



EN ESTE NÚMERO

VacCiencia es una publicación dirigida a investigadores y especialistas dedicados a la vacunología y temas afines, con el objetivo de serle útil. Usted puede realizar sugerencias sobre los contenidos y de esta forma crear una retroalimentación que nos permita acercarnos más a sus necesidades de información.

- Resumen de la información publicada por la OMS sobre vacunas en desarrollo contra la COVID-19, a nivel mundial.
- Noticias más recientes en la Web sobre vacunas.
- Artículos científicos más recientes de Medline sobre vacunas.
- Patentes más recientes en Patentscope sobre vacunas.



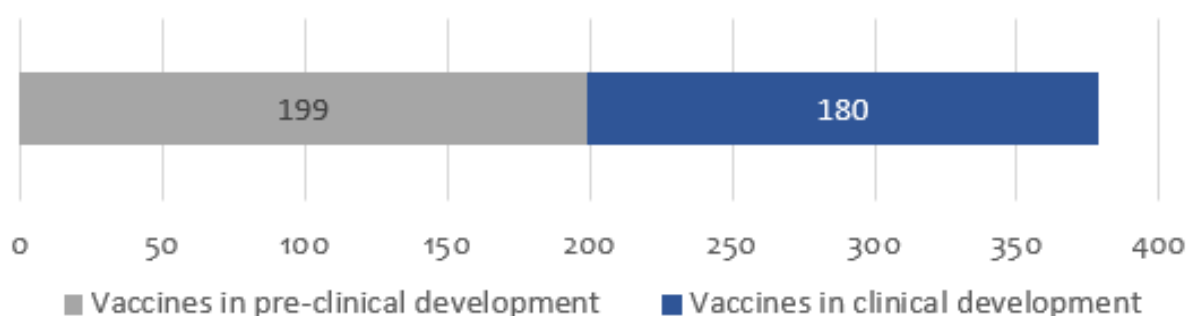
Resumen de la información publicada por la OMS sobre vacunas en desarrollo contra la COVID-19, a nivel mundial

Última actualización por la OMS: 21 de febrero de 2023.

Fuente de información utilizada:



180 Vacunas en evaluación clínica y 199 en evaluación preclínica



Vacunas en evaluación clínica por plataforma

Platform		Candidate vaccines (no. and %)	
PS	Protein subunit	57	32%
VVnr	Viral Vector (non-replicating)	25	14%
DNA	DNA	17	9%
IV	Inactivated Virus	22	12%
RNA	RNA	42	23%
VVr	Viral Vector (replicating)	4	2%
VLP	Virus Like Particle	7	4%
VVr + APC	VVr + Antigen Presenting Cell	2	1%
LAV	Live Attenuated Virus	2	1%
VVnr + APC	VVnr + Antigen Presenting Cell	1	1%
BacAg-SpV	Bacterial antigen-spore expression vector	1	1%
		180	

Vacunas en evaluación clínica por vía de administración

Oral		5	3%
Injectable		161	89%
SC	Sub cutaneous	5	3%
ID	Intra dermal	9	5%
IM	Intra muscular	147	82%
IN	Intra nasal	16	9%
AE	Aerosol	1	1%
IH	Inhaled	2	1%
TBD / No Data (ND)		14	8%

Número de dosis de las vacunas en evaluación clínica

Number of doses & schedule	Candidate vaccines (no. and %)	
1 dose	45	25%
Day 0	45	
2 doses	100	56%
Day 0 + 14	8	
Day 0 + 21	36	
Day 0 + 28	56	
3 doses	2	1%
Day 0 + 28 + 56	2	
TBD / No Data (ND)	33	18%

Vacunas mucosales en evaluación clínica

Desarrollador de la vacuna/fabricante/país	Plataforma de la vacuna	Vía de administración	Fase
University of Oxford/Reino Unido	Vector viral no replicativo	Intranasal	1
CanSino Biological Inc./Beijing Institute of Biotechnology/China	Vector viral no replicativo	Inhalación	4
CanSino Biological Inc./China	Vector viral no replicativo	Intranasal	3
Vaxart/Estados Unidos	Vector viral no replicativo	Oral	2
Univ. Hong Kong, Xiamen Univ./Beiging Wantai Biol. Pharm./China	Vector viral replicativo	Intranasal	3
Symvivo/Canadá	ADN	Oral	1
ImmunityBio, Inc./Estados Unidos	Vector viral no replicativo	Oral y Sublingual	1/2
Codagenix/Serum Institute of India	Virus vivo atenuado	Intranasal	3
Center for Genetic Engineering and Biotechnology (CIGB)/Cuba	Subunidad proteica	Intranasal	1/2
Razi Vaccine and Serum Research Institute/India	Subunidad proteica	Intranasal	3
Bharat Biotech International Limited/India	Vector viral no replicativo	Intranasal	3
Meissa Vaccines, Inc./Estados Unidos	Virus vivo atenuado	Intranasal	1
Laboratorio Avi-Mex/México	Virus inactivado	Intranasal	2/3
USSF + VaxForm/Estados Unidos	Subunidad proteica	Oral	1
CyanVac LLC/Estados Unidos	Vector viral no replicativo	Intranasal	1
DreamTec Research Limited/Hong Kong	BacAg-SpV	Oral	NA
Sean Liu, Icahn School of Medicine at Mount Sinai	Vector viral replicativo	Intranasal	2/3
Hannover Medical School/Alemania	Vector viral no replicativo	Inhalación	1
ACM Biolabs/Singapur	Subunidad proteica	Intranasal	1
Intravacc B.V./Holanda	Vector viral no replicativo	Intranasal	1
McMaster University/Canadá	Vector viral no replicativo	Aerosol	1

Vacunas en fase 4 de evaluación clínica

Candidatos vacunales más avanzados/fabricante/país	Plataforma de la vacuna
Sinovac/China	Virus Inactivado
Sinopharm/Beijing Institute of Biological Products/China (2)	Virus Inactivado
University of Oxford/AstraZeneca/Reino Unido	Vector viral no replicativo
CanSino Biological Inc./Beijing Institute Biotechnology/China (IM e IH)	Vector viral no replicativo
Janssen Pharmaceutical Companies/Estados Unidos	Vector viral no replicativo
Moderna/NIAID/Estados Unidos	ARN
Pfizer/BioNTech Fosun Pharma/Estados Unidos	ARN
Medigen Vaccine Biol./Dynavax/NIAID/Taiwán/EE.UU	Subunidad proteica

