



Типы вопросов и стратегии для поиска систематических обзоров

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План

1. Типы общих вопросов и соответствующий им дизайн систематического обзора и метаанализа
2. Формула PICO (ПВСИ)
3. Стратегии для поиска систематических обзоров

Типы вопросов и соответствующий им дизайн эпидемиологических исследований

1. Лечение

- систематические обзоры и метаанализы, рандомизированные контролируемые испытания

2. Диагностика

- перекрестные экспериментальные исследования (сравнение с золотым стандартом)

3. Прогноз

- когортные исследования

4. Этиология/побочные эффекты

- когортные исследования, исследования типа случай-контроль

5. Экономическая эффективность

- рандомизированные контролируемые испытания, систематические обзоры, модели анализа принятия решений



Уровни достоверности источников



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Формула PICO или PESCO



1. Population (или Patient)
2. Intervention (иногда Exposure) -
вмешательство (воздействие)
3. Comparison - сопоставление (сравнение)
4. Outcomes - результаты (исходы)
5. Time – время
6. Study design – дизайн исследования



Пример формулировки вопроса по формуле PICO

Эффективна ли вакцинация против малярии у детей в сравнении с плацебо в профилактике заражения тропической малярии?

Пример формулировки вопроса по формуле PICO

Эффективна ли вакцинация против малярии у детей в сравнении с плацебо в профилактике заражения тропической малярии?

P – children (**дети**)

I – malaria vaccine (**вакцинация против малярии**)

C – placebo (**плацебо**)

O – prevention of malaria falciparum (**профилактика заражения тропической малярии**)



Определение MESH терминов

MeSH [Limits](#) [Advanced](#)

Full ▾

Child

A person 6 to 12 years of age. An individual 2 to 5 years old is CHILD, PRESCHOOL.

PubMed search builder options

[Subheadings:](#)

See Also:

- [Only Child](#)
- [Minors](#)

[All MeSH Categories](#)

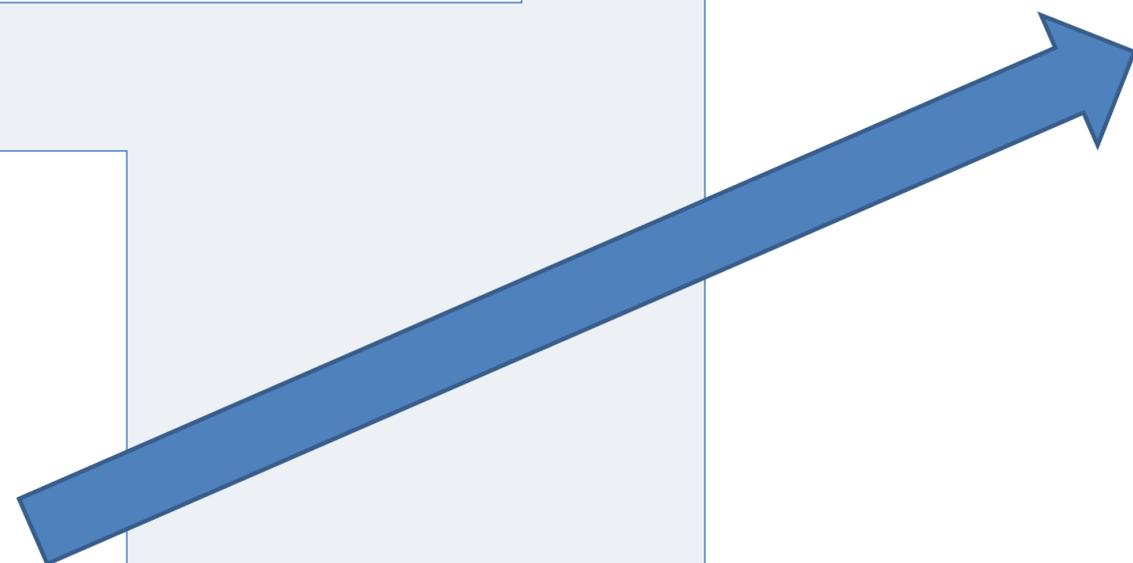
[Persons Category](#)

[Persons](#)

[Age Groups](#)

Child

[Child, Preschool](#)



[All MeSH Categories](#)

[Persons Category](#)

[Persons](#)

Age Groups

[Adolescent](#)

[Adult](#)

[Aged +](#)

[Middle Aged](#)

[Young Adult](#)

[Birth Cohort](#)

Child

[Child, Preschool](#)

[Infant](#)

[Infant, Newborn +](#)

Определение MESH терминов



MeSH MeSH Limits Advanced

Full Send to:

Malaria Vaccines

Vaccines made from antigens arising from any of the four strains of Plasmodium which cause malaria in humans, or from P. berghei which causes malaria in rodents.

