

# Seasonal influenza vaccination programme country profile: United Kingdom — England

#### 2012-13 Season

### **Background information**

Influenza immunisation policy and	general facts about United Kingdom
Volume indices of GDP per capita in 2011 and 2013 (EU-28=100) Source: Eurostat <sup>a</sup>	106 and 109 respectively (UK)
Health costs as % of GDP 2011 Source: Eurostat b	8.0% (UK)
Total population of the country, 2011 Source: Eurostat c	63 182 180 (UK)
Population ≥65, 2011 Source: Eurostat <sup>c</sup>	10 377 125 (16.4% of the total population) (UK)
Population with chronic medical conditions <65 years, 2006 Source: ECDC (based on methodology by Fleming and Eliot, 2006) <sup>d</sup>	5 051 000 (8.0% of the total population) (UK)
Number of live births in 2011 <sup>e</sup>	807 776 (1.3% of the total population) (UK)
National seasonal influenza recommendations (e.g. age and target group recommendations and guidelines)	Recommendations available
URL link to Immunisation Guidelines for England	http://webarchive.nationalarchives.gov.uk/201301071053 54/https://www.wp.dh.gov.uk/immunisation/files/2012/07 /Green-Book-Chapter-19-v4_71.pdf
National Action Plan (NAP) as requested by EC	Plan was developed previously and updated according to EC recommendation
URL link to NAP	http://webarchive.nationalarchives.gov.uk/201301071053 54/http://www.dh.gov.uk/prod consum dh/groups/dh di gitalassets/@dh/@en/documents/digitalasset/dh 133964. pdf

#### **EUROSTAT links:**

<sup>a</sup>GDP per capita 2013 (accessed 15.12.2014): <a href="http://ec.europa.eu/eurostat/statistics-explained/index.php/GDP">http://ec.europa.eu/eurostat/statistics-explained/index.php/GDP</a> per capita, consumption per capita and price level indices

bHealth expenditures 2011(accessed 15.12.2014): <a href="http://ec.europa.eu/eurostat/statistics-explained/index.php/General government expenditure on social protection and health">http://ec.europa.eu/eurostat/statistics-explained/index.php/General government expenditure on social protection and health</a>

<sup>c</sup>Total population and those > 65 years of age 2011(accessed 15.12.2014): https://ec.europa.eu/CensusHub2/intermediate.do?&method=forwardResult

<sup>d</sup> Population with chronic medical conditions 2006:

http://www.ecdc.europa.eu/en/publications/Publications/0808 GUI Priority Risk Groups for Influenza Vaccination on.pdf (Fleming, D.M. and A.J. Elliot, Estimating the risk population in relation to influenza vaccination policy. 2006 May 15; 24(20):4378-85)

e Number of live births in 2011(accessed 15.12.2014): http://ec.europa.eu/eurostat/tgm/table.do?tab=table&init=1&language=en&pcode=tps00111&plugin=1

# Seasonal influenza vaccination recommendations and payment mechanism for vaccination

Vaccination recommendations (population g	roups targeted by vaccination)
Overall population	No recommendation
Healthy children and adolescents	No recommendation
Older population groups: ≥65 years of age	Recommended
Chronic medical conditions	Recommended: - Pulmonary diseases; - Neurologic diseases; - Cardiovascular diseases; - Renal diseases; - Hepatic diseases; - Haematological disorders; - Metabolic disorders; - Immunosuppressed individuals; - HIV/AIDS.
	No recommendation: - Morbid obesity, - Long-term aspirin use (children <18 years).
Pregnancy-related vaccination (including post-partum women)	Recommended: - For all pregnant women at any stage during pregnancy.
	No recommendation: - Postpartum women if not vaccinated during pregnancy.
Healthcare workers	Recommended: - To some healthcare workers a
Other occupational groups	Recommended: - Social care workers.
Population groups in closed communities	Recommended: - For residents of long- term care facilities;
	No recommendation:     - For prisoners;     - For children in day care centres
Household contacts or carers of	Recommended: - Immunosuppressed individuals.
	No recommendation: - Infants <6months of age; - Individuals with chronic medical conditions; - ≥65 years of age.

