
Social determinants of health-related quality of life

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Health-Related Quality of Life

- WHO (1993) defines quality of life
 - « as an individual's perception of their position in life in the context of the culture and value systems in which they live and in relation to their goals, expectations, standards and concerns. »
 - « It is a broad ranging concept affected in a complex way by the person's condition and its relationship to salient features of its environment. »

- In the field of health and health care, this definition is restricted to health domains mainly covering
 - physical health,
 - psychological state,
 - and social relationships of the individual.

Health-Related Quality of Life

- HRQoL measures
 - the perspective and experience of the subject
 - consequences of his/her health condition
- Like pain symptoms, measurement by an observer is not relevant
 - => Subjective health, perception by the individual
 - Self-assessment or by an interviewer
 - Measurement using self-report standardized questionnaire
- Multidimensional in composite scores: physical, mental, social
- This endpoint can be assessed and monitored all along life span
 - => People may adjust to various situations

Measurement and indicators

□ Duke Health Profile

- 10 dimensions
- Score 0=worse to 100= best quality of life

□ SF-36

- 8 dimensions into 2 components summary
- Score 0=worse to 100= best quality of life
- Interpretation: minimum important difference at least 5 points

Investigating social determinants

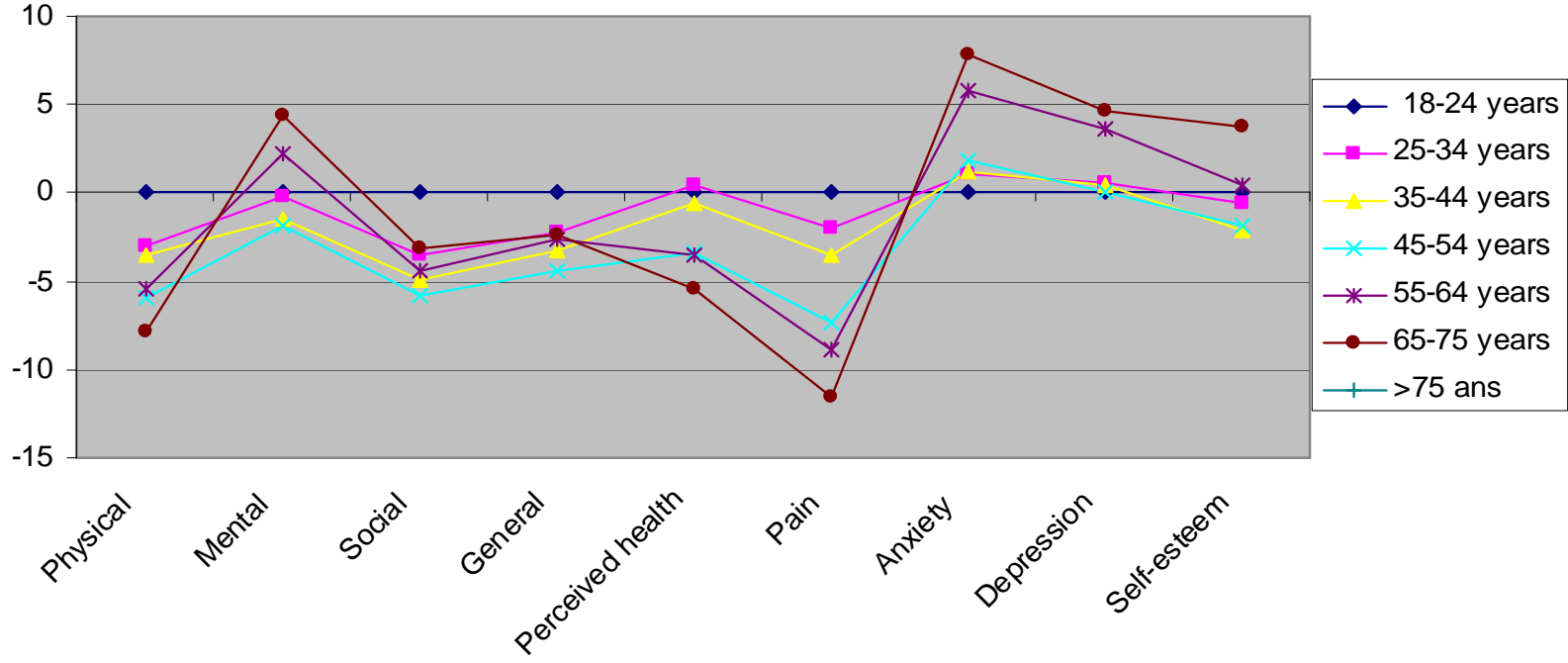
- General population surveys
 - Baromètre Santé 2005 (INPES)
 - Random sample of households and individuals (phone)
 - N=16326 individuals
 - Adults 18 to 75 years
 - Duke Health Profile

