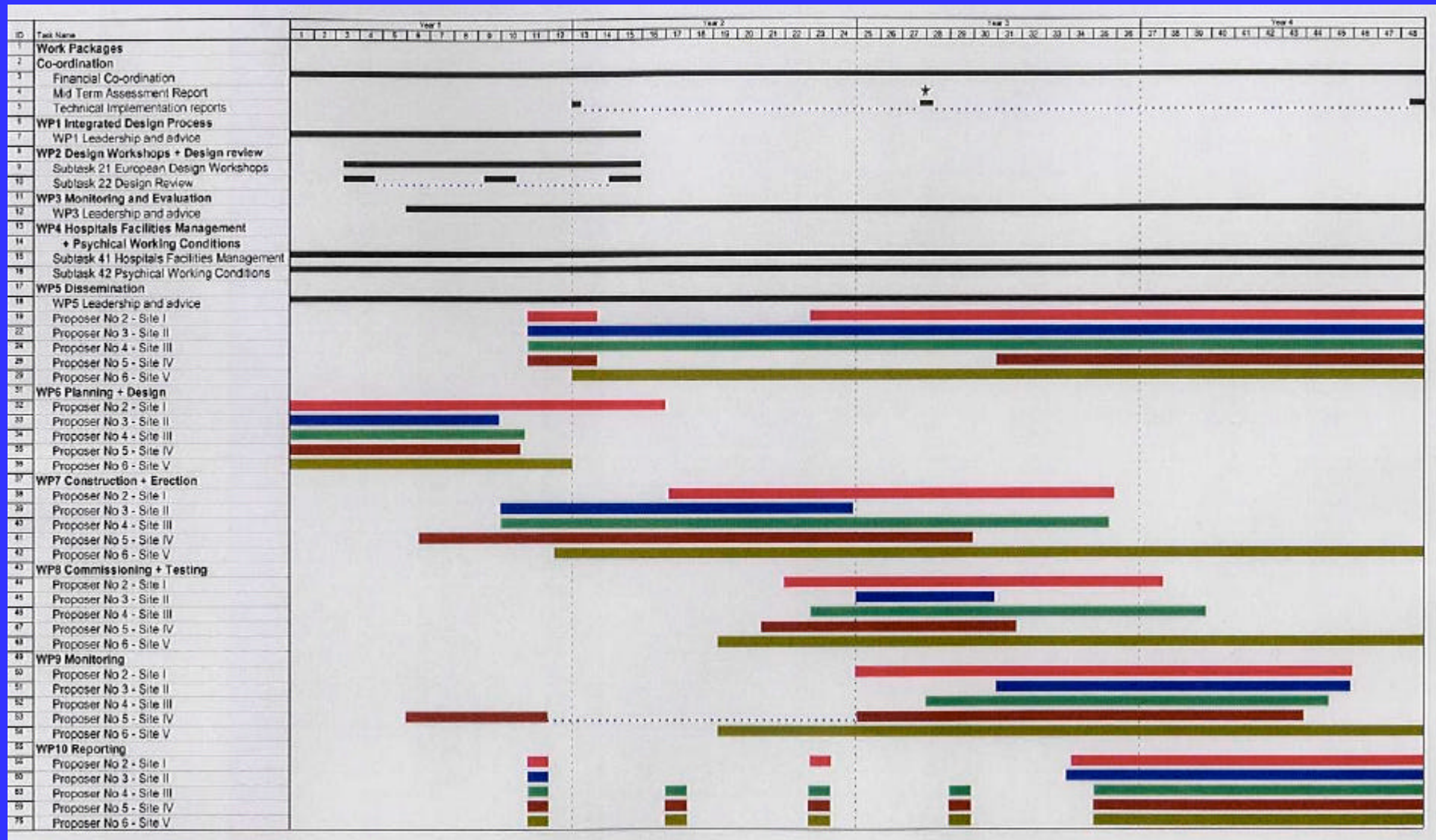
# HOSPITALS - Organisation



# HOSPITALS - Organisation

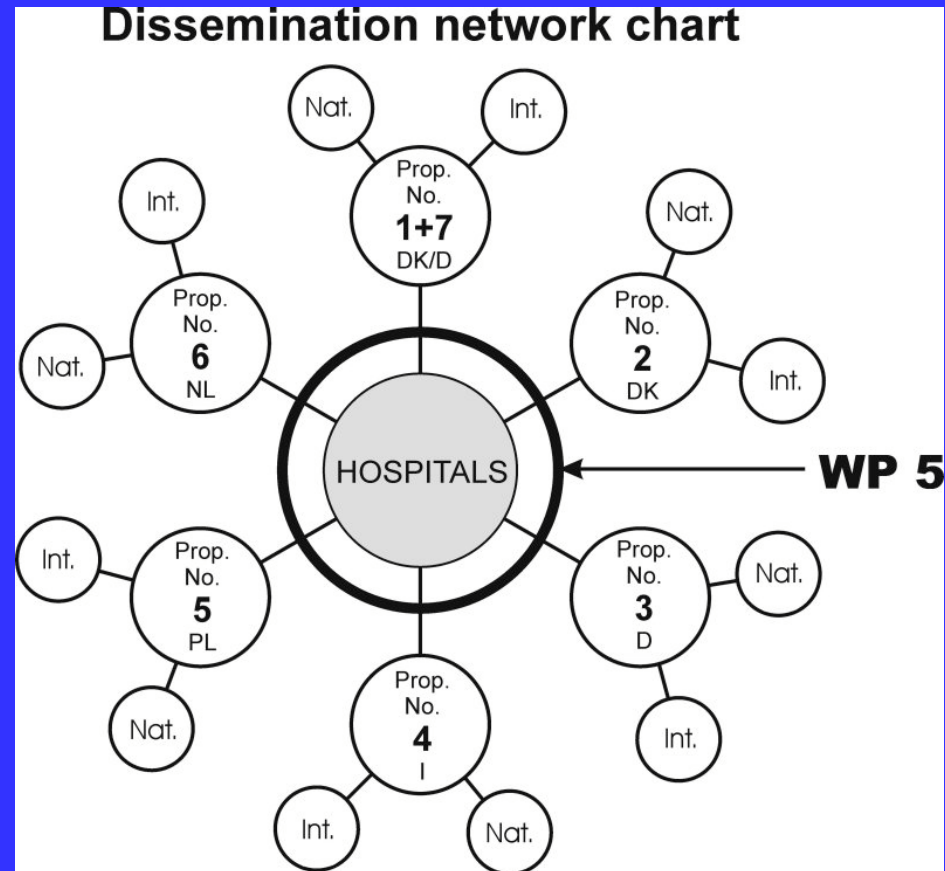


# HOSPITALS - time schedule



# WP5 Dissemination - Objectives

- To ensure a widely spread knowledge about the results obtained
- To enable decision makers to adopt these measures
- To help to ensure that the lessons-learned may be used in future projects in the health care sector



# www.eu-hospitals.net - content

- Public part - for information
- Restricted access part - **for communication !**
  - News about HOSPITALS
  - News about work packages
  - News about projects
  - Technical documents
  - Papers, articles, etc.
  - Minutes
  - Contact persons
  - Links



## HOSPITALS - Admin Area

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photos of Municipal Hospital roof

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















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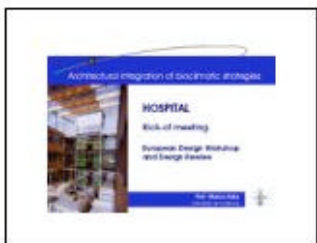
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Sub Category	Contents	Last file added	