Vacunas en fase 3 de evaluación clínica

Candidatos vacunales más avanzados/fabricante/país	Plataforma de la vacuna
Gamaleya Research Institute/Rusia	Vector viral no replicativo
Novavax/Estados Unidos	Subunidad proteica
Anhui Zhifei Longcom Biopharmac./Inst. Microbiol, Chin Acad Sci/China	Subunidad proteica
CureVac AG/Alemania	ARN
Institute of Medical Biology/Chinese Academy of Medical Sciences	Virus inactivado
Research Institute for Biological Safety Problems, Kazakhstan	Virus inactivado
Inovio Pharmac. + Intern. Vacc Inst. + Advaccine Biopharm Co., Ltd	ADN
Zydus Cadila Healthcare Ltd./India	ADN
Bharat Biotech International Limited/India	Virus Inactivado
Sanofi Pasteur + GSK/Francia/Gran Bretaña	Subunidad proteica
Shenzhen Kangtai Biological Products Co., Ltd./China	Virus Inactivado
Clover Biopharmaceuticals Inc./GSK/Dynavax/China/Reino Unido/EE.UU	Subunidad proteica
Vaxine Pty Ltd. + CinnaGen Co./Australia, Irán	Subunidad proteica
Instituto Finlay de Vacunas/Cuba	Subunidad proteica
Federal Budget Res Inst State Res Cent Virol Biotechnol "Vector"/Rusia	Subunidad proteica
West China Hospital + Sichuan University/China	Subunidad proteica
Vaxxinity/EE.UU	Subunidad proteica
Univ. Hong Kong, Xiamen Univ. & Beijing Wantai Biological Pharm./China	Vector viral replicativo
Acad Milit Sci (AMS) Walvax Biotechnol, Suzhou Abogen Biosci/China	ARN
Medicago Inc./Canadá	Partícula similar a virus
Codagenix/Serum Institute of India	Virus vivo atenuado
Center for Genetic Engineering and Biotechnology (CIGB)/Cuba	Subunidad proteica
Valneva, National Institute for Health Research, Reino Unido	Virus inactivado
Biological E. Limited/India	Subunidad proteica
Nanogen Pharmaceutical Biotechnology/Vietnam	Subunidad proteica
Shionogi/Japón	Subunidad proteica
Erciyas University/Turquía	Virus inactivado
SK Bioscience Co., Ltd./CEPI/Corea del Sur/Noruega	Subunidad proteica
Razi Vaccine and Serum Research Institute/Irán, India	Subunidad proteica
Bharat Biotech International Limited/India	Vector viral no replicativo (IN)
Providence Therapeutics/Canadá	ARN
POP Biotechnologies and EuBiologics Co.,Ltd/EEUU, Corea del Sur	Subunidad proteica
Jiangsu Rec-Biotechnology/China	Subunidad proteica
Radboud University/Holanda	Partícula similar a virus
Arcturus Therapeutics, Inc./Estados Unidos	ARN
Livzon Pharmaceutical/China	Subunidad proteica
National Vaccine and Serum Institute, China; Beijing Zhong Sheng Heng Yi	Subunidad proteica
KM Biologics Co., Ltd./Japón	Virus inactivado
Shanghai East Hospital and Stemirna Therapeutics/China	ARN
Bagheiat-allah University of Medical Sciences/AmitisGen/Irán	Subunidad proteica
Laboratorios Hipra, S.A./España	Subunidad proteica
Sinocelltech Ltd./China	Subunidad proteica
Chumakov Federal Scientific Center for Research/Rusia	Virus Inactivado
Yantai Patronus Biotech Co., Ltd.	Partícula similar a virus
Airlangga University/Indonesia	Virus Inactivado
PT Bio Farma/Indonesia	Subunidad proteica
AIM Vaccine and Liverna Therapeutics/China	ARN
China National Biotec Group Company Limited	Virus inactivado

Noticias en la Web

La primera vacuna contra el virus sincitial abre una era en la lucha contra nuevos patógenos

15 feb. La investigación de años contra esta infección hizo posible desarrollar las inyecciones contra la COVID-19 para salvar millones de vidas.

Una vacuna experimental contra el virus respiratorio sincitial ha conseguido una alta eficacia en la última fase de pruebas en humanos por primera vez en 60 años, cuando se empezó a buscar una inmunización.

Este virus mata cada año a unos 100.000 recién nacidos y a decenas de miles de personas mayores en todo el mundo. Es un patógeno estacional que causa neumonía



Enfermeras en una UCI neonatal en Nueva Delhi. PRAKASH SINGH (AFP)

en adultos y bronquiolitis en bebés.

Este invierno, regresó tan fuerte tras la pandemia que colapsó las UCI pediátricas de grandes hospitales en España.

Esta vacuna esconde una gran historia de descubrimiento científico. Si no se hubiesen empleado años en investigar este virus a nivel molecular no hubiera sido posible crear en apenas meses las inyecciones contra la COVID-19 que han salvado millones de vidas.

La nueva inmunización lleva el nombre científico de RSVPreF3 OA, ha sido desarrollada por la farmacéutica GSK, y se ha probado en 25.000 pacientes de más de 60 años. Los resultados, publicados en la prestigiosa revista médica *The New England Journal of Medicine*, muestran una eficacia del 82,6 % contra la enfermedad respiratoria y del 94,1 % contra los casos más graves. El fármaco también muestra alta eficacia en los pacientes que más lo necesitan: aquellos con otras enfermedades que debilitan su inmunidad. Además, la vacuna neutraliza igual de bien a las dos principales variantes del patógeno, que pueden circular simultáneamente.

A esta vacuna diseñada para las personas mayores se sumará otra similar destinada a embarazadas. Las madres que reciben la inmunización generan anticuerpos que atraviesan la placenta y protegen al bebé de sufrir una infección grave. Su eficacia es de un 81 % en los tres primeros meses de vida, y un 67 % en los tres siguientes, según los datos preliminares publicados por Pfizer. A estas dos vacunas, las más avanzadas, se suman otras inmunizaciones, y también un anticuerpo monoclonal recientemente aprobado en Europa que protege durante los primeros cinco meses de vida.

El virus respiratorio sincitial fue descubierto en 1956 y actualmente es la principal causa de muerte en niños de menos de un año, después de la malaria. Los más vulnerables son los pequeños de cero a seis meses, pues su sistema inmune aún no sabe luchar contra el patógeno. Cumplidos los dos años, prácticamente

todos los pequeños se han infectado al menos una vez, y los contagios sucesivos les van protegiendo hasta no revestir gravedad en la mayoría de los casos.

En 1965 se comenzó a probar una primera vacuna basada en un virus desactivado. Todo parecía funcionar hasta que llegó el invierno de 1966. Los bebés comenzaron a infectarse y la vacuna les provocó una reacción exacerbada que aumentó sus probabilidades de hospitalización. Dos de ellos murieron. La investigación en el campo quedó paralizada durante décadas.

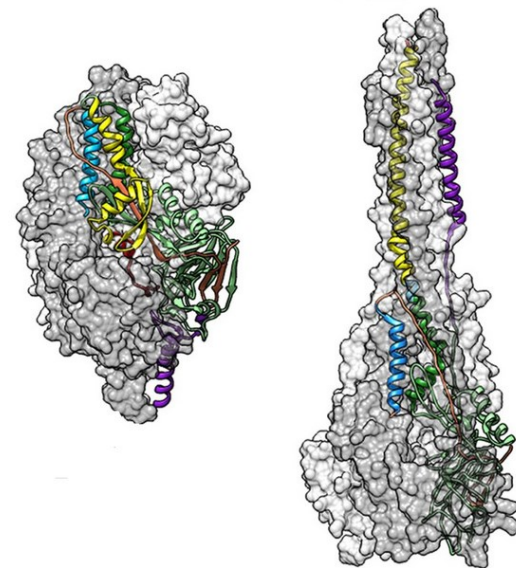
Nadie sabía por qué sucedió aquel desastre hasta casi 50 años después. En 2013, un equipo de los Institutos Nacionales de Salud de Estados Unidos liderado por Barney Graham fue el primero en usar cristalografía por rayos X para inmovilizar al virus microscópico y averiguar la estructura completa —átomo a átomo— de su proteína F, que es esencial para que pueda entrar en las células humanas y provoque una infección. Los investigadores descubrieron que esa proteína era como un monstruo microscópico. Antes de entrar en una célula tiene una forma similar a un diente incisivo, pero después se convierte en un afilado colmillo capaz de perforar la membrana celular para que el virus alcance el interior de la célula y secuestre su maquinaria biológica para reproducirse.