Year introduced: 1994

PubMed search builder options

[Subheadings:](#)

MeSH MeSH Limits Advanced

Full Send to:

Placebos

Any dummy medication or treatment. Although placebos originally were medicinal preparations having no specific pharmacological activity against a targeted condition, the concept has been extended to include treatments or procedures, especially those administered to control groups in clinical trials in order to provide baseline measurements for the experimental protocol.

builder options

MeSH MeSH Limits Advanced

Full Send to:

prevention and control [Subheading]

Used with disease headings for increasing human or animal resistance against disease (e.g., immunization), for prevention and control of environmental hazards, or for prevention and control of social factors leading to individual cases.

Year introduced: 1966

PubMed search builder options

Do not include MeSH terms found below this term in the MeSH hierarchy.

Tree Number(s): Y11.040
MeSH Unique ID: Q000517
Entry Terms:

- prophylaxis
- preventive therapy
- prevention and control
- preventive measures
- prevention
- control

MeSH MeSH Limits Advanced

Full Send to:

Vaccine Efficacy

A measurement of disease risk reduction among vaccinated compared to unvaccinated persons under ideal conditions such as in a clinical trial. Such disease reduction measured under typical field conditions is vaccine effectiveness. In contrast vaccine potency is measured in an assay to ensure proper dosing and storage of vaccines whereas vaccine immunogenicity measures its ability to induce an immune response in a vaccinated individual in observational studies.

Year introduced: 2022

PubMed search builder options

[Subheadings:](#)



Определение условий поиска

P

children[tiab] OR newborns[tiab] OR "Child"[Mesh] OR "Infant"[Mesh]

I

"malaria vaccine" [tiab] OR "Malaria Vaccines"[Mesh]

C

"placebo" [tiab] OR "Placebos"[Mesh]

O

"prevention of malaria falciparum "[tiab] OR "Vaccine Efficacy"[Mesh]



Ввод условий поиска

Add terms to the query box

All Fields

ADD

Show Index

Query box

Search

- ✓ Text Word[tw]
- ✓ Title[ti]
- ✓ Title/Abstract [tiab]



Ввод условий поиска

History and Search Details Download Delete

Search	Actions	Details	Query	Results	Time
#4	...	! v	Search: "prevention of malaria falciparum "[tiab] OR "Vaccine Efficacy"[Mesh] "Vaccine Efficacy"[MeSH Terms] ! Warnings "prevention of malaria falciparum "[tiab] OR "Vaccine Efficacy"[Mesh] Quoted phrase not found: prevention of malaria falciparum	405	06:22:55
#3	...	>	Search: "placebo" [tiab] OR "Placebos"[Mesh]	251,393	06:20:32
#2	...	>	Search: "malaria vaccine" [tiab] OR "Malaria Vaccines"[Mesh]	4,807	06:20:14
#1	...	>	Search: children[tiab] OR newborns[tiab] OR "Child"[Mesh] OR "Infant"[Mesh]	2,951,370	06:19:48

Showing 1 to 4 of 4 entries



Ввод условий поиска

Add terms to the query box

Title/Abstract  Enter a search term

OR 

Show Index

Query box

(prevention malaria falciparum[Title/Abstract]) OR ("Vaccine Efficacy"[Mesh]) 

Search 



Ввод условий поиска

Query box

#1 AND #2 AND #3 AND #5

Search

History and Search Details

Download Delete

Search	Actions	Details	Query	Results	Time
#5	...	>	Search: (prevention malaria falciparum[Title/Abstract]) OR ("Vaccine Efficacy" [Mesh])	418	06:37:51
#4	...	! >	Search: "prevention of malaria falciparum "[tiab] OR "Vaccine Efficacy" [M	405	06:22:55
#3	...	>	Search: placebo" [tiab] OR "Placebos"[Mesh]	251,393	06:20:32
#2	...	>	Search: "malaria vaccine" [tiab] OR "Malaria Vaccines"[Mesh]	4,807	06:20:14
#1	...	>	Search: children[tiab] OR newborns[tiab] OR "Child"[Mesh] OR "Infant" [Mesh]	2,951,370	06:19:48

Showing 1 to 5 of 5 entries



Ввод условий поиска

Sorted by: Best match Display options

MY NCBI FILTERS

TEXT AVAILABILITY

- Abstract
- Free full text
- Full text

ARTICLE ATTRIBUTE

- Associated data

ARTICLE TYPE

No results were found.

