

Life isn't always beautiful: risk factors and health-seeking behavior for depression in Italy, PASSI 2007

Nancy Binkin, MD, MPH on behalf of a cast of thousands







Some history....

- Studio PASSI 2005 and 2006: pilots for PASSI, the current Italian behavioral risk factor surveillance system
- Both designed and analyzed by participants of the Italian field epidemiology training program (PROFEA)
- Designed to provide data at local health unit (LHU) and regional level for public health monitoring and decisionmaking



Some history....

- Studio PASSI 2005
 - All 20 regions and 122 of Italy's 195 LHU
 - Nearly 16,000 interviews
- Studio PASSI 2006
 - 6 regions and 35 LHU
 - Nearly 5,000 interviews
 - Viewed as opportunity to revise and improve questionnaire and to try modules on different topics, including depression



Outline

- Five excellent reasons why we considered a depression module in PASSI
- Four equally excellent reasons why we almost didn't
- The Studio PASSI 2006 experience and results
- PASSI 2007 methods and depression module
- Some VERY preliminary results from 2007
- Future directions



Arguments for including a depression module

- 1. Depression is an important and potentially treatable chronic disease
- 2. Substantial personal, familial, economic and societal costs
- 3. Can be reliably diagnosed and treated in primary care settings
- 4. No recent representative data available in Italy
- Population-based estimates can be obtained via a brief series of questions as part of a behavioral risk factor survey



Arguments against including a depression module

- 1. Mental health, unlike most of the other PASSI topics, is not within the realm of epidemiology and public health departments in Italy
- 2. Prevalence potentially too low to obtain reasonably accurate estimates at LHU level, which is PASSI's primarily unit of analysis
- 3. Concern about appropriateness and validity of questions used elsewhere in the Italian setting (linguistic and cultural issues)
- 4. Reluctance of staff to ask questions of a sensitive nature



Studio PASSI 2006

Questions from PHQ-2, but 12 month time frame, with yes/no response format:

- 1. In the last 12 months, have you experienced a period of at least 2 weeks in a row in which you felt little interest or pleasure in doing things?
- 2. In the last 12 months, have you experienced a period of at least 2 weeks in a row in which you felt down, depressed, or without hope?
- For those who responded yes to either or both, additional questions on:
- The extent to which these problems made life or activities difficult
- Whether they had spoken with anyone about these problems
- Whether they had been prescribed anti-depressives
- The name of the medication(s) they had been prescribed

For purposes of the analysis, persons were considered depressed if they responded "yes" to both questions



Results, Studio PASSI 2006

- Only 1% of the 4905 persons interviewed refused to answer the questions
- Final evaluation with interviewers: few complaints
- 18% of those interviewed reported having both symptoms for at least two weeks over the past year
- Depression highly correlated with HRQOL indicators
- 88% reported that they symptoms had made their life "very" or "extremely" difficult
- 41% had talked about their problem with a health provider; 39% hadn't talked with anyone
- Of those who had seen a provider, only 27% had been prescribed medications, of whom many were on ansiolitic agents rather than anti-depressives



Methods, PASSI

- Surveillance system began early summer 2007
- All regions have agreed to participate; system is active in all but two
- Telephone-based survey of adults 18-69 performed by trained LHU staff
 - Sampling frame: those enrolled in the registry of each LHU
 - At least 25 interviews/month (275/year)



Three-question depression module, PASSI

Initial questions follow framework of US BRFSS mental health module

- 1. In the last two weeks, for how many days have you felt little interest or pleasure in doing things?
- 2. In the last two weeks for how many days have you felt down, depressed, or without hope?

For those who respond 10 days or more to one or both questions:

3. As a result of these problems, now or in the past, have you sought help from one or more of the following persons: health personnel (family doctor, psychologist, nurse, etc); someone close (famiy member or friend); no one?



Analysis

- Results based on 6742 interviews uploaded into system as of October 2007 (unweighted)
- Points allocated for each depression question according to the following scheme:
 - 0 1 days = 0 points
 - 1 6 days = 1 point
 - 6 11 days = 2 points
 - 11 14 days = 3 points
- Points for each question summed; persons with scores ≥3 considered "depressed" (in US, sensitivity 83%, specificity 92%)
- Bivariate and multivariate analyses of risk factors for depression performed
- Correlation between depression and HRQOL variables examined

