

Differences in exacerbations and health care utilisation in COPD populations in the UK and France**Supplementary material****Contents**

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Table E1: Inclusion of COPD patients in the UK using CPRD GOLD and Hospital Episode Statistics.

Patients:	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Patients in CPRD with at least two years of data	3,560,943	3,627,084	3,536,767	3,481,802	3,372,756	3,041,985	2,520,261	1,818,485	1,335,921	1,072,652
COPD patients in CPRD with at least two year of data prior	147,811	149,303	148,183	145,027	142,051	130,407	110,780	80,934	59,759	47,652
At least one COPD criteria during the studied year	42,003	42,855	43,111	42,948	42,603	39,760	33,984	26,988	18,543	14,224
<ul style="list-style-type: none"> • hospitalised for COPD • with at least one prescription of bronchodilator over 3 consecutive quarters 	4,126	4,001	4,049	3,919	3,932	3,816	3,372	2,733	2,075	1,487
	37,877	38,854	39,062	39,029	38,671	35,944	30,612	24,255	16,468	12,737
Aged 40 or older at the studied year	41,561	42,401	42,838	42,557	42,234	39,406	33,723	26,816	18,425	14,097
Without asthma hospitalization in the 2 years prior and over the studied year (%) [§]	40,938 (1.1)	41,831 (1.2)	42,111 (1.2)	42,018 (1.2)	41,774 (1.2)	39,046 (1.3)	33,419 (1.3)	26,593 (1.5)	18,213 (1.4)	13,939 (1.3)

[§] Percentage of patients out of all patients in CPRD each year with at least two years of data.

Table E2: Inclusion of COPD patients in France using the Echantillon Généraliste des Bénéficiaires.

Patients	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Affiliated to the EGB in the 2 years prior and over the studied year	464,399	471,176	481,811	477,471	491,160	497,176	502,930	508,585	513,912	521,254
At least one COPD criteria during the studied year	7,542	8,033	8,846	8,883	9,335	9,589	9,908	10,280	10,544	10,695
<ul style="list-style-type: none"> • hospitalised for COPD 	256	317	378	414	439	449	496	539	560	566
<ul style="list-style-type: none"> • with at least one dispensing of bronchodilator over 3 consecutive quarters 	7,388	7,864	8,645	8,669	9,133	9,364	9,655	10,021	10,283	10,597
Aged 40 or older at the studied year	6,047	6,528	7,257	7,362	7,775	8,033	8,352	8,697	8,949	9,312
Without asthma hospitalization in the 2 years prior and over the studied year (%) [§]	5,288 (1.1)	5,741 (1.2)	6,430 (1.3)	6,546 (1.4)	6,965 (1.4)	7,266 (1.5)	7,562 (1.5)	7,897 (1.6)	8,176 (1.6)	8,528 (1.6)

[§] Percentage of patients out of all patients in EGB each year with at least two year of data

Table E3: Mean age of COPD patients, proportion of men, and proportion of all-cause deaths each year between 2008 and 2017 in France and the UK.

Characteristic	Country	2008	2009	2010	2011	2012	2013	2014	2015	2016	2017
Mean age (SD)	UK	70.9 (10.8)	70.9 (10.8)	71.1 (10.9)	71.2 (10.9)	71.3 (10.9)	71.4 (10.9)	71.5 (10.9)	71.6 (10.7)	71.5 (10.9)	71.5 (10.8)
	France	65.8 (13.1)	65.9 (13.1)	66.3 (13.0)	66.4 (13.1)	66.5 (13.1)	66.5 (13.1)	66.8 (13.0)	66.8 (13.0)	66.7 (13.0)	66.8 (12.9)
Gender (% males)	UK	20,710 (50.6)	21,118 (50.5)	21,246 (50.4)	21,279 (50.6)	21,204 (50.8)	19,797 (50.7)	17,010 (50.9)	13,506 (50.8)	9,240 (50.7)	6,998 (50.2)
	France	2,784 (52.6)	3,032 (52.8)	3,395 (52.8)	3,393 (51.8)	3,598 (51.7)	3,802 (51.5)	3,896 (50.6)	3,996 (50.8)	4,155 (50.8)	4,298 (50.4)
Mortality (all-cause) n (%)	UK	1,466 (3.6)	1,392 (3.3)	1,396 (3.3)	1,316 (3.1)	1,445 (3.5)	1,325 (3.5)	1,150 (3.4)	897 (3.4)	575 (3.2)	486 (3.5)
	France	107 (2.0)	110 (1.9)	120 (1.9)	133 (2.0)	150 (2.2)	150 (2.1)	189 (2.5)	144 (1.8)	165 (2.0)	171 (2.0)