Your search was processed without automatic term mapping because it retrieved zero results.

The following terms were ignored: prevention, malaria, falciparum



Ввод условий и ограничений поиска

TEXT AVAILABILITY

- Abstract
- Free full text
- Full text

ARTICLE ATTRIBUTE

- Associated data

ARTICLE TYPE

- Books and Documents
- Clinical Trial
- Meta-Analysis
- Randomized Controlled Trial
- Review
- Systematic Review

#1 AND #2 AND #5 [Advanced](#) [Create alert](#) [Create RSS](#) [User Guide](#)

Sorted by: Best match

2 results Page 1 of 1

- 1 **Multifunctional Antibodies Are Induced by the RTS,S Malaria Vaccine and Associated With Protection in a Phase 1/2a Trial.**
Cite Kurtovic L, Atre T, Feng G, Wines BD, Chan JA, Boyle MJ, Drew DR, Hogarth PM, Fowkes FJI, Bergmann-Leitner ES, Beeson JG.
Share J Infect Dis. 2021 Oct 13;224(7):1128-1138. doi: 10.1093/infdis/jiaa144.
PMID: 32236404 **Free PMC article.** Clinical Trial.
BACKGROUND: RTS,S is the leading **malaria vaccine** candidate but only confers partial efficacy against **malaria** in **children**. RTS,S is based on the major Plasmodium **falciparum** sporozoite surface antigen, circumsporozoite protein (CSP). ...
- 2 **Seven-year kinetics of RTS, S/AS01-induced anti-CSP antibodies in young Kenyan children.**
Cite Mugo RM, Mwai K, Mwacharo J, Shee FM, Musyoki JN, Wambua J, Otieno E, Bejon P, Ndungu FM.
Share Malar J. 2021 Dec 2;20(1):452. doi: 10.1186/s12936-021-03961-2.
PMID: 34856981 **Free PMC article.**
BACKGROUND: RTS,S/AS01, the leading **malaria vaccine** has been recommended by the WHO for widespread immunization of **children** at risk. RTS,S/AS01-induced anti-CSP IgG antibodies are associated with the **vaccine** efficacy. ...



Ввод условий поиска

History and Search Details Download Delete

Search	Actions	Details	Query	Results	Time
#9	...	>	Search: #1 AND #2 AND #3	40	06:42:00
#8	...	>	Search: (((children[tiab] OR newborn[tiab] OR "Child"[Mesh] OR "Infant"[Mesh]) AND ("malaria vaccines"[tiab] OR "Malaria Vaccines"[Mesh])) AND ("placebo" [tiab] OR "Placebo"[Mesh])) AND ((prevention malaria falciparum[Title/Abstract] OR "Vaccine Efficacy"[Mesh]))	0	06:40:45
#7	...	!	Search: (((children[tiab] OR newborn[tiab] OR "Child"[Mesh] OR "Infant"[Mesh]) AND ("malaria vaccines"[tiab] OR "Malaria Vaccines"[Mesh])) AND ("placebo" [tiab] OR "Placebo"[Mesh])) AND ((prevention malaria falciparum[Title/Abstract] OR "Vaccine Efficacy"[Mesh])) - Schema: all		
#6	...	>	Search: #1 AND #2 AND #3 AND		
#5	...	>	Search: (prevention malaria falciparum[Title/Abstract] OR "Vaccine Efficacy"[Mesh])		

Save Email Send to Sorted by: Best match Display options

MY NCBI FILTERS 40 results

RESULTS BY YEAR

TEXT AVAILABILITY

Abstract

Free full text

Immunogenicity and Protective Efficacy of Radiation-Attenuated and Chemo-Attenuated PfSPZ Vaccines in Equatoguinean Adults.

1
Cite
Share

Jongo SA, Urbano V, Church LWP, Olotu A, Manock SR, Schindler T, Mtoro A, Kc N, Hamad A, Nyakarungu E, Mpina M, Deal A, Bijeri JR, Ondo Mangué ME, Ntutumumu Pasialo BE, Nguema GN, Owono SN, Rivas MR, Chemba M, Kassim KR, James ER, Stabler TC, Abebe Y, Saverino E, Sax J, Hosch S, Tumbo AM, Gondwe L, Segura JL, Falla CC, Phiri WP, Hergott DEB, García GA, Schwabe C, Maas CD, Murshedkar T, Billingsley PF, Tanner M, Ayekaba MO, Sim BKL, Daubenberger C, Richie TL, Abdulla S, Hoffman SL. Am J Trop Med Hyg. 2021 Jan;104(1):283-293. doi: 10.4269/ajtmh.20-0435. PMID: 33205741 **Free PMC article.** Clinical Trial.