Los investigadores descubrieron que en un primer contacto, el sistema inmune humano es incapaz de reconocer la proteína viral cuando ya tiene forma de colmillo, por eso las vacunas de los sesenta no protegían a los bebés. Sin embargo, el sistema inmune es perfectamente capaz de identificar la misma proteína antes de la fusión, cuando se asemeja a una inocente paleta, y elimina al virus de forma eficaz antes de que cause daño. Los investigadores fueron los primeros en conseguir paralizar a esta esquiva molécula en su configuración prefusión, que es la base de las actuales vacunas y anticuerpos terapéuticos.

A principios de 2020, todo aquel trabajo de años permitió que el mismo equipo dilucidase en apenas 12 días la forma de la proteína S que permite al nuevo coronavirus entrar en las células humanas y causar una infección. Ese trabajo fue imprescindible para desarrollar las vacunas de la COVID-19 en un tiempo récord. “Con las vacunas de la COVID-19 ya aprobadas y las del [virus respiratorio sincitial] mostrando eficacia y esperando aprobación, entramos en una nueva era en la que el conocimiento a nivel atómico de la estructura de las proteínas nos llevará a nuevos éxitos; y tendremos la posibilidad de combatir nuevos patógenos emergentes”, celebra el pionero Barney Graham en un comentario a los resultados de la nueva vacuna.

Federico Martín-Torres, jefe de pediatría del Hospital Clínico Universitario de Santiago, que ha participado en los ensayos clínicos, cree que “Graham es Dios”. “Gracias a su técnica, el desarrollo estructural de antígenos, se han conseguido por fin todas estas vacunas”, destaca.

Aún quedan algunas preguntas sobre la vacuna del virus respiratorio sincitial, sobre todo cuánto dura la inmunidad, si serán necesarias dosis de recuerdo y si también es eficaz en personas de más de 80 años, ya que por ahora los datos de eficacia no son tan concluyentes. El ensayo de GSK seguirá en marcha para averiguarlo.



Estructura de la proteína F del virus respiratorio sincitial antes de entrar en una célula humana, a la izquierda, y después. ASM.

También se publican este jueves buenos resultados de otra vacuna similar desarrollada por Janssen, que en la segunda fase de pruebas en 5.700 pacientes ha logrado una eficacia de un 80%. Y hay otras dos inyecciones de este tipo también en la tercera y última fase de pruebas en pacientes.

“Es posible que algunas de estas inmunizaciones, probablemente las de GSK y Pfizer, se aprueben a finales de 2023 o principios de 2024” por parte de las autoridades de EE UU y Europa, señala Martín-Torres. “Esto puede permitir que, por primera vez, podamos combatir con vacunas los cuatro virus que causan neumonía grave o incluso letal: gripe, covid, neumococo y virus respiratorio sincitial”, añade.

Hasta ahora se desconocía la incidencia real de este virus entre personas mayores, sobre todo en aquellas debilitadas por otras dolencias. La llegada de la pandemia de COVID-19 y los análisis necesarios para el diagnóstico han aclarado su prevalencia e indican que este virus puede causar tanta enfermedad y mortalidad como la gripe, que mata cada año a entre 300.000 y 650.000 personas en todo el mundo.

Rosa Rodríguez, jefa de pediatría del Hospital Gregorio Marañón, destaca: “Vamos a tener por fin vacunas, primero en personas mayores y después en embarazadas, pues los resultados parecen muy buenos en ambos casos”. Para las próximas temporadas quedará el reto de combinar inmunizaciones y anticuerpos para lograr que todos los bebés estén protegidos en esos seis primeros meses de vida tan cruciales, añade.

Azucena Bardají, médica especialista en salud materna, infantil y reproductiva de ISGlobal, opina que “es posible que con estos resultados la Organización Mundial de la Salud recomiende la vacuna para embarazadas antes de final de año, con lo que se sumaría a las ya recomendadas contra la gripe y la tosferina, por ejemplo”. La médica cree posible que este sea el último invierno en el que se vean colapsos en pediatría por culpa de este virus en los países desarrollados. Pero el 97 % de los casos y las muertes por este patógeno suceden en países de renta media o baja, y aún no está claro, recuerda, que las vacunas vayan a llegar fácilmente allí.

Fuente: EL PAÍS. Disponible en <https://bit.ly/3kD901v>

Mpox is still considered a public health emergency – WHO

Feb 15. Ghebreyesus laid stress on a sustained decrease in the number of mpox cases worldwide, most of them reported in the Americas.

According to WHO’s statement, the current global mpox outbreak risk remains moderate worldwide, and is classed as low in the Southeast Asia and Western Pacific regions.

Meanwhile, the WHO’s European Region reported that 43 countries have not detected any new cases in the past three months, and that while 18 nations continue reporting recent cases of local person-to-person transmission, the number has dropped significantly.

The Americas, on the other hand, reported a steady toll over the past six weeks, confirming 200-250 cases per week, of which 4% are women.

Although vaccine supply is quite limited, seven regional nations have begun their corresponding vaccination campaign.

Ghebreyesus noted the pressing need to maintain health surveillance, prevention and care efforts, to vaccinate high-risk populations, to improve equitable access to diagnostics, vaccines and treatment for all, to continue fighting off stigma and discrimination, as well as to guarantee respect for human rights.

Fuente: Prensa Latina News. Disponible en <https://bit.ly/3Ygl5Gi>

The race to an RSV vaccine is nearly over, decades after the first attempt

Feb 16. In two votes this week, an FDA advisory committee will decide whether to recommend RSV vaccines from Pfizer and GSK for older adults.

Roughly six decades after the first attempt to develop an RSV vaccine, an independent advisory committee to the Food and Drug Administration is poised to recommend two respiratory syncytial virus shots this week.

Thus far, no RSV vaccine has been approved in the U.S.

On Tuesday, the FDA committee is evaluating Pfizer's single-dose vaccine for people ages 60 and up. If the committee votes in favor, FDA approval is likely to follow, though it could take weeks or months.

Then on Wednesday, the committee will evaluate another RSV vaccine that targets the same demographic, this one from GlaxoSmithKline.

RSV infects most people by age 2, and it is common to contract the virus multiple times throughout life. In the U.S., the virus kills more than 10,000 adults 65 or older and around 300 children under 5 every year.

RSV cases spiked dramatically in the U.S. earlier this winter, which overwhelmed children's hospitals — a reminder of the virus's threat. Since then, the pharmaceutical race to get vaccines to market has garnered extra attention.

"There's a very clear public health need for these vaccines, and we're going to have to see which vaccines prove themselves in terms of safety and efficacy," said Dr. Ofer Levy, the director of the Precision Vaccines Program at Boston Children's Hospital.

In total, 11 RSV vaccines are being actively studied in U.S. trials, according to data provided to NBC News by PATH, a nonprofit global health organization. Seven of them are for older adults, and four are designed to protect infants or children.

"This is kind of the beginning of a new era," said Dr. Barney Graham, a senior adviser for global health equity at Morehouse School of Medicine, who previously was the deputy director of the National Institutes of Health's Vaccine Research Center.

"I actually think all of [the vaccines] are going to work well enough to be approved, depending on the side effect profiles," he added.

According to an FDA briefing document released ahead of Tuesday's meeting, Pfizer's data suggests its vaccine reduced the risk of RSV-related illness for older adults by 67% to 86%.

Earlier this month, data published New England Journal of Medicine showed that GSK's shot lowered the risk of symptomatic illness among older adults by 83% and of severe illness by 94%.