Table E4: Healthcare utilisation in 2017 in COPD patients identified in the UK and France (medians and interquartile ranges).

Type of healthcare utilisation		UK	France
All-cause hospitalisations	Number of patients (%)	6,121 (43.9)	2,793 (32.8)
	Median numbers of stays* (Q1-Q3)	2 (1-3)	1 (1-2)
	Median number of days in hospital* (Q1-Q3)	1 (1-4)	2 (1-6)
COPD-related hospitalisations	Number of patients (%)	1,157 (8.3)	420 (4.9)
	Median numbers of hospital stays* (Q1-Q3)	1 (1-2)	1 (1-1)
	Median number of days in hospital* (Q1-Q3)	3 (1-7)	8 (5-14)
CVD-related hospitalisations	Number of patients (%)	149 (1.1)	36 (0.4)
	Median numbers of hospital stays* (Q1-Q3)	1 (1-1)	1 (1-1)
	Median number of days in hospital* (Q1-Q3)	5 (2-12)	4 (2-6)
GP visits	Number of patients (%)	13,366 (95.9)	8,226 (96.5)
	Median number of visits* (Q1-Q3)	12 (7-19)	7 (4-11)
Respiratory-related OP appointments	Number of patients (%)	1,400 (13.9)	619 (7.3)
	Median number of visits* (Q1-Q3)	2 (1-4)	1 (1-2)
A&E visits	Number of patients (%)	5,546 (39.8)	1,378 (16.2)
	Median number of visits* (Q1-Q3)	2 (1-3)	1 (1-1)

*In patients with at least one visit. CVD: Cardiovascular Disease; GP: General Practitioner; OP: outpatient; A&E: Accident & Emergency.

Figure E1: Proportion of patients (%) hospitalised for exacerbations of COPD each year between 2008 and 2017 in the UK and France.

