

# European Respiratory Society Annual Congress 2012

**Abstract Number:** 2078

**Publication Number:** P1001

**Abstract Group:** 6.1. Epidemiology

**Keyword 1:** Epidemiology **Keyword 2:** Public health **Keyword 3:** Asthma - management

**Title:** Differential socio-economic burden of chronic respiratory diseases in adults: Preliminary results from the Gene Environment Interactions in Respiratory Diseases (GEIRD) study

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**Body:** Chronic respiratory diseases are a significant cause of morbidity and mortality worldwide. We sought to evaluate their socio-economic burden among Italian adults. In 2007/2010, a screening questionnaire was mailed up to 3 times to general population samples of adults (20-64 yr), and eventually given over the phone to the remaining non-responders, in 4 Italian centres (Pavia, Sassari, Turin, Verona) in the frame of the GEIRD study (response rate=55.4%). Ever asthma, chronic bronchitis (CB), allergic rhinitis, other respiratory conditions, and the absence of respiratory problems were defined on the basis of self-reported respiratory symptoms. The percentages\* of subjects who reported at least one emergency department (ED) visit/hospital admission and at least one working day lost because of health problems (apart from accidents and injuries) in the past 3 months are shown in this table:

	ever asthma and CB (n=296)	CB without ever asthma (n=733)	ever asthma without CB (n=609)	allergic rhinitis only (n=949)	other respiratory conditions (n=1,455)	no respiratory problem (n=3,068)
ED visits/hospital admissions	15.9%	13.7%	11.4%	9.8%	10.5%	5.9%

working days lost	31.5%	21.3%	22.4%	20.4%	20.1%	12.9%
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\*adjusted for gender, age, season of response, type of contact, cumulative response rate, and centre

The socio-economic burden was significantly different ( $p < 0.001$ ) according to disease status. Patients with any respiratory condition had a two-fold greater risk of reporting at least one ED visit/hospital admission (11.5% vs 5.9%) and at least one working day lost (21.5% vs 12.9%) than subjects without respiratory problems.