 - Enquête décennale Santé 2002-03 (Insee)
 - Random sample of households (home visits)
 - N=20574 individuals
 - Adults 18 years and over
 - SF-36

Baromètre Santé 2005: overall and gender

Duke Health Profile	mean	Female (compared to male)
Physical	71.7	-7.94
Mental	75.1	-6.69
Social	66.7	1.58
General	71.2	-4.34
Perceived health	71.4	-1.18
Self esteem	77.0	-2.85
Anxiety	69.2	-5.03
Depression	72.9	-6.96
Pain	64.7	-7.82

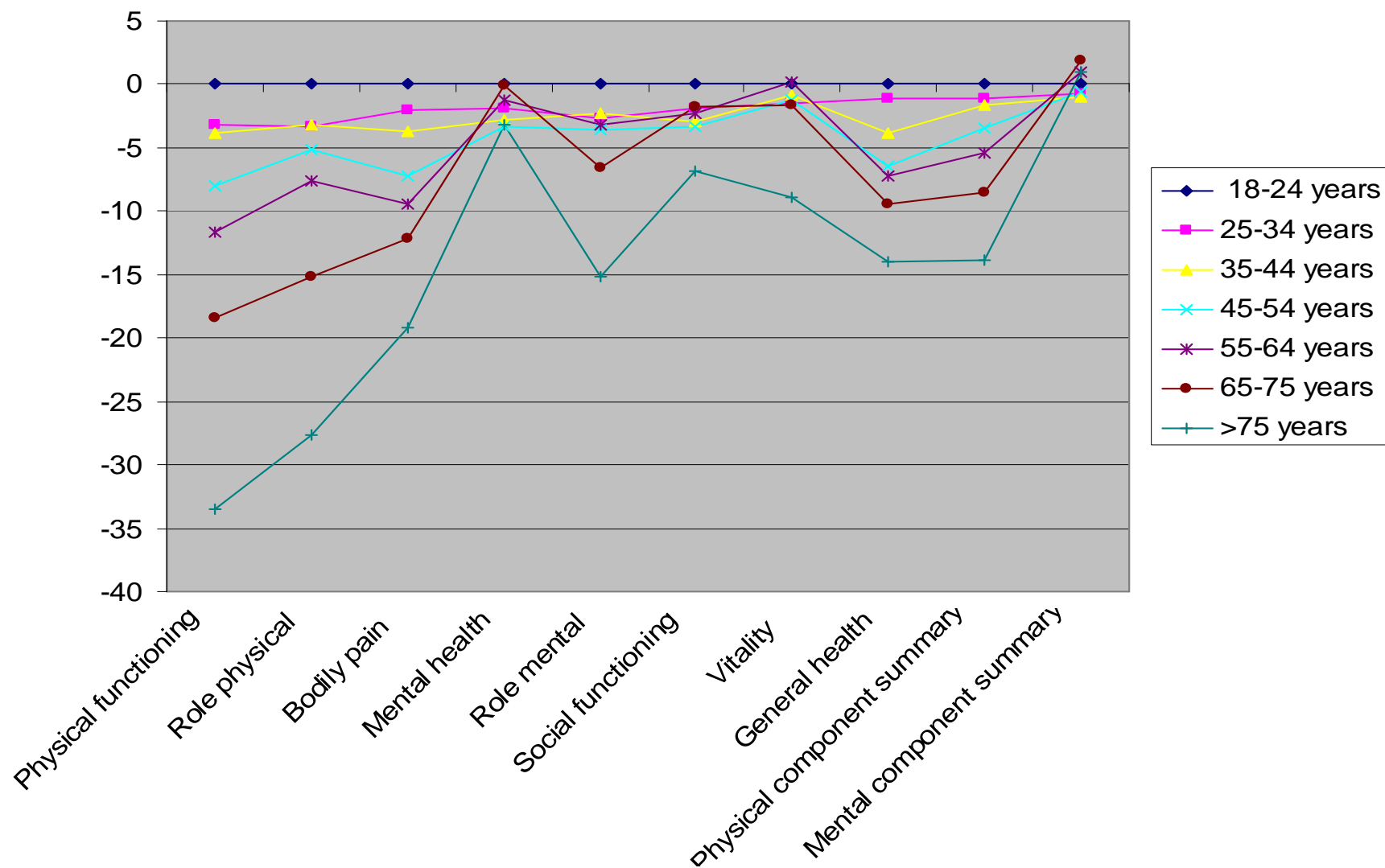
Baromètre Santé 2005: age



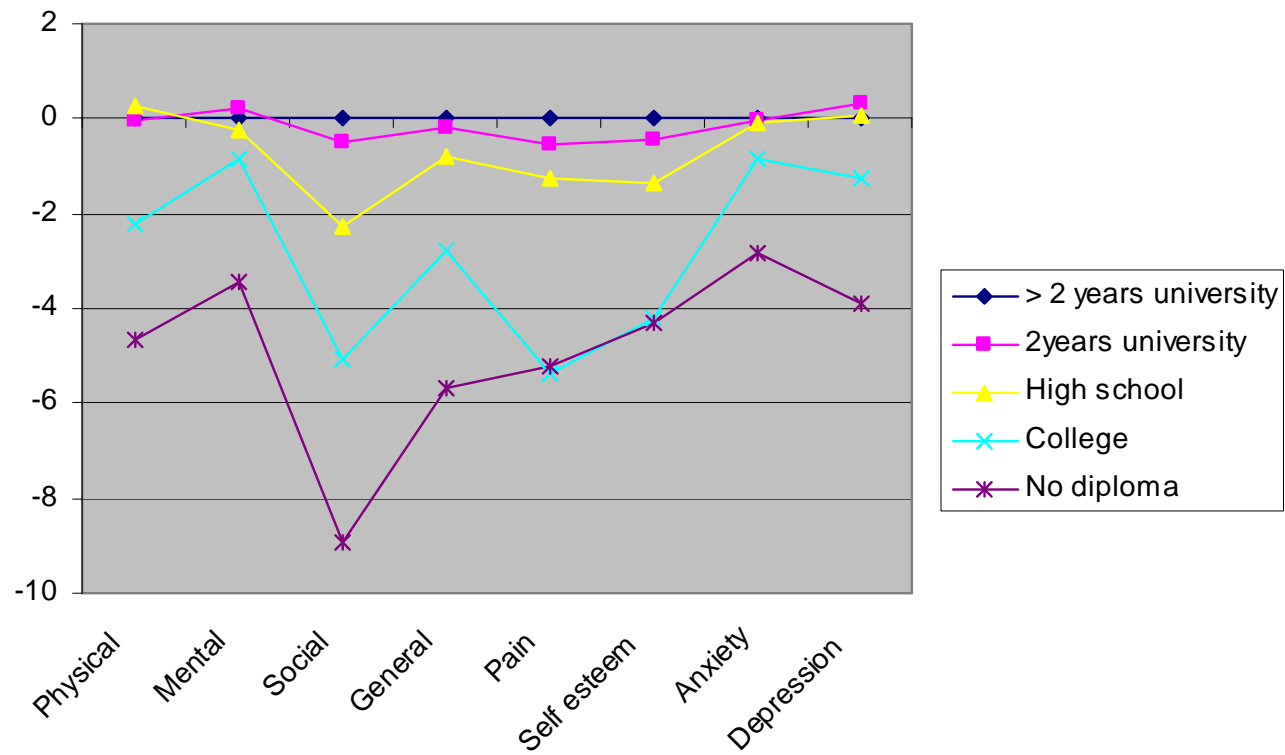
Décennale Santé: overall and gender

SF 36	mean	Female (compared to male)
Physical functioning	85.3	-3.23
Role physical	82.2	-2.30
Bodily pain	73.0	-4.83
Mental health	66.7	-4.95
Role mental	82.0	-4.08
Social functioning	80.9	-3.74
Vitality	57.4	-4.44
General health	67.8	-1.07
Physical component summary	50.4	-0.72
Mental component summary	48.8	-2.28