 Project Administration & Co-ordination	 0  5	23-09-2002	
 WP1 : Integrated design proces	 0  1	17-06-2002	
 WP2 : European Design Workshops Review	 0  5	25-06-2002	
 WP3 : Monitoring and Evaluation	 0  1	17-06-2002	
 WP4 : Hospital facilities management	 0  1	17-06-2002	
 WP5 : Dissemination	 0  1	17-06-2002	
 Haderslev Hospital, County of South Jutland	 0  0		
 Fachkrankenhaus Nordfriesland, Bredtstedt	 0  0		
 MEYER Hospital, Florence	 0  0		
 City Hospital, Torun	 0  9	12-09-2002	
 Deventer Hospital	 0  0		

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HOSPITALS - SCWP

Workshop, 10/5, Firenze, I



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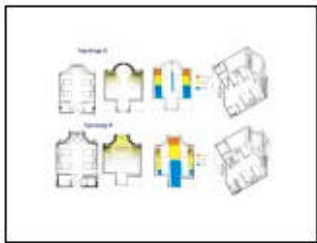
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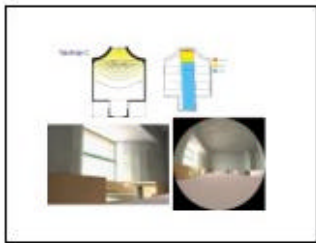
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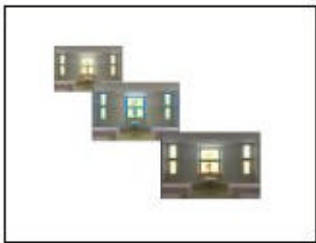
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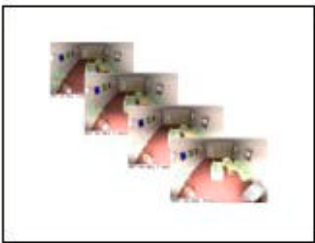
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# Other planned activities