<sup>&</sup>lt;sup>a</sup> 'Some' means outpatient/inpatient/long-term care facility workers/ front line healthcare workers/ healthcare workers that have direct contact with patients.

Payment mechanism for vaccine and its administration for the population groups targeted by seasonal influenza vaccine				
	For vaccine	For administration		
Overall population	na	na		
Healthy children and adolescents	na	na		
Older population groups (≥65 years of age) <sup>a</sup>	National health service	National health service		
Chronic medical conditions groups (by group) <sup>a</sup>	National health service	National health service		
Pregnancy-related vaccination (including post- partum women) <sup>a</sup>	National health service	National health service		
Health care workers (including staff of long-stay care facilities) <sup>a</sup>	National health service	National health service		
Other occupational groups <sup>a</sup>	National health service	National health service		
Population groups in closed communities <sup>a</sup>	National health service	National health service		
Household contacts or care givers <sup>a</sup>	National health service	National health service		

na: not applicable

**National insurance scheme**: health contributions are paid to the insurance fund and then for this contribution there is a package of services received. It is not by default that you receive the services if you do not pay the insurance contributions.

**National health service**: taxes are paid by a citizen or resident of the country and this person is covered by the health service.

Out of pocket: not reimbursed, paid by receiver of vaccine.

### **Vaccination coverage rates**

Vaccination coverage (%) in population groups targeted by seasonal influenza vaccination the from 2008-09 to the 2012-13 influenza season by method of data collection (administrative and /or survey)

Population group	Influenza season									
	2008	3–09	2009	9–10	2010	<b>)–11</b>	201	L-12	2012	2–13
	Admin.	Surv.	Admin.	Surv.	Admin.	Surv.	Admin.	Surv.	Admin.	Surv.
Overall population	na	na	na	na	na	na	na	na	na	na
Children/adolescents	na	na	na	na	na	na	na	na	na	na
Older population groups: ≥65 years of age	74.1	na	72.4	na	72.8	na	74	na	73.4	na
Chronic medical conditions groups <sup>a</sup>	47.1	na	51.6	na	50.4	na	51.6	na	51.3	na
Pregnant women b	-	-	_	-	38	na	27.4	na	40.3	na
Healthcare workers	NA	na	26.4	na	34.7	na	44.6	na	45.6	na
Staff in long-stay care facilities <sup>c</sup>	-	-	-	-	-	-	45.2	na	NA	na
Residents in long stay care facilities <sup>c</sup>	-	-	-	-	-	-	NA	na	NA	na

na: Not applicable

NA: Not available

<sup>&</sup>lt;sup>a</sup> No co-payment for vaccine and vaccine administration.

<sup>&</sup>lt;sup>a</sup> Vaccine uptake is for patients who are between 6 months and 65 years in a clinical risk group. It includes pregnant women with other risk factors but excludes otherwise-healthy pregnant women and carers.

<sup>&</sup>lt;sup>b</sup> VENICE started to collect vaccination coverage data for pregnant women after the A(H1N1)pdm09 (2010-11 influenza season).

<sup>&</sup>lt;sup>c</sup> VENICE started to collect vaccination coverage data for staff and residents in long-stay care facilities for the influenza season 2011-12.

Figure 1. Seasonal influenza vaccination coverage among those ≥65 years of age from the 2008-09 to the 2012-13 influenza season

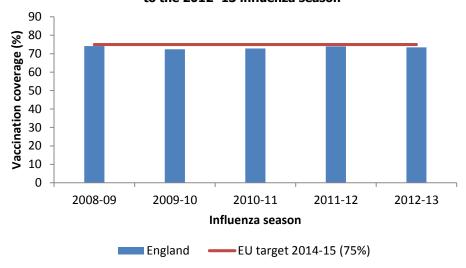


Figure 2. Seasonal influenza vaccination coverage among those with chronic medical conditions from the 2008–09 to the 2012–13 influenza season