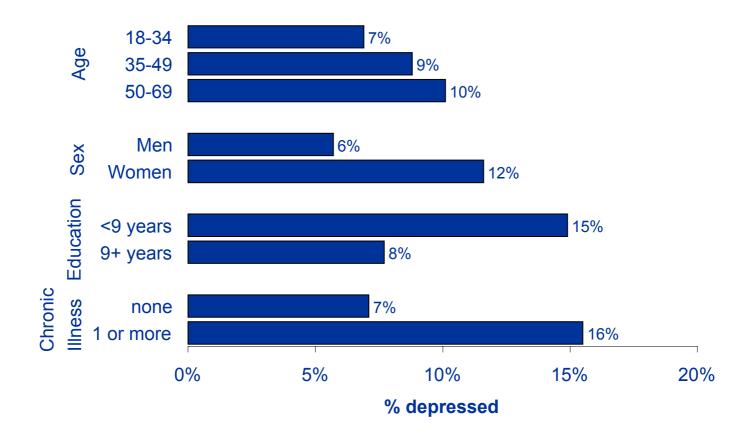


Results

- Results of depression module available for 96%
- Prevalence: 8.7% (95% CI 8.0% 9.4%)
- Care seeking:
 - 39% had spoken with a physician
 - 32% had not spoken with anyone

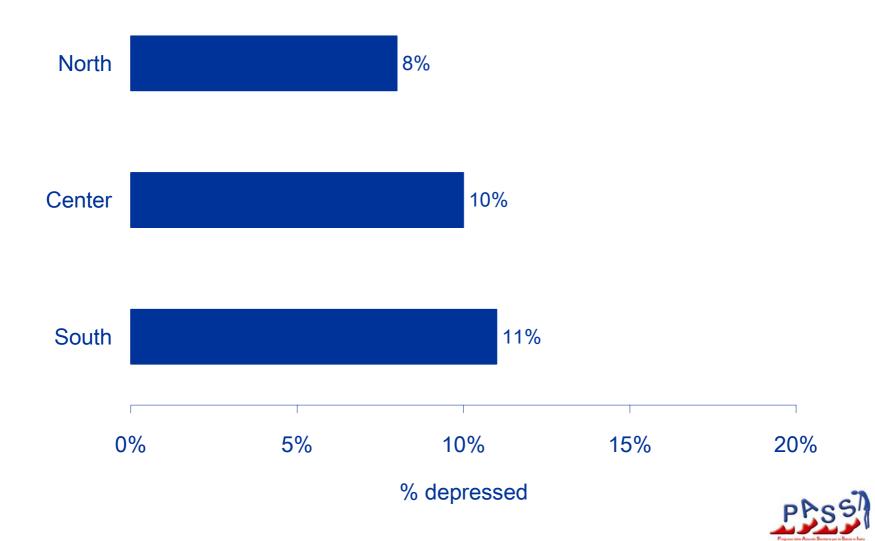


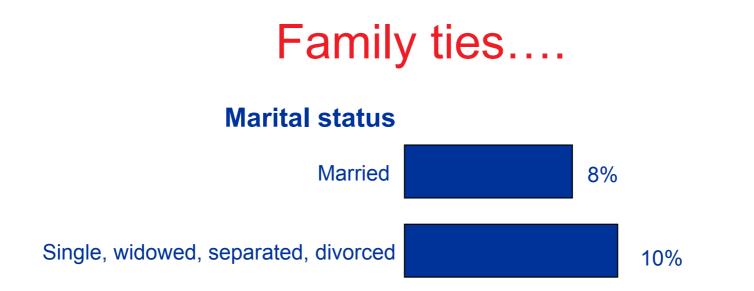
Sociodemographic and medical factors and depression

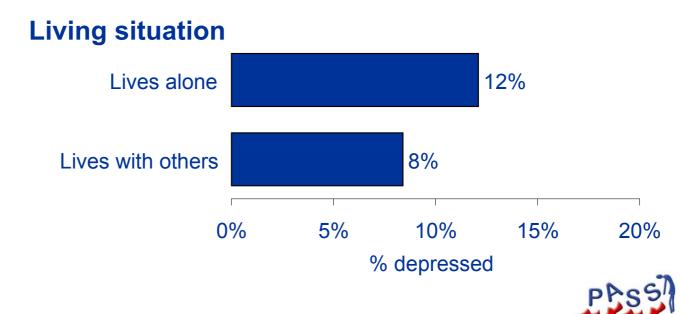




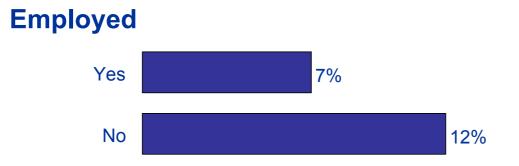
By geographic area...



