

## SUPPLEMENTARY MATERIAL

**Table S1. Characteristics of the assessed participants in the performed analyses according to (A) disease control, and (B) comorbid status (allergic rhinitis alone versus allergic rhinitis + asthma).**

	A. Allergic disease control <sup>a</sup>	B. Comorbid status <sup>b</sup>
N responses	91	662
Females – N (%)	60 (65.9)	466 (70.4)
Age – mean (SD)	21.0 (3.8)	20.7 (4.1)
N aged > 18 years old (%)	64 (82.1)	437 (66.0)
AR + Asthma – N (%)	34 (37.4)	248 (37.5)
Baseline impact <sup>c</sup> – Median (IQR)	2 (2)	2 (2) <sup>d</sup>
Baseline symptoms <sup>e</sup> – Median (IQR)	6 (2)	5 (3) <sup>f</sup>
Well-controlled weeks – N (%)	37 (40.7)	NA

AR = Allergic rhinitis. NA = Not applicable. SD = Standard deviation. a - Academic performance according to disease control was assessed only when full weeks of data were available. b - Academic performance according to comorbid status was assessed for all WPAI:AS+CIQ responses. c – Computed based on the number of different ways in which allergy symptoms affect the users at baseline. d – AR alone (Median (IQR)): 2 (2); AR + Asthma (Median (IQR)): 2 (2). e - Computed based on the number of reported allergy symptoms at baseline. f - AR alone (Median (IQR)): 5 (3); AR + Asthma (Median (IQR)): 5 (2)

**Table S2. Description of nose, asthma and global allergy symptoms for patients with allergic rhinitis (AR) alone or AR + asthma.**

	A. AR alone (N=351 <sup>a</sup> )	B. AR + Asthma (N=204 <sup>a</sup> )
VAS Nose – Median (IQR)	22.0 (33.5)	19.5 (40.5)
Good [ $\leq 20$ ] – N (%)	166 (47.3)	104 (51.0)
Medium [21-35] – N (%)	79 (22.5)	39 (19.1)
Poor [ $\geq 36$ ] – N (%)	106 (30.2)	61 (29.9)
VAS Asthma – Median (IQR)	NA	8.0 (34.0)
Good [ $\leq 20$ ] – N (%)	NA	124 (60.8)
Medium [21-35] – N (%)	NA	34 (16.7)
Poor [ $\geq 36$ ] – N (%)	NA	46 (22.5)
VAS Global – Median (IQR)	19.0 (31.5)	19.0 (39.2)
Good [ $\leq 20$ ] – N (%)	183 (52.1)	105 (51.5)
Medium [21-35] – N (%)	74 (21.1)	40 (19.6)
Poor [ $\geq 36$ ] – N (%)	94 (26.8)	59 (28.9)

<sup>a</sup> – N corresponds to the number of daily monitoring diaries, considering the 91 responses to the WPAI+CIQ:AS questionnaire for which there are at least 5 days of daily monitoring data in the week preceding the response. IQR = Interquartile range. NA = Not applicable. VAS = Visual Analogue Scale.

**Table S3. Percentage of hours with academic impairment in allergic rhinitis (AR) according to weekly disease control (A) or comorbid status (B).**

	Absenteeism % – Median (P25- P75)	Presenteeism % – Median (P25- P75)	Total % – Median (P25- P75)
<b>A. Allergic disease control</b>			
Well controlled (n=37)	0.1 (0.0-1.7)	8.7 (1.8-24.0)	8.9 (1.7-25.6)
Uncontrolled (n=54)	1.1 (0.0-13.5)	32.8 (15.4-55.4)	37.2 (14.7-63.9)
<b>B. Comorbid status</b>			
AR alone (n=351)	0.1 (0.0-6.8)	26.5 (8.0-55.1)	30.0 (8.4-62.2)
AR + Asthma (n=204)	0.1 (0.0-7.4)	26.7 (9.1-52.3)	31.3 (10.1-61.7)

P = Percentile of the posterior predictive distribution.

**Table S4. Percentage of hours with academic impairment according to allergic disease control, stratified by comorbid status.**

	Absenteeism % – Median (P25-P75)	Presenteeism % – Median (P25- P75)	Total % – Median (P25- P75)
<b>Well controlled</b>			
AR alone (N=22)	0.2 (0.0-2.7)	9.4 (1.8-26.3)	9.9 (1.7-28.8)
AR + Asthma (N=15)	0.7 (0.4-1.0)	9.1 (2.6-21.0)	9.2 (2.5-21.5)
<b>Uncontrolled</b>			
AR alone (N=35)	1.3 (0.0-11.3)	36.1 (16.9-59.1)	39.2 (17.4-64.8)
AR + Asthma (N=19)	1.4 (0.0-20.3)	28.7 (13.0-49.0)	32.6 (11.5-61.2)

P = Percentile of the posterior predictive distribution.