# Be on the TEAM: Teenagers Against Meningitis

Submission date	<b>Recruitment status</b> No longer recruiting	[X] Prospectively registered		
12/03/2018		[X] Protocol		
Registration date	Overall study status	Statistical analysis plan		
14/03/2018	Completed	Results		
Last Edited	Condition category	Individual participant data		
18/06/2025	Infections and Infestations	[X] Record updated in last year		

### Plain English summary of protocol

Background and study aims

Teenagers and young children are at increased risk of diseases such as meningitis and blood poisoning due to bacteria called meningococcus. Although these diseases can be serious, the meningococcus bacteria are carried in the back of the throat of 1 in 10 teenagers without causing any symptoms. Most meningococcal disease in teenagers is due to Meningitis B (also known as MenB). The aim of this study is to see whether immunising teenagers with vaccines against MenB can reduce the number of teenagers carrying these bacteria in their throat. This would be important because it could mean that teenage MenB immunisation would not only help protect teenagers against these potentially deadly diseases, but also that babies, children and older adults are less likely to be exposed to the bacteria. In short, immunising teenagers with a MenB vaccine might mean lower rates of meningococcal disease across all ages.

#### Who can participate?

Students aged 16-18 attending year 12 (or equivalent) at one of the participating 6th form colleges in England, Scotland and Wales

#### What does the study involve?

Participating schools are randomly allocated to deliver one of two types of MenB vaccine: 4CMenB (also known as Bexsero) and MenB-fHBP (also known as Trumenba). Participants either get two doses of 4CMenB or MenB-fHBP given 6 months apart at their first two study visits, or two doses of 4CMenB 1 to 6 months apart at their last two study visits. These vaccines are approved for use in the UK, but are not routinely given to teenagers in this country. Samples are collected from the participants' throats to compare rates of MenB carriage before and after getting the MenB vaccine. Teenagers have three study visits over 12 to 18 months and all visits take place within schools.

What are the possible benefits and risks of participating? Not provided at time of registration

Where is the study run from? University of Oxford(UK)

When is the study starting and how long is it expected to run for? October 2017 to March 2024 Who is funding the study?

- 1. Department of Health (UK)
- 2. Pfizer (UK)

Who is the main contact? Emma Plested

## **Contact information**

## Type(s)

Scientific

#### Contact name

Mrs Emma Plested

#### Contact details

Oxford Vaccine Group, University of Oxford CCVTM Churchill Hospital Headington Oxford United Kingdom OX3 7LE

## Additional identifiers

EudraCT/CTIS number 2017-004609-42

**IRAS** number

ClinicalTrials.gov number

Secondary identifying numbers 37350

## Study information

#### Scientific Title

Evaluating the effect of immunisation with group B meningococcal vaccines on meningococcal carriage

## Study objectives

Teenagers and young children are at increased risk of diseases such as meningitis and blood poisoning due to bacteria called meningococcus. Although these diseases can be serious, the meningococcus bacteria are 'carried' in the back of the throat of 1 in 10 teenagers without causing any symptoms. Most meningococcal disease in teenagers is due to Meningitis B (also known as MenB). The aim of this study is to find out whether immunising teenagers with vaccines against MenB can reduce the number of teenagers carrying these bacteria in their

throat. This would be important because it could mean that teenage MenB immunisation would not only help protect teenagers against these potentially deadly diseases, but also that babies, children and older adults are less likely to be exposed to the bacteria. In short, immunising teenagers with a MenB vaccine might mean lower rates of meningococcal disease across all ages.

## Ethics approval required

Old ethics approval format

### Ethics approval(s)

South Central – Berkshire B Research Ethics Committee, 02/03/2018, ref: 18/SC/0055

### Study design

Non-randomised; Both; Design type: Prevention, Vaccine, Cross-sectional

### Primary study design

Interventional

#### Secondary study design

Non randomised study

#### Study setting(s)

School

#### Study type(s)

Prevention

## Participant information sheet

Not available in web format, please use the contact details to request a patient information sheet

## Health condition(s) or problem(s) studied

Vaccination against meningitis

#### **Interventions**

Vaccines are randomly allocated by the project statistician on a site by site basis. Sites remain assigned to one vaccine group only for the duration of the study. Two types of MenB vaccine are used: 4CMenB (also known as Bexsero) and MenB-fHBP (also known as Trumenba). Participants in this study will either get two doses of 4CMenB or MenB-fHBP given 6 months apart at their first two study visits, or two doses of 4CMenB 1 to 6 months apart at their last two study visits. These vaccines are approved for use in the UK, but are not routinely given to teenagers in this country. The two doses of MenB vaccine will be given by IM injection into the deltoid by trained research nurses/doctors within the school setting. Oropharyngeal samples are collected from teenager's throats to compare rates of MenB 'carriage' in teenagers before and after getting a MenB vaccine. Teenagers have three study visits, over 12 to 18 months and all visits would be held within schools. The follow up is 13 months for group 1 + 2 and up to 18 months for group 3.