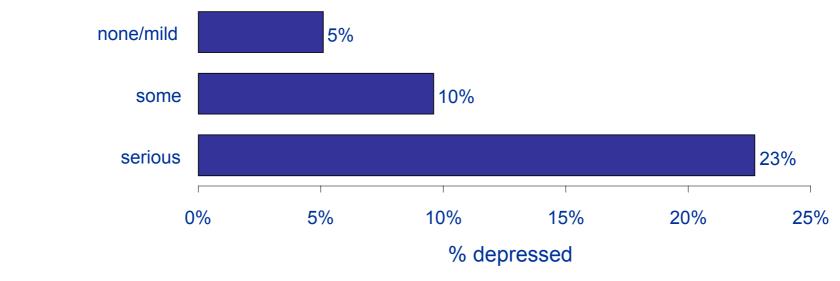




Work and money....



Money problems





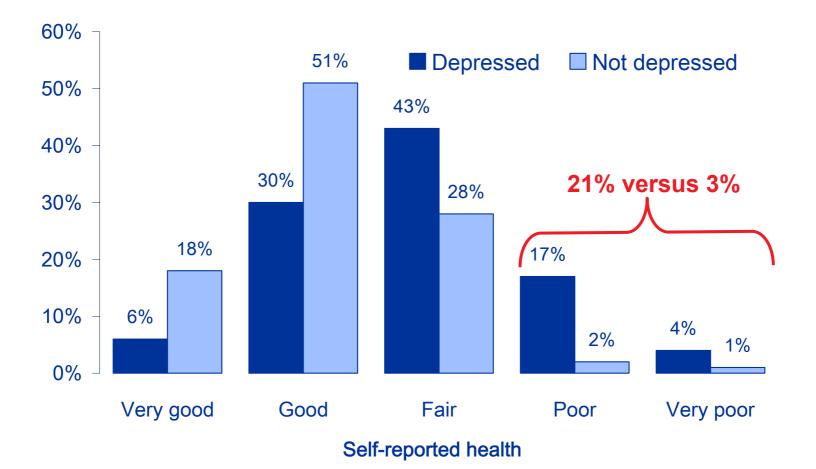
Risk factors for depression, multivariate analysis

Risk factor		Adjusted OR	95% CI
Age	18-34 years	ref	
	35-49 years	1.4	1.1 – 1.9
	50-69 years	1.2	0.9 – 1.6
Sex	women	2.0	1.6 – 2.4
	men	ref	
Marital status	single	1.4	1.2 – 1.8
	M/W/S/D	ref	
Chronic disease	0	ref	
	≥1	2.0	1.7 – 2.5
Employment	no	1.4	1.2 – 1.7
	yes	ref	
Financial	few or none	ref	
problems	moderate	1.8	1.5 – 2.3
-	serious	4.3	3.4 – 5.5

Education, living situation, and geographic area not significantly associated with depression



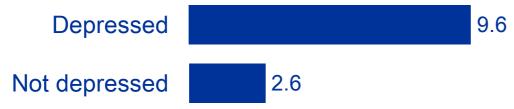
Depression and self-reported health



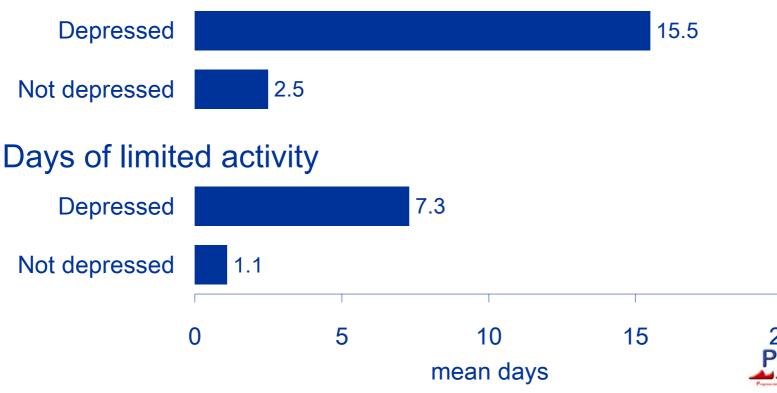


Correlation with HRQOL

Days of bad physical health



Days of bad mental health



The future

- Clearly an important and largely unrecognized health problem in Italy
- Feasible to include brief module in the context of a behavioral risk factor questionnaire
- Decent face and convergent validity
- Persons interviewed are willing to respond to the questions

but....



The future

- Prevalence of 10% may make one-year estimates
 unreliable at LHU level
- Challenges of reaching out to the mental health community to ensure maximal data utilization
- At least some interviewers remain reluctant to administer the questions as written

... for how many days have you felt down, depressed, or without hope?

 Instrument needs further validation, which will be possible using data from previous national mental health survey that included the PHQ-2



In or out?

- Multiple-year data collection to obtain reliable LHU-level estimates?
- Alternate with anxiety module?
- Eliminate altogether because it's not within the scope of public health in our setting?