Plasmodium falciparum sporozoite (PfSPZ) **Vaccine** (radiation-attenuated, aseptic, purified, cryopreserved PfSPZ) and PfSPZ-CVac (infectious, aseptic, purified, cryopreserved PfSPZ administered to subjects taking weekly chloroquine chemoprophylaxis) have shown **vaccine**

Ограничить поиск по типу публикации



MY NCBI FILTERS

3 results Page 1 of 1

RESULTS BY YEAR

TEXT AVAILABILITY

- Abstract
- Free full text
- Full text

ARTICLE ATTRIBUTE

- Associated data

ARTICLE TYPE

- Books and Documents
- Clinical Trial
- Meta-Analysis
- Randomized Controlled Trial
- Review
- Systematic Review

PUBLICATION DATE

Filters applied: Systematic Review. [Clear all](#)

- Vaccines for preventing **malaria**.
1 Graves P, Gelband H.
Cite Cochrane Database Syst Rev. 2000;(2):CD000129. doi: 10.1002/14651858.CD000129.
PMID: 10796492 **Updated.** Review.
Share In five trials, there was no evidence for effect of the SPf66 **vaccine** on the incidence of the first attack of *P. vivax* **malaria** (OR 1.01, 95% CI 0.87 to 1.17). Trials to date have not indicated any severe adverse effects of SPf66 **vaccine**. In three trials of NA ...
- Vaccines for preventing **malaria** (pre-erythrocytic).
2 Graves P, Gelband H.
Cite Cochrane Database Syst Rev. 2006 Oct 18;2006(4):CD006198. doi: 10.1002/14651858.CD006198.
PMID: 17054280 **Free PMC article.** Review.
Share MAIN RESULTS: Nine safety and efficacy trials, and two safety trials, with over 3000 participants were included. In semi-immune **children**, RTS,S **vaccine** reduced clinical episodes of **malaria** by 26% (95% CI 13% to 37%) and severe **malaria** by 58% (95% CI 15 ...
- Vaccines for preventing **malaria** (blood-stage).
3 Graves P, Gelband H.
Cite Cochrane Database Syst Rev. 2006 Oct 18;2006(4):CD006199. doi: 10.1002/14651858.CD006199.
PMID: 17054281 **Free PMC article.** Review.
Share BACKGROUND: A **malaria vaccine** is needed because of the heavy burden of mortality and morbidity due to this disease. ...AUTHORS' CONCLUSIONS: The MSP/RESA (Combination B) **vaccine** shows promise as a way to reduce the severity of **malaria** episodes, but the ...

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Список литературы

1. Richardson WS, Wilson MC, Nishikawa J, Hayward RS. The well-built clinical question: a key to evidence-based decisions. ACP J Club. 1995 Nov-Dec;123(3):A12-3.
2. Основы доказательной медицины/ Т. Гринхальх; пер.с англ. под ред. И.Н.Денисова, К.И. Сайткулова, В.П. Леонова. – 4-е изд., перераб. и доп. – М.: ГЭОТАР-Медиа, 2015. – 336 с.
3. Бражников, А. Ю. Общая эпидемиология с основами доказательной медицины : руководство к практическим занятиям : учебное пособие / под ред. В. И. Покровского, Н. И. Брико. - 2-е изд. , испр. и доп. - Москва : ГЭОТАР-Медиа, 2018. - 496 с. : ил. - 496 с. - ISBN 978-5-9704-4256-2. - Текст : электронный // ЭБС "Консультант студента" : [сайт]. - URL : <https://www.studentlibrary.ru/book/ISBN9785970442562.html>
4. Clinical epidemiology : the essentials / Robert H. Fletcher, Suzanne W. Fletcher, Grant S. Fletcher. – 5th ed. 2014
5. Oxford Centre for Evidence-based Medicine – Levels of Evidence (Produced by Bob Phillips, Chris Ball, Dave Sackett, Doug Badenoch, Sharon Straus, Brian Haynes, Martin Dawes since November 1998. Updated by Jeremy Howick March 2009.)