National Center for Immunization & Respiratory Diseases



# Meningococcal Vaccines Work Group Plan for Assessing the MenABCWY Vaccines

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# **Project Timeline**

	Task		2022						2023											2024						
			7	8	9	10	11	12	1	2	3	4	5	6	7	8	9	10	11	12	1	2	3	4	5	6
	Menveo One-Vial																									
	GSK Pentavalent Vaccine																									
	Pfizer Pentavalent Vaccine																									
	People Experiencing Homelessness																									

# Background

- Two new MenABCWY vaccines currently in clinical trials
  - GSK
  - Pfizer
- Each vaccine is a combination of an existing MenACWY vaccine and an existing MenB vaccine
- Work group will assess each pentavalent vaccine separately
- Tentative goal to have votes on use of these vaccines at the October 2023 ACIP meeting

#### **GSK MenABCWY Vaccine**

- Comprised of Menveo 1 Vial (serogroups ACWY) and Bexsero (serogroup B)
  - Both currently licensed in US
- Anticipated clinical trial data
  - Assessing a two-dose schedule (0,6 months)
  - Studying 10 through 25 years of age
  - Both MenACWY primed and naive subjects
  - Longer interval studies underway (not available in time for initial product licensure)

# **Pfizer MenABCWY Vaccine**

- Comprised of Nimenrix (serogroups ACWY) and Trumenba (serogroup B)
  - Trumenba currently licensed and available in US
  - Nimenrix not licensed in US but used extensively in Europe and elsewhere
- Anticipated clinical trial data
  - Assessing
    - Two doses (0,6 m and 0,12 m apart)
    - Two doses at 11–12 years and a booster at 16 years
    - A single dose of pentavalent as an alternative to MenACWY vaccine
  - Studying 10 through 25 years of age
  - Both MenACWY primed and naive subjects
  - Longer interval studies underway (not available in time for initial product licensure)

# **Evidence to be Reviewed by the Work Group**

- Epidemiology of meningococcal disease
- Immunogenicity and safety for each vaccine
- Expected public health impact of each vaccine
- GRADE and EtR

# **Policy Questions for Each Pentavalent Vaccine**

- Should the pentavalent vaccine be included as an option for MenACWY/MenB vaccination in people currently recommended to receive both vaccines?
  - For example, 16 year olds<sup>1</sup>
- Should the pentavalent vaccine be included as an option for people currently recommended to receive MenACWY only?
  - For example, 11–12 year olds
- Should the pentavalent vaccine be included as an option for people currently recommended to receive MenB only?
  - For example, during a serogroup B outbreak

<sup>1</sup>16 year olds who decide to receive the MenB vaccine based on shared clinical decision making

**PICO policy question — Should the pentavalent vaccine be included as an option for** 

MenACWY/MenB vaccination in people currently recommended to receive both vaccines?

Population	All individuals aged 10 years or older currently recommended to receive							
	MenACWY and MenB vaccines							
Intervention	Vaccination with the pentavalent vaccine							
Comparison	Vaccination with a currently licensed MenACWY vaccine and a MenB vaccine							
Outcomes	<ul> <li>Meningococcal disease caused by <u>serogroups A, B, C, W, and Y</u></li> <li>Short-term immunity</li> <li>Persistent immunity</li> <li>Interference with other recommended vaccines administered concurrently</li> <li>Serious adverse events</li> <li>Non-serious adverse events</li> </ul>							

**PICO policy question** — Should the pentavalent vaccine be included as an option

for people currently recommended to receive MenACWY only?

Population	All individuals aged 10 years or older currently recommended to receive MenACWY vaccine only				
Intervention	Vaccination with the pentavalent vaccine				
Comparison	Vaccination with a currently licensed MenACWY vaccine				
Outcomes	<ul> <li>Meningococcal disease caused by <u>serogroups A, C, W, and Y</u></li> <li>Short-term immunity</li> <li>Persistent immunity</li> <li>Interference with other recommended vaccines administered concurrently</li> <li>Serious adverse events</li> <li>Non-serious adverse events</li> </ul>				

**PICO policy question** — Should the pentavalent vaccine be included as an option

for people currently recommended to receive MenB only?

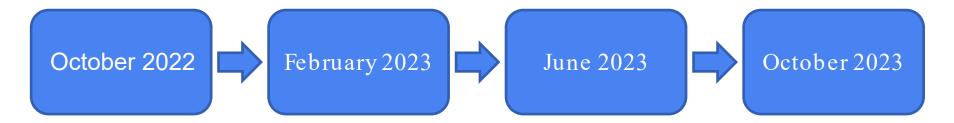
Population	All individuals aged 10 years or older currently recommended to receive <u>MenB</u> vaccine only
Intervention	Vaccination with the pentavalent vaccine
Comparison	Vaccination with a currently licensed MenB vaccine
Outcomes	<ul> <li>Meningococcal disease caused by <u>serogroup B</u></li> <li>Short-term immunity</li> <li>Persistent immunity</li> <li>Interference with other recommended vaccines administered concurrently</li> <li>Serious adverse events</li> <li>Non-serious adverse events</li> </ul>

## **Outcomes Table**

Outcome	Importance <sup>1</sup>	Included in Evidence Profile
Meningococcal disease caused by serogroups A, B, C, W, and Y	Critical	Yes
Persistent immunity	Important	Yes
Short-term immunity	Critical	Yes
Interference with other recommended vaccines administered concurrently	Important	Yes
Serious adverse events	Critical	Yes
Non-serious adverse events	Important	Yes

<sup>1.</sup> Three options: critical, important but not critical, of limited importance for decision making.

### **Proposed Timeline of ACIP Presentations**



- Introduction to topic
- Policy questions and PICOs

- Epidemiology of meningococcal disease
- Manufacturers' presentations

- GRADE/EtR Vote
- Public health impact

For more information, contact CDC 1-800-CDC-INFO (232-4636) TTY: 1-888-232-6348 www.cdc.gov

The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention.