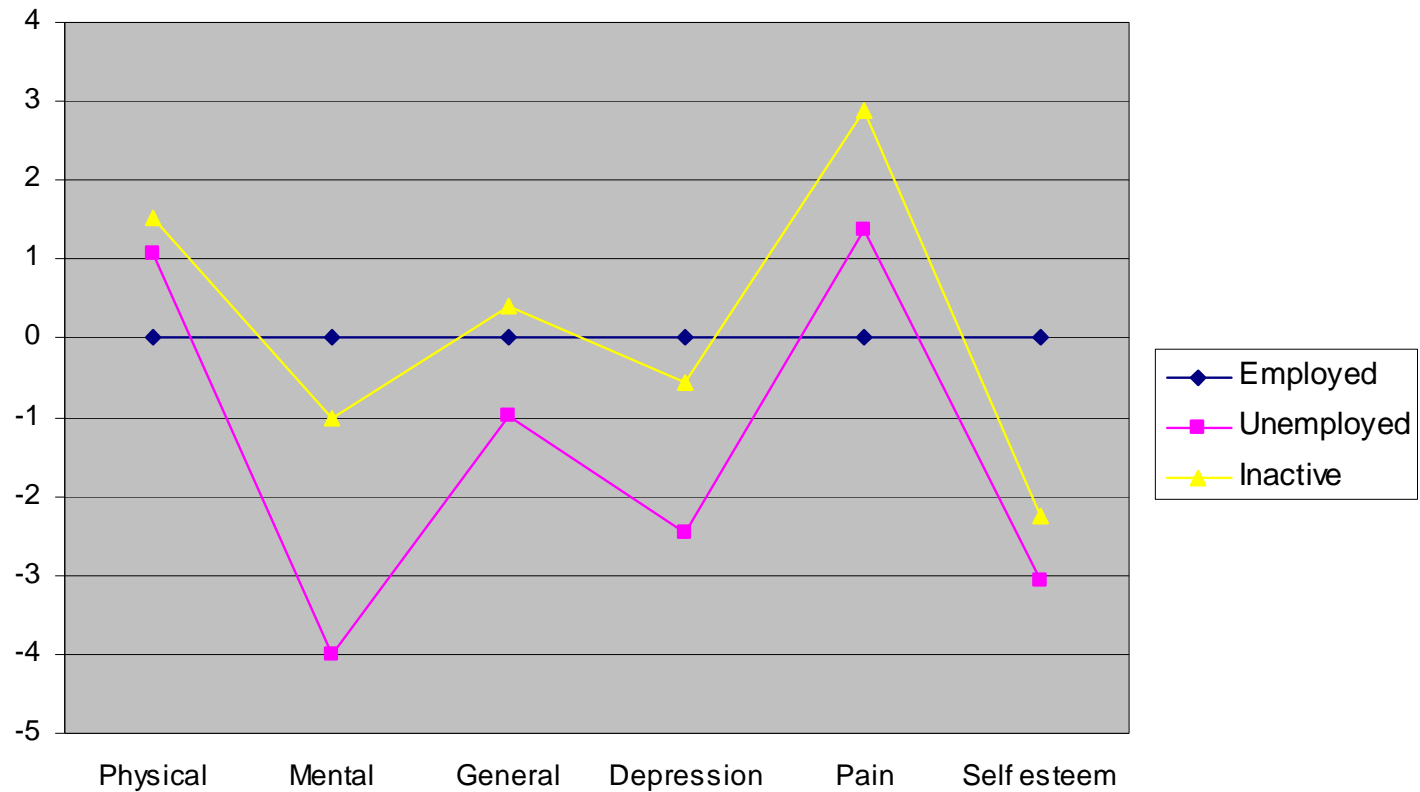
Décennale Santé: age