A woman watches her child, who is suffering from an RSV infection, in a pediatric intensive care unit in Germany.

Both shots came with mild to moderate side effects like injection site pain, fatigue and muscle pain.

From zero options to multiple candidates

In an editorial published earlier this month in the New England Journal of Medicine, Graham described the advances that have been made since an RSV vaccine trial in the 1960s was linked to two infant deaths.

The failure stalled development for several decades. But now, Graham said, researchers have learned that RSV vaccines must target a specific protein on the virus's surface before it changes its original shape.

"These are vaccines that are made with atomic-level precision," he said.

Behind Pfizer's and GSK's vaccines, a monoclonal antibody injection from Sanofi and AstraZeneca is next in line for FDA approval. The shot, which has already been approved in Europe, is designed to protect babies from the virus. Although it is not technically a vaccine, it would serve the same purpose. The FDA began reviewing the companies' data in January.

Pfizer has also tested a second application of its shot in pregnant people to help protect their infants from RSV. When the vaccine was administered for that purpose, the company's findings suggest it reduced the risk of severe illness in infants by 82% through their first 90 days of life, and 69% through six months. The FDA is reviewing that data and could decide in August whether to approve the shot for pregnant people.

Other notable vaccine candidates in the pipeline include a shot for older adults from Moderna, which the company has said could get submitted to the FDA by July for subsequent approval. Another candidate, from Bavarian Nordic, targets the same demographic, with phase 3 data expected by the middle of the year.

Janssen, J&J's pharmaceutical arm, is also testing an RSV vaccine for older people. The company's phase 2 trial results, published this month, found that the shot reduced the risk of severe disease by 80% among people 65 and up.

The benefits of vaccine variety

Levy said it will be important to have multiple options.

"You don't want all the eggs in one basket," he said. "You don't want to be dependent on just one manufacturing stream, that's No. 1. No. 2, in my opinion, it's favorable to have more than one platform."

A vaccine platform is the technology used to spur an immune response. Having a variety on the market is ideal, because people may respond differently to shots based on their age, sex or immune status.

Graham said he eventually hopes an RSV vaccine will be approved for young kids, as well.

"If we could find things that would work and be safe in the 6-month-to-5-year-old child, to me that would kind of complete what we could do for RSV," he said.

In serious cases, RSV infections can lead to bronchiolitis, which causes airways to become inflamed and clogged with mucus, making it difficult to breathe. If an infection travels to the lung sacs, it can result in pneumonia.

Older adults and infants are particularly vulnerable to such outcomes. For most people, however, RSV symptoms resemble a common cold, so vaccines would not be necessary for everyone, Graham said.

Fuente: NBC News. Disponible en <https://nbcnews.to/3EQ67Bp>

BioCubaFarma: En 2023 Cuba podría contar con un sistema diagnóstico rápido del dengue y un candidato vacunal

16 feb. Los proyectos cubanos en curso, a fin de disponer de un sistema de diagnóstico rápido del dengue y la vacuna preventiva contra esta enfermedad muestran importantes avances, que podrían traducirse en resultados concretos para el presente año, confirmaron autoridades del Grupo Empresarial de las Industrias Biotecnológica y Farmacéutica (BioCubaFarma).



En Twitter, Eduardo Martínez Díaz, presidente de BioCubaFarma, informó que en el transcurso de 2023 debe estar disponible el nuevo sistema de diagnóstico rápido del dengue, en el cual trabajan especialistas del Centro de Inmunoensayo.

En declaraciones a Granma, Martínez Díaz argumentó que lo anterior permitiría determinar, ante la aparición de los primeros síntomas, si se trata de dengue y/o de una segunda infección, a fin de aplicar un tratamiento diferenciado a los pacientes, y evitar el agravamiento de la enfermedad y la muerte, subrayó.

Añadió que, igualmente, hay probabilidad de poder contar este mismo año con el primer candidato vacunal contra esa enfermedad viral, transmitida por el mosquito *Aedes Aegypti*. "Ambos proyectos tendrán un significativo impacto en la salud y el bienestar de nuestra población", aseveró Martínez Díaz.

Según plantean los científicos, la obtención de la referida vacuna es un proceso complejo, porque el dengue tiene cuatro serotipos y hay que inmunizar contra cada uno de ellos al mismo tiempo, para que el producto sea efectivo.

Como ha aseverado la doctora en Ciencias Guadalupe Guzmán Tirado, directora del Centro de Investigación del Instituto de Medicina Tropical Pedro Kourí (IPK), los científicos cubanos le han dedicado décadas de trabajo al dengue, con aportes al mundo en la lucha contra esa enfermedad.

Muestra de ello es el papel fundamental desempeñado por la Mayor de las Antillas en la nueva clasificación que hace la Organización Mundial de la Salud (OMS), del dengue con y sin signos de alarma, enfocada a evitar el agravamiento del paciente.

Fuente: Cubadebate. Disponible en <https://bit.ly/3KVUPiV>

Tras ser vacunado o convaleciente de COVID-19 ¿Se está más protegido?

19 feb. Un informe científico publicado en la revista *The Lancet*, asegura que la población mundial está tan bien protegida contra el coronavirus después de un contagio como cuando resultó vacunada contra la enfermedad.

En la nota se recopilan unas 60 investigaciones preexistentes, con un retroceso de varios años y tiene en cuenta la emergencia, a finales de 2021, de la variante Ómicron. "Si bien una infección brinda una protección que va disminuyendo con el tiempo, el nivel de ésta parece tan duradero ó incluso más, que el conferido por la misma vacunación", concluyó el trabajo.



La tesis se basó comparando las vacunas más eficaces contra la COVID-19 y que son los puntales de las campañas de vacunación de muchos países occidentales, aunque el tema no es nuevo y muchos otros estudios intentaron comparar los riesgos de contraer el virus nuevamente, dependiendo de si uno está vacunado o si ya se ha infectado.

En ese sentido, la variante Ómicron demostró ser mucho más contagiosa que sus predecesoras y capaz de

infectar a numerosas personas vacunadas, sin que por ello corran un alto riesgo de sufrir una forma grave de la enfermedad.

El estudio afirma que lo mismo ocurre en caso de infección anterior por coronavirus. La protección es más bien débil contra una reinfección con la variante Ómicron, pero sólida contra una forma más grave, comparando los anticuerpos tras la vacuna y los adquiridos por la infección.

Estos resultados no significan que sea indiferente vacunarse o infectarse para adquirir luego una primera inmunidad. Desde ya resulta mucho más arriesgado enfermarse, por sus secuelas sobre todo en el caso de las personas mayores.

Sin embargo, el estudio publicado en *The Lancet* ofrece una visión más precisa de lo que se puede esperar del desarrollo de una "inmunidad híbrida" en la población, a medida que muchos más individuos hayan sido vacunados y se hayan contagiado el virus al menos una vez. Los resultados sugieren que las futuras olas de COVID-19 darán lugar a bajos niveles de hospitalización, cierra el estudio.

Fuente: Cubadebate. Disponible en <https://bit.ly/3kKvlow>

Moderna da marcha atrás, dice que la gente no tendrá que pagar por la vacuna contra COVID-19

19 feb. Moderna dio marcha atrás y prometió que las personas no tendrán que pagar por la vacuna contra COVID-19 de la empresa una vez que el gobierno estadounidense deje de comprar las vacunas.

“Moderna mantiene su compromiso de garantizar que las personas en Estados Unidos tengan acceso a nuestras vacunas contra COVID-19 independientemente de su capacidad de pago”, dijo la compañía en un comunicado.