#### Intervention Type

Biological/Vaccine

#### Phase

Phase IV

## Drug/device/biological/vaccine name(s)

Bexsero, Trumenba

#### Primary outcome measure

Rates of carriage prevalence of any of meningococci genogroup B, C, W, X and Y before and after immunisation in both immunisation cohorts, compared with unimmunised controls; Timepoint(s): End of the study

#### Secondary outcome measures

Rates of carriage prevalence of particular Neisseria before and after immunisation in both immunisation cohorts, compared with controls, specifically:

- 1. Serogroup B meningococci
- 2. Hyper-invasive meningococcal strains
- 3. All meningococcal strains
- 4. Other Neisseria species
- 5. Meningococci of other non B serogroups and capsule null meningococci
- 6. Meningococci expressing antigens contained in 4CMenB and MenB-fHBP

The difference in acquisition of carriage of all N. meningitidis over a 12-month period in both immunised cohorts compared to unvaccinated participants

## Overall study start date

01/10/2017

### Completion date

31/03/2024

## **Eligibility**

#### Key inclusion criteria

- 1. Male or female, aged 16-18 years attending year 12 (or equivalent) at one of the participating 6th form colleges in England, Scotland and Wales
- 2. Participant is willing and able to give informed consent for participation
- 3. In the Investigator's opinion, is able and willing to comply with all trial requirements.
- 4. Willing to have bacterial isolates from throat swabs stored for future research in ethically approved studies
- 5. Willing to allow his or her General Practitioner to be contacted to confirm vaccination status if necessary

## Participant type(s)

All

## Age group

Child

## Lower age limit

16 Years

#### Upper age limit

18 Years

#### Sex

Both

## Target number of participants

Planned Sample Size: 24000; UK Sample Size: 24000

#### Total final enrolment

24047

## Key exclusion criteria

- 1. Evidence of a course of either 4CMenB or MenB-fHBP in the past (documentation or self-report)
- 2. History of anaphylaxis to any component of 4CMenB or MenB-fHBP
- 3. Any other significant disease or disorder which, in the opinion of the investigator, may either put the participants at risk because of participation in the trial, or may influence the result of the trial, or the participants ability to participate
- 4. Participant is known to be pregnant

#### Date of first enrolment

19/03/2018

#### Date of final enrolment

22/12/2019

## Locations

#### Countries of recruitment

England

Scotland

United Kingdom

Wales

## Study participating centre Royal Alexandra Children's Hospital

BSUHT Eastern Road East Sussex Brighton United Kingdom BN2 5BE

Study participating centre Bristol Children's Vaccine Centre Level 6 Education and Research Centre Upper Maudlin Street Bristol United Kingdom BS2 8AE

# Study participating centre Public Health Wales

4th Floor, Number 2 Capital Quarter Tyndall Street Cardiff United Kingdom CF10 4BZ

## Study participating centre Health Protection Scotland

4th Floor, Meridian Court 5 Cadogan Street Glasgow United Kingdom G2 6QE

# Study participating centre St Mary's Hospital

Praed St London United Kingdom W2 1NY

## Study participating centre Research and Development Department

Above Breast Care Centre – First floor Maidstone Hospital Hermitage Lane Maidstone United Kingdom ME16 9QQ

## Study participating centre Paediatric Research Team 5th Floor

Royal Manchester Children's Hospital Oxford Road Manchester United Kingdom M13 9WL

## Study participating centre University of Nottingham Health Service

University Park Derby Rd Nottingham United Kingdom NG7 2QW

# Study participating centre Oxford Vaccine Group

CCVTM Churchill Hospital Oxford United Kingdom OX3 7LE

# Study participating centre Research & Development

The Lantern centre Vicarage Lane Fulwood Preston United Kingdom PR2 8DW

## Study participating centre

University Hospital Southampton NHS Foundation Trust Southampton General Hospital Tremona Road Southampton

SO16 6YD

United Kingdom

## Study participating centre

## St George's, University of London

Cranmer Terrace London United Kingdom SW17 0RE

# Study participating centre Research and Innovation

Room F08, Pinewood House Stockport NHS Foundation Trust Stepping Hill Hospital Stockport United Kingdom SK2 7JE

## Study participating centre

Clinical Trials Unit Wrightington Hosp

Wrightington Hospital Hall Lane Appley Bridge United Kingdom WN6 9EP

## Sponsor information

## Organisation

University of Oxford

## Sponsor details

Clinical Trials and Research Governance (CTRG) Joint Research Office, Block 60 Churchill Hospital Oxford England United Kingdom OX3 7LJ

### Sponsor type

Hospital/treatment centre

#### **ROR**

https://ror.org/052gg0110

# Funder(s)

## Funder type

Government

#### **Funder Name**

Department of Health; Grant Codes: PR-R18-0117-21001

#### **Funder Name**

Pfizer UK

#### Alternative Name(s)

Pfizer Ltd, Pfizer Limited

#### **Funding Body Type**

Private sector organisation

## **Funding Body Subtype**

For-profit companies (industry)

#### Location

United Kingdom

## **Results and Publications**

## Publication and dissemination plan

Planned publication of the results in a high impact peer reviewed journal as soon after the completion of the project as possible.

## Intention to publish date

31/12/2025

## Individual participant data (IPD) sharing plan

The data sharing plans for the current study are unknown and will be made available at a later date.

## IPD sharing plan summary

Data sharing statement to be made available at a later date

## **Study outputs**

Output type	Details	Date created	Date added	Peer reviewed?	Patient- facing?
<u>Protocol article</u>	protocol	22/10/2020	26/10 /2020	Yes	No

<u>Protocol file</u>	version 7.0	28/02/2022 09/05 /2022	No	No
HRA research summary		28/06 /2023	No	No
Protocol file	version 8.1	15/12/2023 <sup>08/01</sup> /2024	No	No
Other publications	Observational study of the vacccination programme	13/07/2022 18/06 /2025	Yes	No