## 2003

- HOSPITALS Workshop - Florence: 12 presentations
- ISES 2003: Overall HOSPITALS presentation  
Oral (OBJ)
- ISES 2003: Site specific presentations  
for the 5 projects (posters)
- Folder
- WP2 brochures
- HOSPITALS Intro brochure

# ISES 2003: [www.congrex.com/ISES2003](http://www.congrex.com/ISES2003)



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HOSPITALS - SCWP

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# Other planned activities

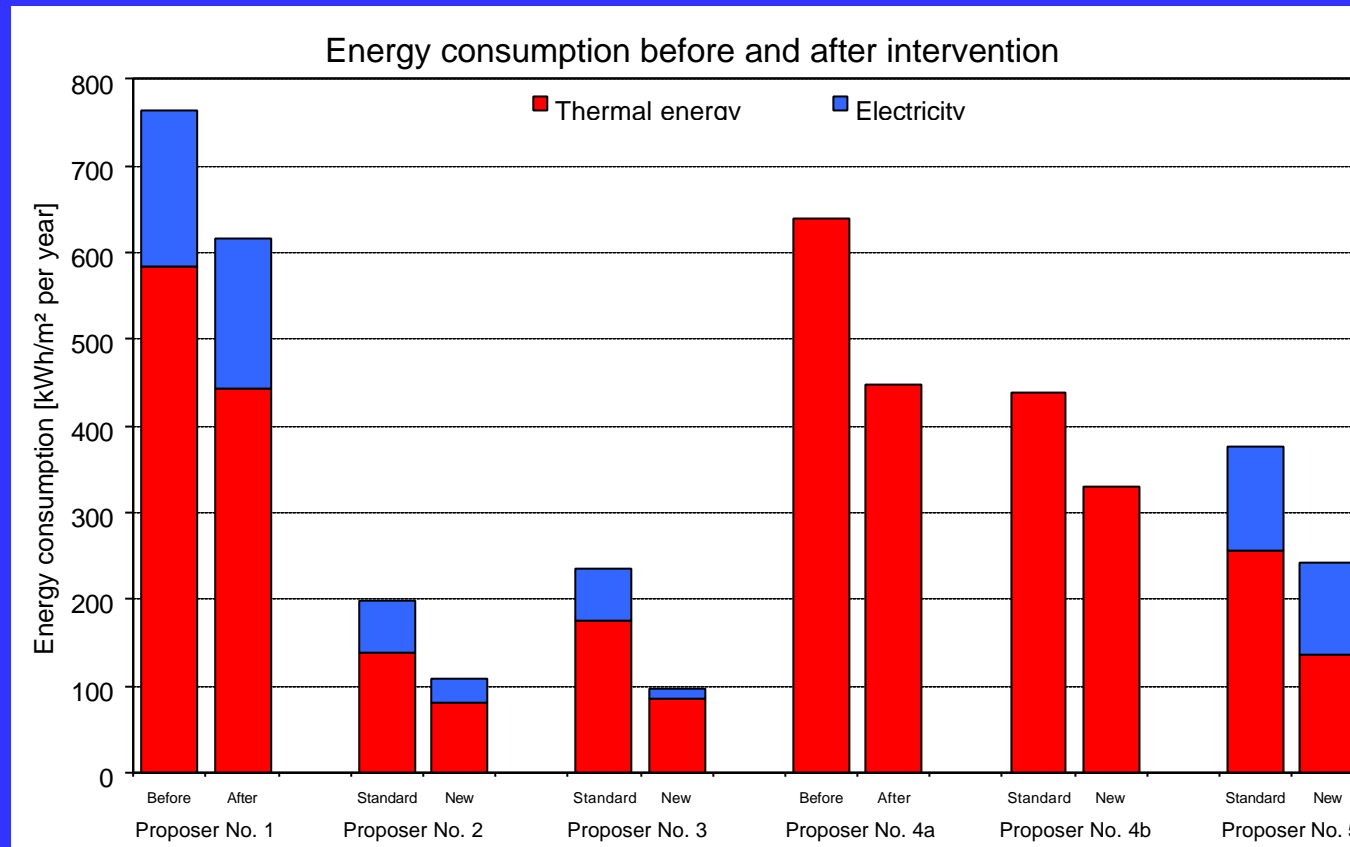
## After 2003

- Other WP brochures
- WP1 guideline
- 5 Site Specific brochures

# Deliverables

- Two high quality brochures (2 years + 4 years)
- 5 Individual project brochures summarising other projects
- web site [www.eu-hospitals.net](http://www.eu-hospitals.net)
- External articles based on information obtained from the HOSPITALS project

# HOSPITALS - Expected Results



- Total energy demand is reduced from 64 374 MWh to 43 498 MWh corresponding to a reduction of 32%
- For thermal energy, savings of up to more than 60% are expected
- For the electricity use, savings of up to 80% are expected.