La vacuna contra COVID-19 de Moderna “seguirá estando disponible sin costo para las personas aseguradas, ya sea que las reciban en los consultorios médicos o en las farmacias locales”, según la compañía. Las personas que no cuentan con un seguro médico, o que no cuentan con un seguro adecuado, podrán vacunarse “sin costo alguno” a través de un programa de asistencia de Moderna, agregó.

El gobierno de EE. UU. ha comprado cientos de millones de dosis de la vacuna contra el COVID-19 desde 2020 y a los estadounidenses que quieren una no se les ha cobrado.

La administración del presidente Joe Biden planea poner fin a la emergencia de salud pública de COVID-19 en mayo y dejar de comprar más dosis de vacunas.

Aunque algunas dosis ya compradas estarán disponibles durante algún tiempo, el cambio podría provocar que las personas paguen para vacunarse. El Departamento de Salud y Servicios Humanos ha dicho que “muchos estadounidenses continuarán sin pagar nada de su bolsillo” para vacunarse porque la mayoría de las aseguradoras privadas y Medicare, cubrirían las vacunas al menos hasta septiembre de 2024.

Sin embargo, algunas personas se enfrentarán a un costo elevado.

El director ejecutivo de Moderna, Stephane Bancel, dijo en enero que Moderna estaba considerando dosis de precios en el rango de USD 110 a 130 tras el fin de la emergencia. Esto supondría un aumento respecto a los USD 26 por dosis de las vacunas de refuerzo y los aproximadamente USD 15 por dosis de la vacuna original que la empresa cobraba al gobierno.

“Creo que este tipo de precio es consistente con el valor” de la vacuna, dijo Bancel al Wall Street Journal.

Este plan suscitó la ira del senador Bernie Sanders (I-Vt.),

que en una carta al director ejecutivo afirmó que millones de estadounidenses no podrían permitirse ese costo. Sanders calificó la subida propuesta de “aumento escandaloso de los precios”.

Sanders, quien preside el Comité de Salud del Senado, llevará a cabo una audiencia en marzo titulada “Los contribuyentes pagaron miles de millones por ello: entonces, ¿por qué Moderna consideraría cuadruplicar el precio de la vacuna contra COVID-19?”. Se prevé que Bancel testifique durante la audiencia.

Sanders ha señalado que Moderna ha cosechado inmensos beneficios durante la pandemia, al igual que Pfizer y Johnson & Johnson. Las tres empresas producen las únicas vacunas contra COVID-19 que estuvieron disponibles en Estados Unidos hasta 2022, cuando los reguladores autorizaron una vacuna de Novavax.

Pfizer dijo en otoño que planea cobrar alrededor de USD 110 a USD 130 por dosis una vez que el gobierno deje de comprar la vacuna. Novavax no ha fijado un precio, pero ha dicho que espera tomar una parte significativa del mercado una vez que finalicen las compras del gobierno. La vacuna de Johnson & Johnson no es preferible debido al riesgo de una combinación a menudo mortal de niveles bajos de plaquetas y coagulación de la sangre.

Calendario de vacunación

Debido a que las vacunas contra COVID-19 se agregaron al programa de vacunación infantil, los niños cuyas familias no pueden pagar la vacuna podrán recibirlas gratuitamente, y los contribuyentes sufragarán el costo.

Eso sucedería a través de un programa llamado Vacunas para niños.

Los asesores del gobierno, que recomendaron la incorporación al calendario, dijeron que se debía a que las vacunas pueden prevenir enfermedades graves. Las nuevas vacunas, preparadas para reemplazar las vacunas originales, aún no están respaldadas por ningún dato de ensayo clínico.

La Dra. Rochelle Walensky, directora de los Centros para el Control y la Prevención de Enfermedades (CDC) de EE. UU., dijo que la única razón por la que las vacunas se incluyeron en el calendario fue para que pudieran ser cubiertas por el programa Vacunas para Niños.



“Era la única forma de que nuestros niños no asegurados tuvieran acceso a las vacunas”, declaró Walensky durante una audiencia en el Congreso el 8 de febrero. “Esa fue la razón para incluirla en el calendario”.

Las vacunas están autorizadas para la prevención de la enfermedad de la COVID-19.

Las vacunas originales no son muy eficaces para los niños, según los datos de los ensayos y los estudios observacionales.

Un estudio de los CDC publicado este mes, por ejemplo, encontró que una serie primaria de vacunas de Moderna proporcionó una protección del 60 por ciento para niños de 3 a 5 años, pero que la protección se redujo al 36 por ciento entre tres y cuatro meses. La serie primaria de Pfizer solo proporcionaba un 31 por ciento de protección. Los niños son los que corren menos riesgo de contraer COVID-19.

Los datos de observación de las vacunas actualizadas indican que pueden proteger mejor contra enfermedades graves, pero muchos expertos afirman que se necesitan datos de ensayos para demostrar su eficacia.

Fuente: The Epoch Times en español. Disponible en <https://bit.ly/3YaPAyN>

24-valent Pneumococcal Conjugate Vaccine Candidate for Children Advances

Feb 21. Vaxcyte, Inc. announced today that the U.S. Food and Drug Administration (FDA) had cleared the Company's infant Investigational New Drug (IND) application for VAX-24, its lead, 24-valent pneumococcal conjugate vaccine (PCV) candidate designed to prevent invasive pneumococcal disease (IPD).

Vaxcyte stated it plans to initiate the infant Phase 2 study in the second quarter of 2023, with data expected by 2025.

The infant study design will include a primary immunization series consisting of three doses followed by a subsequent booster dose.

"The clearance of the VAX-24 infant IND application marks an important step in expanding the development of our lead, broad-spectrum PCV candidate in this important and vulnerable population," said Grant Pickering, Chief Executive Officer and Co-founder of Vaxcyte, in a press release on February 21, 2023.

"Based on the positive data from our Phase 1/2 proof-of-concept study in adults, we believe VAX-24 has the potential to deliver a best-in-class profile with broader coverage and better immune responses relative to the standard-of-care for both the adult and pediatric populations."

"We remain focused on advancing our VAX-24 clinical programs and look forward to the anticipated initiation of the infant study and announcement of the topline results from our Phase 2 study in adults aged 65 and older in the second quarter of this year."

Despite the effectiveness of current vaccines, IPD, which includes meningitis and bacteremia, remains persistent in the first years of life and is a leading cause of invasive disease in children two years of age and under.

The burden of disease in the pediatric population underscores the need for a broader-spectrum vaccine.

Fuente: Precision Vaccinations. Disponible en <https://bit.ly/3J7ISFc>



Más de 75 millones de niños han recibido la vacuna conjugada contra la fiebre tifoidea desde 2018

21 feb. Más de 75 millones de niños han recibido la vacuna conjugada contra la fiebre tifoidea en los primeros cinco años transcurridos desde su introducción en 2018, de acuerdo con el informe elaborado de forma conjunta por la Organización Mundial de la Salud (OMS) y los Centros para la Prevención y el Control de Enfermedades de Estados Unidos (CDC, por sus siglas en inglés).

La fiebre tifoidea es una enfermedad infecciosa potencialmente mortal provocada por la bacteria *Salmonella typhi*. Esta suele transmitirse con facilidad a través de alimentos y agua contaminados. Según las últimas estimaciones hechas públicas por la OMS cada año enferman por fiebre tifoidea entre 11 y 20 millones de personas, de las que fallecen entre 128.000 y 161.000. A pesar de que la fiebre tifoidea puede tratarse con antibióticos, la creciente resistencia a diferentes tipos complica cada vez más que los tratamientos sean efectivos.