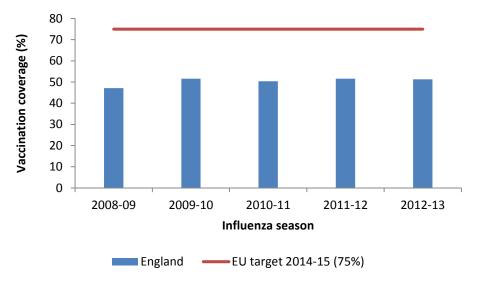
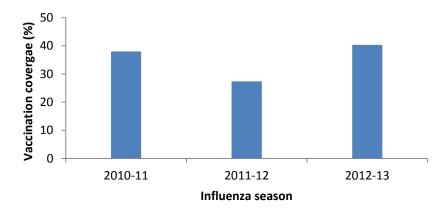


Figure 3. Seasonal influenza vaccination coverage among pregnant women from the 2010–11 to 2012–13 influenza season



Note: VENICE started to collect vaccination coverage data for pregnant women after the A(H1N1)pdm09 (2010–11 influenza season).

Figure 4. Seasonal influenza vaccination coverage among healthcare workers from the 2009–10 to the 2012–13 influenza season

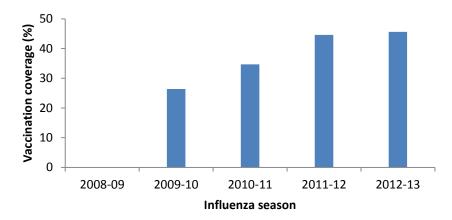
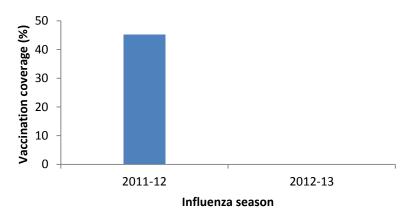


Figure 5. Seasonal influenza vaccination coverage among residents and staff of long-stay care facilities, 2011–12 influenza season



Note: VENICE started to collect vaccination coverage data for staff and residents in long stay care facilities for the 2011–12 influenza season.

### Methods to monitor vaccination coverage, safety and effectiveness

Monitoring of vaccination coverage during the 2012–13 influenza season			
Method used to monitor influenza vaccination coverage			
Administrative method only			

Method used (administrative, survey) to monitor vaccination coverage by population group			
Administrative	Survey		
Adults: aged ≥65 years old; Individuals with medical/risk conditions (clinical risk groups); Pregnant women; Healthcare workers	na		

na: Not applicable

Details on administrative method used (medical records vs. immunisation registry; manual vs. electronic) by population group					
Medical records Immunisation registry					
Manual	Electronic	Manual	Electronic		
Healthcare workers	Adults aged ≥65 years old; Individuals with medical/risk conditions (clinical risk groups); Pregnant women	No	No		

Numerator assessment				
Pharmaceutical data	Administrative data	Frequency of numerator assessment		
Not used	Aggregate collection of number of vaccines administered	Weekly		

Denominator assessment by population groups and data source				
Population group Data source for population group				
Entire population	Used. GP registered			
Children and adolescents	Used. GP registered			
Adults	Used. GP registered			
Individuals with medical/risk conditions (clinical risk groups)	Used. GP registered			
Pregnant women	Used. GP registered			
Healthcare workers	Used. Occupational health records			
Essential public sector workers	Not used			
Prisoners	Not used			
Residents of long-term care institutions	Not used			
Educational institutions	Not used			
Other, please specify	Not used			

Details for survey method used for the 2012–13 influenza season					
Type of the survey Survey mode Sampling strategy Sample size					
na	na	na	na		

na: Not applicable

Scientific studies conducted for vaccination coverage; vaccine safety and vaccine effectiveness

Effectiveness: <a href="http://www.ncbi.nlm.nih.gov/pubmed/23399421">http://www.ncbi.nlm.nih.gov/pubmed/23399421</a>

Vaccine safety monitoring (adverse events following immunisation AEFV)					
Data collected at the national and at the regional level	Data linkage with immunisation registry	Details collected	Status of reporting	AEFV reported to	
Yesa			Mandatory	MHRA	

a: Yellow card reporting system to MHRA.

Monitoring of influenza vaccine break-through <sup>a</sup> infections in vaccinated individuals					
Data collected at the national and at the regional level  Data linkage with immunisation registry  Details collected					
There is no such system	na	na			

na: Not applicable

### **Vaccine procurement and delivery**

Influenza vaccine procurement and delivery, 2012–13 influenza season			
Number of doses			
Purchased	Distributed	Used	
NK	17 566 957*	11 914 798*	

NK: Not known

<sup>\*</sup>Number of doses distributed and used in entire UK.