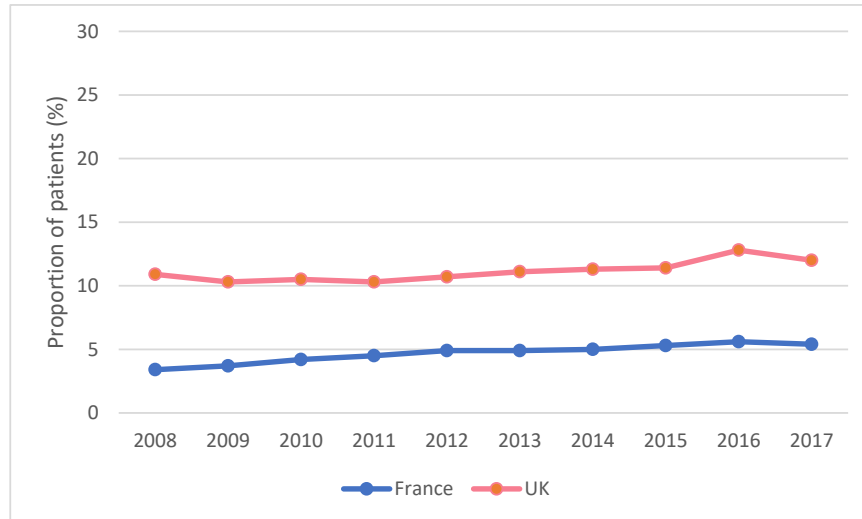
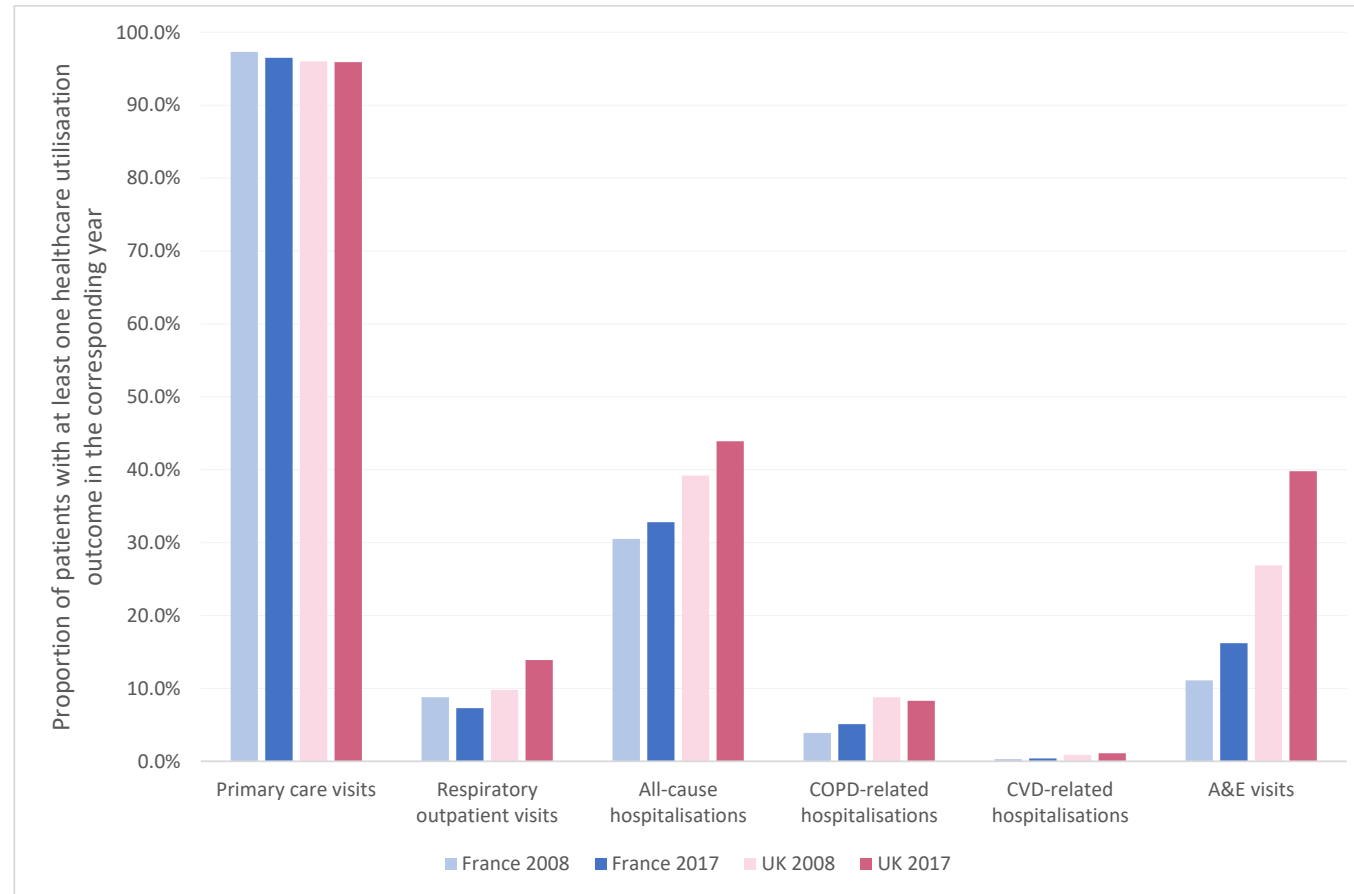


Figure E2: Proportion (%) of COPD patients admitted to hospital, visiting the emergency room, visiting their GP, and referred to outpatient clinics in 2008 and 2017 in France and in the UK.



ICD 10 codes for exacerbations of COPD used as one of the definitions to identify COPD patients in the UK and France

ICD 10 codes
J41; J42; J44; J441.; J44.9