Desde hace años se utilizan dos vacunas autorizadas para la prevención de la fiebre tifoidea (una inyectable con antígeno purificado para mayores de dos años y una oral atenuada con organismos vivos para mayores de cinco años), pero en 2017 la OMS precalificó dos nuevas vacunas conjugadas que demostraron proporcionar una inmunidad más prolongada, requiere una menor administración de dosis y puede administrarse a partir de los seis meses de edad. Estas son Typbar-TCV (Bharat Biotech International Limited) y TYPHIBEV (Biological E. Limited).

La evidencia científica de la que se dispone ha demostrado que una dosis única administrada a niños es segura y tiene una eficacia de entre el 19-95 %, con una respuesta de anticuerpos que persiste hasta siete años. La administración conjunta de la vacuna contra la fiebre tifoidea conjugada con otras vacunas que se administran de forma rutinaria, como por ejemplo contra el sarampión o la fiebre amarilla, no interfiere con la respuesta inmunitaria de las vacunas contra la fiebre tifoidea o de las otras vacunas inoculadas de forma simultánea. El informe destaca que el uso de la vacuna conjugada contra la fiebre tifoidea es rentable para los países con una incidencia de la enfermedad alta o muy alta.

Razón por la que, tal y como se ha señalado, la OMS recomendó la introducción de la vacuna conjugada en 2018 como prioridad en los países con una elevada prevalencia de fiebre tifoidea. La primera incorporación se produjo ese mismo año en la Corporación Municipal de Navi Mumbai (India), como parte de un programa de evaluación.

Posteriormente fue introducida a nivel nacional en el programa de inmunización de rutina para niños mayores de nueve meses o de entre 15 y 18 meses en Pakistán. Siguió estos pasos Liberia (2021), Zimbabue (2021), Samoa (2021) y Nepal (2022). A lo largo del 2023 está prevista su introducción en Malawi.

"Desde la recomendación de la OMS tan solo cinco países, incluidos tres (7 %) de las 44 naciones y estados asociados con una incidencia alta de fiebre tifoidea, han introducido la vacuna conjugada."

Los autores del informe especifican que se recomiendan campañas de vacunación de actualización dirigidas a niños y jóvenes desde los seis meses hasta los 14 años, desde el momento en el que la vacuna conjugada contra la fiebre tifoidea se incorpore a los calendarios nacionales de vacunación de rutina, siempre que sea factible y esté respaldado por datos epidemiológicos.

Los más de 75 millones de niños que se han beneficiado de la vacuna conjugada referidos al inicio de estas líneas se traducen en coberturas que oscilan entre el 63 y el 95 %. Cabe señalar que desde la recomendación de la OMS tan solo cinco países, incluidos tres (siete por ciento) de las 44 naciones y

estados asociados con una incidencia alta de fiebre tifoidea, han introducido la vacuna conjugada en sus programas de inmunización de rutina.

Ante esta reducida cifra el informe señala como factores probables al retraso en su introducción a la presencia de prioridades de salud contrapuestas, especialmente motivadas por la pandemia de COVID-19, así como datos insuficientes sobre la carga de la enfermedad que permitan la adopción de decisiones nacionales sobre la introducción de la vacuna.

Se han identificado como importantes barreras el hecho de que los datos de vigilancia relativos a la fiebre tifoidea se limitan con frecuencia a los casos con sospecha clínica, además de que las pruebas diagnósticas serológicas cuentan con poca especificidad. Se suma el problema de que los estudios sobre la incidencia de la enfermedad son costosos y requieren mucho tiempo, lo que plantea significativos desafíos técnicos a los que muchos países no pueden hacer frente. Se alienta también a los países en los que la fiebre tifoidea es endémica a que revisen las fuentes nacionales de datos sobre la enfermedad y la evidencia científica al respecto con el objetivo de poder orientar de la mejor forma la futura adopción de la vacuna conjugada.

“El uso de la vacuna conjugada contra la fiebre tifoidea en los programas de inmunización de rutina es parte del enfoque multisectorial de la prevención de la enfermedad, que incluye medidas como la mejora del acceso a agua potable, sistemas de saneamiento e higiene y la vigilancia nacional reforzada, lo que ayudará a reducir la morbilidad y la mortalidad por fiebre tifoidea”, expone el informe en sus conclusiones, entre las que destacan que “se necesita un compromiso financiero y técnico sostenido a nivel nacional e internacional para mejorar la implementación de estas medidas, compilar datos nacionales sobre la prevalencia de la fiebre tifoidea y aumentar la cobertura de vacunación para avanzar en el control de la enfermedad”.

Fuente: ConSalud.es. Disponible en <https://bit.ly/3YfJ61x>

WestVac Biopharma: vacuna trivalente de proteína recombinante COVID-19 contra subvariantes XBB.1.5 y BA.5

21 feb. Recientemente, con el apoyo del Programa Nacional Clave de I+D de China, tras la aprobación del ensayo clínico de la vacuna de la variante recombinante COVID-19 (célula Sf9) aprobado por el NMPA, WestVac Biopharma (Guangzhou) Co. Ltd. (en lo sucesivo, "WestVac Biopharma (Guangzhou)") ha realizado avances significativos en el desarrollo de la vacuna trivalente de proteína recombinante COVID-19 contra las últimas subvariantes prevalentes, incluidas XBB.1.5 y BA.5, que es una de las primeras vacunas trivalentes de proteína recombinante dirigidas contra XBB.1.5 en todo el mundo.

Aprovechando la rápida respuesta de la plataforma internacionalmente avanzada de expresión de células de insecto en la producción de vacunas de proteínas recombinantes, WestVac Biopharma (Guangzhou) ha construido el vector en el plazo de un mes, y ha producido la vacuna de proteínas recombinantes trivalentes de alta pureza y calidad para uso humano. Se trata de una vacuna totalmente sintética. El antígeno subunitario de la vacuna está diseñado con precisión a partir de la estructura de las proteínas S-RBD y HR de las subvariantes XBB.1.5 y BA.5, y



WESTVAC BIOPHARMA CO., LTD./PR NEWSWIRE

puede autoensamblarse en partículas proteicas triméricas estables. El estudio reveló que la vacuna induce altos títulos de anticuerpos neutralizantes contra Omicron XBB.1.5, BQ.1, BF.7, BA.5, BA.2.75 y otras subvariantes, lo que sugiere que se trata de una vacuna COVID-19 de amplio espectro contra múltiples subvariantes prevalentes en el país y en el extranjero, como XBB.1.5, BQ.1, BF.7 y BA.5.

En la actualidad, WestVac Biopharma colabora activamente con las autoridades nacionales y se esfuerza por cumplir lo antes posible los requisitos nacionales de aprobación de la vacuna trivalente de proteína recombinante, ¡El objetivo es utilizar el poder de WestVac Biopharma para ayudar en la lucha contra las nuevas variantes de coronavirus!

WestVac Biopharma (Guangzhou) es una filial propiedad al cien por cien de WestVac Biopharma Co., Ltd. situada en la Base de Producción de Vacunas Innovadoras de la Ciudad del Conocimiento de la Zona de Desarrollo Económico de Guangzhou. Con las líneas de producción combinadas de 5000L que se construirán en breve para la vacuna proteica recombinante de células de insecto y la vacuna en spray nasal, tendrá una capacidad de producción anual de 500 millones de dosis de vacunas.