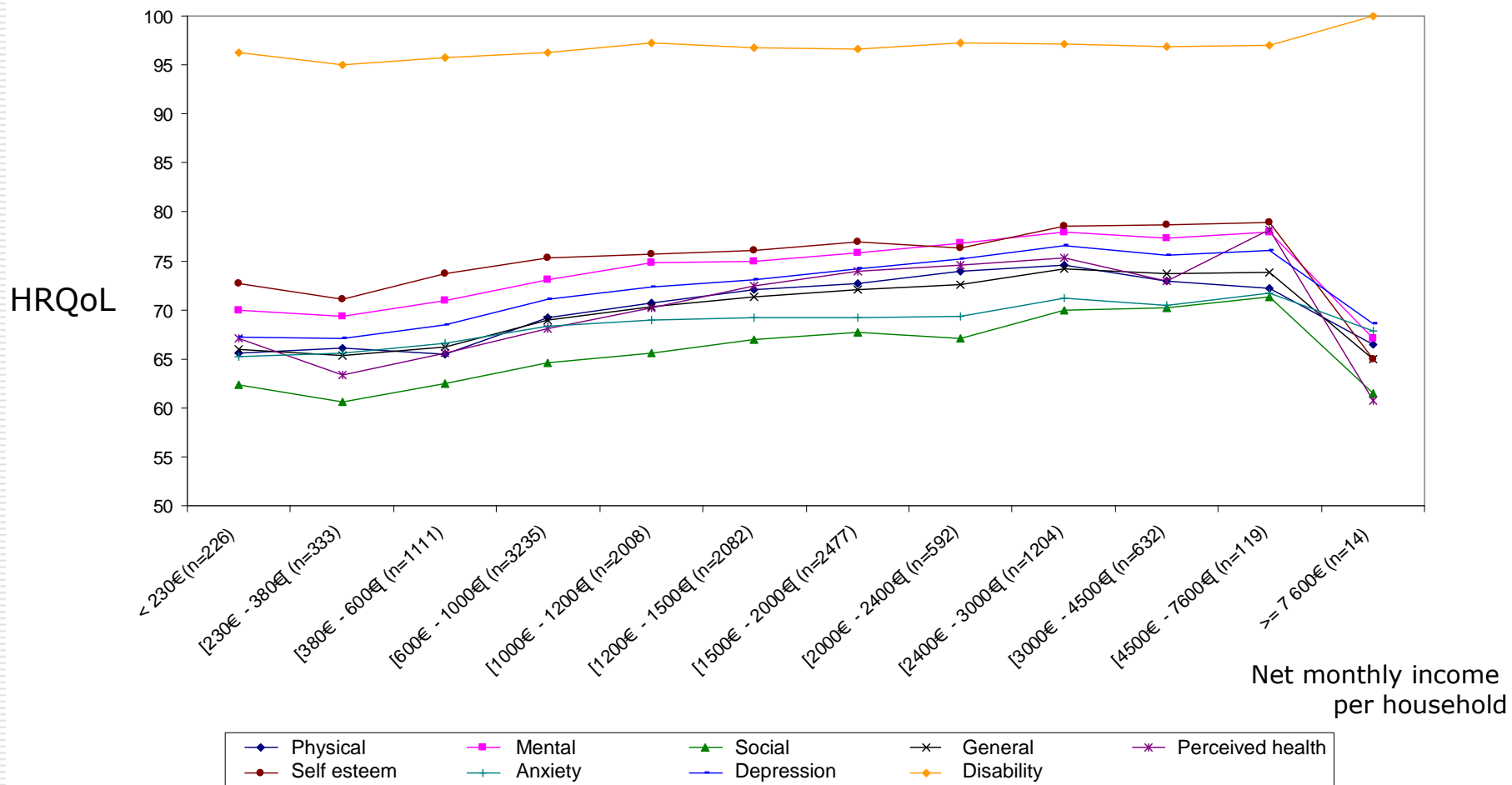
Baromètre Santé 2005: level of education