Type of vaccine/Product Name	Target groups			
Trivalent inactivated non-adjuvanted vaccines (TIV)				
Used				
Abbott / Mylan; GlaxoSmithKline; Pfizer; Sanofi Pasteur; Novartis AstraZeneca Janssen-Cilag MASTA	Children and adolescents; Older adults (e.g. ≥60/65 years); Those with medical condition/s; Pregnant women; Residents of long stay care facilities; Healthcare workers			
Trivalent inactivated adjuvanted vaccines (aTIV)				
Not used				
Trivalent live attenuated nasal vaccine (LAIV)				
Not used				
Quadrivalent attenuated nasal vaccine (LAIV)				
Not used				

### **Promoting seasonal influenza vaccination**

Promoting seasonal influenza vaccination during the 2012-13 influenza season		
Promotion activities with the general public and healthcare workers	Source of information (if yes)	
na		

na: Not applicable

<sup>&</sup>lt;sup>a</sup> Break-through infection is defined as laboratory-confirmed influenza infection >14 days after seasonal influenza vaccination in the current season (i.e. vaccine failure).

## Use of antiviral agents for treatment and chemoprophylaxis of influenza

#### Recommendations and/or guidelines (policy document) on antiviral use

Recommendations available

Use of antiviral agents for treatment and chemoprophylaxis of influenza during the 2012-13 influenza season				
Use of antivirals for <u>treatment</u> for in-patients and out-patients who are at higher risk of developing influenza complications				
For in-patients who:				
<ul> <li>have severe, complicated influenza-like illness (ILI);</li> <li>have progressive influenza-like illness;</li> <li>require hospitalisation due to influenza-like illness.</li> </ul>	Recommended			
For out-patients who are at higher risk of developing influenza complications on the basis of their age or underlying medical conditions:				
<ul><li>Children &lt; 2 years;</li><li>Children &lt; 5 years;</li></ul>	No recommendation			
<ul> <li>Adults aged ≥65 years;</li> <li>Individuals belonging to risk groups.</li> <li>Women who are pregnant or postpartum (within 6 weeks after delivery);</li> <li>Residents of nursing homes and other chronic-care facilities.</li> </ul>	Recommended			
Use of antivirals for <u>post-exposure</u> prophy	laxis			
For family or other close contacts of a person at higher risk for influenza complications who have not been vaccinated with influenza vaccine at the time of exposure;	No recommendation			
For unvaccinated healthcare workers with occupational exposure and who did not use personal protective equipment at the time of exposure	No recommendation			
Use of antivirals for <u>pre-exposure</u> prophyl	axis			
For individuals who are at high risk (e.g. severely immunosuppressed patients) for influenza-related complications who cannot otherwise be protected during times when a high risk for exposure exists	No recommendation			
Use of antivirals for <u>control of</u> influenza <u>outh</u>	<u>oreaks</u>			
For individuals in long-term care facilities/care for immunocompromised individuals if not vaccinated or if the circulating influenza strain does not match the vaccine strains	No recommendation			
For unvaccinated healthcare staff who provide care to individuals at high risk of developing complications in long-term care facilities/ care for immunocompromised patients if not vaccinated or if the circulating influenza strain does not match the vaccine strains	No recommendation			
For all health care staff regardless of whether they received an influenza vaccination if the circulating influenza strain does not match the vaccine strains	No recommendation			
Prisoners	No recommendation			
Educational institutions	No recommendation			
Existence of antiviral resistance surveillance system				
Antiviral resistance surveillance system	There is an antiviral resistance surveillance system in place			

Country profiles are based on the <u>Seasonal Influenza Vaccination in Europe</u> report produced by the European Centre for Disease Prevention and Control (ECDC) and the Vaccine European New Integrated Collaboration Effort III (VENICE III). The data are from the seasonal influenza vaccination survey for 2012–13 season in EU/EEA countries. During the validation process in June 2015, minor changes were introduced in some country profiles. Therefore, data may be different to those available in the report.