WestVac Biopharma Co., Ltd., la empresa matriz, es una compañía biofarmacéutica innovadora que integra I+D, producción y venta de vacunas. De 2021 a 2022, WestVac Biopharma fue seleccionada con éxito en la lista de empresas unicornio durante dos años consecutivos. Covaccine® --Vacuna recombinante COVID-19 (célula Sf9) desarrollada por WestVac Biopharma ha demostrado una seguridad e inmunogenicidad satisfactorias en el ensayo clínico con una eficacia protectora del 70,95 % contra las subvariantes Omicron, que es una de las vacunas más eficaces en la prevención de casos sintomáticos de COVID-19 con subvariantes Omicron en el mundo. En diciembre de 2022, Covaccine® ha sido aprobada por la autoridad nacional para uso de emergencia y ya ha sido licitada y suministrada para vacunación en múltiples provincias. Mientras tanto, la vacuna COVID-19 de Variante Recombinante (célula Sf9) desarrollada por WestVac Biopharma ha recibido recientemente la Aprobación para Ensayo Clínico por NMPA, los ensayos clínicos de fase I/II comenzarán pronto.

Fuente: Europa Press. Disponible en <https://bit.ly/3YanZh2>

Moderna: El gobierno de EE. UU. recibió USD 400 millones por regalías de vacunas contra COVID-19

23 feb. Moderna comunicó el 23 de febrero que recientemente había llegado a un acuerdo sobre patentes con el gobierno de EE.UU. en relación con una tecnología en litigio que se utiliza en su vacuna contra la COVID-19.

En diciembre de 2022, Moderna firmó “un acuerdo no exclusivo de licencia de patente” con el Instituto Nacional de Alergias y Enfermedades Infecciosas (NIAID), según explicó el director financiero, Jamey Mock, durante la conferencia sobre resultados celebrada el jueves.

El acuerdo le permite a la compañía usar “determinados derechos de patente relativos a la estabilización de las proteínas de espícula del coronavirus de prefusión y las proteínas estabilizadas resultantes para su uso en productos de vacunación contra COVID-19”, explicó Mock.

En virtud del acuerdo, Moderna envió un “pago de recuperación” de USD 400 millones al NIAID antes de



año nuevo, según los ejecutivos de Moderna.

“Hemos acordado pagar regalías bajas de un solo dígito sobre las futuras ventas netas de nuestras vacunas contra COVID-19”, dijo Mock.

El NIAID y su agencia matriz, los Institutos Nacionales de Salud (NIH) de EE. UU., no respondieron a las solicitudes de comentarios.

The Epoch Times presentó una solicitud de la Ley de Libertad de Información para conocer el acuerdo.

El NIAID estuvo dirigido durante décadas por el Dr. Anthony Fauci, quien se jubiló a fines del 2022.

La revelación significa que el gobierno recibió el pago poco antes de decirle a una corte que este, y no Moderna, debía enfrentarse a una demanda por infracción de patente.

Los NIH dicen que erróneamente se les excluyó de la patente

Los investigadores del gobierno de EE.UU. se quedaron fuera por error de una solicitud de patente para una secuencia clave que forma parte de la vacuna, según funcionarios del gobierno.

Los científicos del NIH llevaban cuatro años trabajando con Moderna en vacunas para enfermedades previo al inicio de la pandemia. Tras la aparición de COVID-19, los NIH y Moderna colaboraron en el desarrollo de la vacuna contra esta enfermedad, según han declarado ambas partes.

Pero la secuencia del ARN mensajero “fue seleccionada exclusivamente por los científicos de Moderna utilizando la tecnología de Moderna y sin la aportación de los científicos del NIAID, que ni siquiera tuvieron conocimiento de la secuencia del ARNm hasta después de que ya se hubiera presentado la solicitud de patente”, dijo Moderna en un comunicado.

Los funcionarios del NIH y Moderna estaban negociando sobre el asunto cuando Moderna afirmó en una solicitud de patente que “había llegado a una determinación de buena fe” de que los científicos del gobierno no habían inventado la secuencia del ARN mensajero.

Una revisión de los NIH concluyó que los doctores Kizzmekia Corbett, Barney Graham y John Mascola, quienes trabajaron con Moderna mientras estaban en los NIH, inventaron conjuntamente la secuencia, según declaró anteriormente a The Epoch Times un funcionario del gobierno familiarizado con la situación.

“El trabajo del Dr. Barney Graham y de Kizzmekia Corbett, entre otros, estabilizó la proteína de la espícula de prefusión que se utiliza en prácticamente todas, con pocas excepciones, las vacunas que ahora tienen éxito”, declaró Fauci en una audiencia del Congreso.

Los científicos fueron nombrados en varias patentes relacionadas, pero no en la de secuencia.

Moderna cambió su postura en diciembre de 2021, anunciando que abandonaba, al menos temporalmente, su búsqueda de la patente de secuencia.

“Moderna ha tomado esta medida para disponer de más tiempo para las conversaciones con los NIH. Moderna cree que sus científicos inventaron la secuencia específica de ARNm en el corazón de la patente en cuestión. La empresa reconoce que los NIH están igualmente convencidos de que sus científicos deberían figurar como co-inventores por su trabajo contemporáneo sobre la secuencia proteínica”, declaró Moderna en aquel momento.

“Moderna decidió que la emisión de la patente de secuencia de ARNm en el entorno actual podría interferir

con futuras discusiones encaminadas a una resolución amistosa con los NIH. Además, a la empresa le gustaría evitar cualquier distracción en los importantes esfuerzos público-privados en curso para abordar las variantes emergentes del SARS-CoV-2, incluido ómicron. Moderna sigue estando agradecida a los NIH y a sus científicos por sus importantes contribuciones al desarrollo de la vacuna contra COVID-19 de Moderna”, agregó.

El gobierno de EE. UU. autorizó la vacuna en diciembre de 2020 y posteriormente otorgó una licencia biológica. Pagó USD 10,000 millones a Moderna por desarrollar la vacuna y ha pagado otros USD 9000 millones por dosis de la vacuna.

Pago de regalías

La investigación llevada a cabo en el Departamento de Salud y Servicios Humanos de Estados Unidos dio lugar a más de 4400 patentes estadounidenses entre 1980 y 2019, según la Oficina de Rendición de Cuentas del Gobierno.

El NIH tenía el 2 por ciento de las patentes. Esas patentes generaron hasta USD 2000 millones en ingresos por regalías durante el mismo período de tiempo.

“El NIH proporciona información limitada al público sobre sus actividades de concesión de licencias. Por ejemplo, la agencia no informa de cuáles de sus patentes son objeto de licencia ni publica parámetros que permitan al público evaluar cómo afecta la concesión de licencias el acceso de los pacientes a los medicamentos resultantes”, concluyó la oficina. “Aumentar la transparencia de sus actividades de concesión de licencias podría mejorar la comprensión del público y de los responsables políticos de la gestión de los NIH de su propiedad intelectual”.

Algunos de los pagos se destinan a científicos individuales, incluido Fauci.

Open the Books, un organismo de control sin fines de lucro, obtuvo documentación sobre aproximadamente USD 350 millones en regalías para Fauci y otros científicos del gobierno desde el año fiscal 2010 hasta el año fiscal 2020.

El Dr. Lawrence Tabak, director interino de los NIH, reconoció que los pagos presentan “una apariencia de conflicto de intereses”, pero afirmó que existen cortafuegos “sustanciales y significativos” que mitigan el problema.