Baromètre Santé 2005: occupational status



Baromètre Santé 2005: income

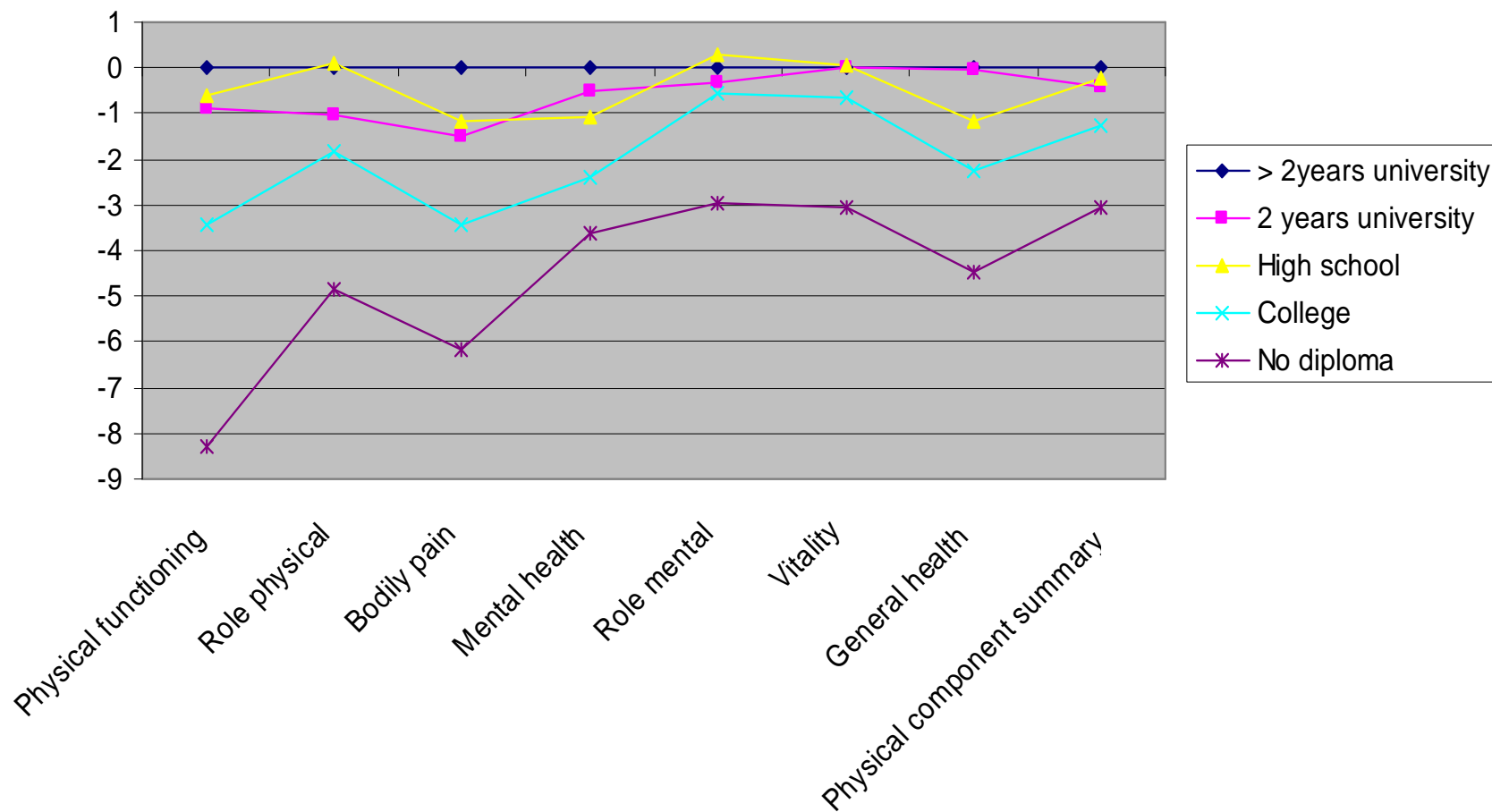


Baromètre Santé 2005: social indicators

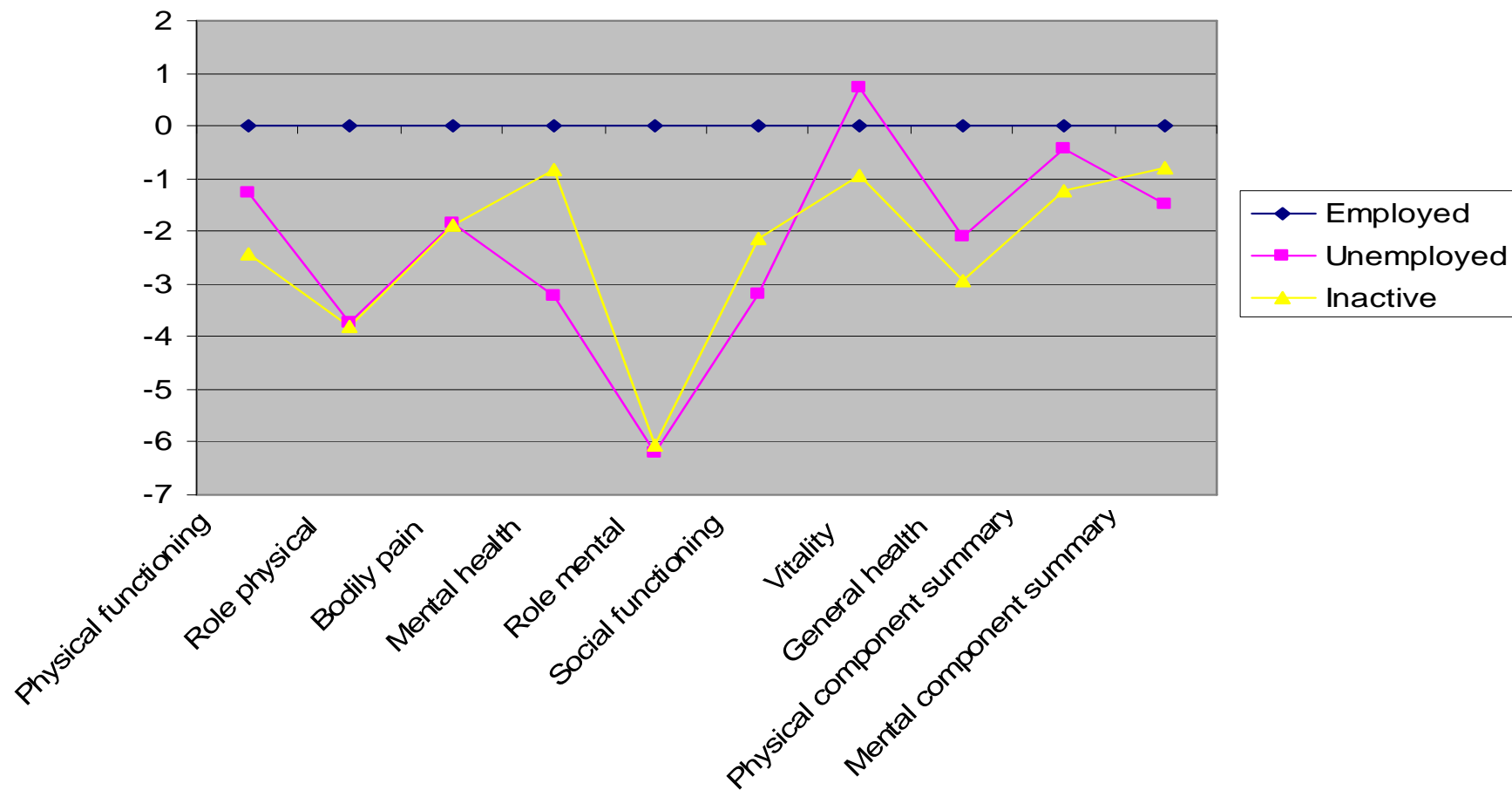
Duke Health Profile dimensions*		Physical	Mental	Social	Perceived health	General
Living in couple	70.6%	2	4,4	5,3	--	3,9
Level of education						
> 2 years university	19.7%	0	0	0	0	0
2 years university	12.8%	-0,1	0,2	-0,5	-0,5	-0,2
High school	18.7%	0,3	-0,2	-2,3	-1,3	-0,8
College	40.8%	-2,2	-0,8	-5,1	-5,4	-2,8
No diploma	8.0%	-4,6	-3,4	-8,9	-5,2	-5,7
Occupational status						
Employed	59.0%	0	0	--	--	0
Unemployed	7.4%	1,1	-4	--	--	-1
Inactive	33.6%	1,5	-1	--	--	0,4
Income						
< 230€		-2,6	-2,6	-5,5	-4,6	-3,6
Chronic condition	23.3%	-11,2	-6,2	-2	-19,2	-6,5

* Multivariate linear regression models adjusted on age and sex

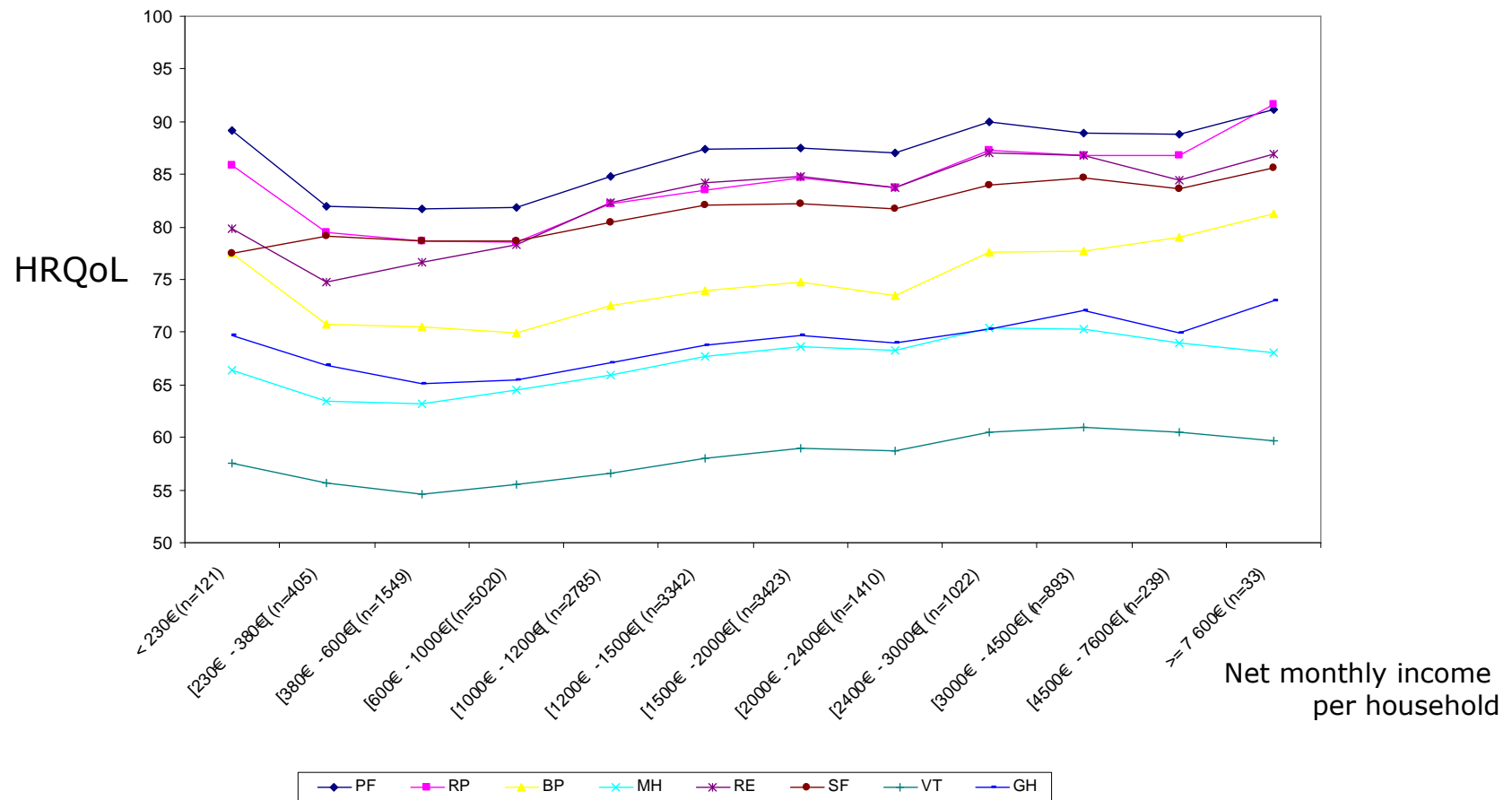
Décennale Santé: level of education



Décennale Santé: occupational status



Décennale Santé: income



Décennale Santé: social indicators

	SF36 *	Physical component summary	Mental component summary
Living in couple	71.6%	--	1.5
Level of education			
> 2 years university	12.5%	0	--
2 years university	13.6%	-0.4	--
High school	17.0%	-0.2	--
College	43.0%	-1.3	--
No diploma	13.9%	-3.1	--
Occupational status			
Employed	58.7%	0	0
Unemployed	6.1%	-0.4	-1.5
Inactive	35.2%	-1.2	-0.8
Income per household			
< 230€		-2.9	-0.8
Chronic condition	40.0%	-4	-3.1

* Multivariate linear regression models adjusted on age and sex

Discussion (1)

□ **Social determinants of HRQoL : why is it important ?**

■ We know that

- health perception impacts on health care recourse

■ Data

- show the existence of social determinants in HRQoL
- indicate that social environment – *as being understood through social determinants' lens* – impacts on health perception
- questions the role of social environment in health perception and health-related quality of life

=> *Can we identify social mechanisms governing the impact of social determinants on HRQoL?*

Discussion (2)

- **Exploring social mechanisms governing the impact of social determinants in HRQoL implies**
 1. a **pluridisciplinary** approach
 - Epidemiology, through HRQoL instruments, studies a part of health perception
 - Psychology examines how chronically ill individuals adapt to their social environment
 - Sociology highlights the social environment of individuals' life
 2. a **multilevel** approach of health perception
 - Population health status
 - Social environment
 - Individual situations

Discussion (3)

3. an **individual – structural** approach, mobilizing the **concept of agency**

"the ability for people to deploy a range of causal powers... the ability to produce an effect" (Frolich et al. 2001, 2002)

"make a difference to a pre-existing state of affairs or course of events" (Giddens, 1984)

- ❑ In public health, an agent is an individual engaging with social environment
- ❑ Linking individual and structural components of health
- ❑ Considers structural roots of social determinants

Conclusion

- Social determinants of HRQoL highlights health inequalities
 - in subjective health assessment
 - in social environment

- Place of monitoring HRQoL in addressing health inequalities ?
 - Health perception can be measured over life span
=> HRQoL may become an inequality indicator

 - HRQoL allows measuring effect of social intervention / of public health intervention on social determinants

Acknowledgments

- INPES: Baromètre Santé 2005
- Insee: Enquête Décennale Santé 2002-03
- Marie-Line Erpelding, biostatistician (Inserm CIC-EC)