Fuente: The Epoch Times. Disponible en <https://bit.ly/3ILZocB>

Los expertos vaticinan qué pasará con la COVID-19 y las vacunas a partir de ahora

25 feb. Expertos en microbiología, vacunología y atención primaria han destacado que el futuro de la COVID-19 es incierto "pero apunta a estacionalizarse", lo que requerirá concienciar a la población sobre la necesidad de un calendario de "vacunas actualizadas", como ocurre con la gripe, y acabar con el concepto de "dosis de recuerdo" que ha provocado fatiga pandémica.

Estrategia de control de la COVID-19

Así lo han puesto de manifiesto durante una jornada en el Congreso de los Diputados de divulgación y reflexión sobre la estrategia de control de la covid-19, una iniciativa puesta en marcha por petición de la

sociedades españolas de Medicina de Familia y Comunitaria y de Microbiología Clínica y Enfermedades Infecciosas.

Esther Redondo, responsable de Vacunas del Grupo de Trabajo Infecciones, Migrantes, vacunas y Actividades Preventivas de Atención Primaria (IMVAP) de la sociedad de médicos SEMERGEN, ha afirmado que en estos momentos no hay conceptos claros sobre la evolución del virus, pero con toda probabilidad apunta a estacionalizarse, por lo que habrá que asentar en la sociedad un calendario otoño-invierno de vacunación dirigido principalmente a mayores y vulnerables.

"Hay que luchar contra la fatiga pandémica de las dosis de refuerzo"

Ha apelado a luchar contra la fatiga pandémica y al hartazgo vacunal que produce hablar de "la tercera, cuarta, quinta o sexta dosis" para concienciar sobre una "vacuna actualizada" a las variantes o subvariantes que estén circulando en cada momento ya que las reinfecciones por el virus se seguirán produciendo.

Redondo ha lamentado el poco éxito de la campaña de vacunación con la dosis bivalente (la adaptada a ómicron y sus subvariantes) con una disparidad territorial "que debe ser estudiada": mientras en Galicia entre los mayores de 59 años alcanza el 70 %, en otras comunidades como Baleares o Canarias no llegan al 40 % y baja al 20 % en Ceuta o Melilla.

¿Cómo afectará la COVID-19 a los hospitales?

Asimismo, la especialista ha recordado que la covid-19 seguirá tensando el sistema sanitario con hospitalizaciones, muertes, empeoramiento de patologías y aumento de secuelas por infección (pulmonares, cardíacas, renales y neurológicas, las más frecuentes) y ha alertado de que si la sociedad pierde el miedo a un virus por la sensación de protección de vacunas anteriores, volverá a emerger.

El futuro pasa por la vigilancia, el estudio y la detección precoz

Rafael Cantón, jefe de Microbiología del Hospital Ramón y Cajal, ha explicado que ómicron es "como una sopa de letras", por lo que ve necesario que la secuenciación del virus sea "una realidad rutinaria por motivos de salud pública en todos los laboratorios".

Ha asegurado que aún quedan "lagunas" para que la comunidad médica y científica entienda el comportamiento del SARS-CoV-2, y la infección covid-19, dada "la complejidad del genoma de proteínas" del virus y ha apelado a una respuesta "multidisciplinar" con vigilancia, estudio y detección precoz para poder "apresurar" vacunas que mejoren la respuesta inmunitaria futura.

Entre otros ponentes, ha participado el jefe de la Unidad de Urgencias del Hospital Clínico San Carlos, Juan González del Castillo, quien también ve necesario aumentar la secuenciación del Sars-cov-2 y las pruebas de detección en centros sanitarios para "organizar el flujo de pacientes".

González, al igual que otros expertos que han participado en la jornada, han señalado que los síntomas de la covid-19 han cambiado y que muchos pacientes no acuden a urgencias por síntomas de infección, sino por una "descompensación de su patología base", que puede producir una hospitalización prolongada que deriva en que un paciente que vivía de forma independiente pase a ser crónico y dependiente.

Fuente: Onda Cero. Disponible en <https://bit.ly/3Yho02H>

Más de 50.000 escolares no tienen ninguna vacuna contra la COVID-19

26 feb. Más de 55 mil niños piuranos entre 5 y 11 años comenzará el año escolar 2023, sin haber recibido una sola vacuna contra la COVID-19. Así lo informó el secretario del Colegio Médico de Piura y especialista en salud pública, Julio Barrena Dioses.

Teniendo en cuenta el rango de edad, hay 55 mil 75 niños entre 5 y 11 años que no han recibido ninguna vacuna“, sostuvo.

También señaló que sólo dos de cada 10 niños han recibido su tercera dosis de la vacuna.

“En primera dosis están en 80,4 %; en la segunda dosis están en el 70,4 % y en la tercera dosis están al 21,5 %. El año pasado se buscaba que en marzo llegaran al 80 % en la segunda dosis, aún así lo hemos logrado y lo ideal sería llegar al 85 %”, dijo.

En este sentido, aconsejó a los padres para que “sus hijos completen su calendario de vacunación contra el coronavirus y así evitar complicaciones”, dijo.

Se debe notar que el poder ejecutivo extendido a partir del sábado 25 de febrero y por un plazo de 90 días naturales, la emergencia sanitaria por la COVID-19 fue declarada en el país por Decreto Supremo N° 008-2020-SA con el propósito de ampliar la vacunación de los menores de edad, con miras al inicio de las clases escolares 2023.

La directora de inmunizaciones, María Elena Martínez informó que 25 niños murieron por COVID-19 durante esta quinta ola. Además, solo el 17 % de los niños de 5 a 11 años en promedio completó sus tres dosis de vacunas.

“Hay una falsa percepción de que la COVID-19 se ha ido, pero no es cierto. Además, existe la creencia de que los niños solo son asintomáticos, cuando son el gran contagio del virus”, advirtió.

Casos y muertes

En otro momento, Barrena Dioses informó que aunque los casos de coronavirus han disminuido drásticamente por mucho tiempo, la enfermedad no ha terminado.

“Hasta el 21 de febrero se han registrado 75 nuevos contagios lo que significa 3 a 4 casos por día pero todavía hay muertes”, dijo.

En ese sentido, afirmó que en lo que va del mes se han reportado 5 muertes, la mayoría de ellos adultos mayores.

“En el caso de los adultos mayores que van a ingresar de 62 a 90 años tenemos dos hombres y dos mujeres. En el caso de los hombres, son del distrito de Pariñas y el otro de Veintisisés de Octubre. En el caso de las mujeres, son de Tambogrande y El Tallán.

Fuente: News Es Euro. Disponible en <https://bit.ly/3KWPM1H>



Comienza este lunes en Cuba campaña de vacunación antipoliomielítica oral

27 feb. La 62 campaña nacional de vacunación antipoliomielítica oral comienza hoy en toda Cuba, para todos los niños que tengan más de un mes de nacidos y no hayan cumplido los tres años de edad.

De acuerdo con el Ministerio de Salud Pública (Minsap), la primera etapa se realizará entre el lunes 27 de febrero y el sábado 4 de marzo de 2023, con una semana de recuperación del 6 al 11 de marzo para niños enfermos, o que por otra causa no hayan podido vacunarse en la semana de la campaña.

Coincidiendo con la Semana de Vacunación de las Américas, la segunda etapa se ejecutará entre el lunes 24 y el sábado 29 de abril, con recuperación entre el 2 y el 6 de mayo.

A todos los que se les administre la primera dosis en la primera etapa, se les administrará la segunda dosis en la segunda etapa, precisa el Minsap.

La poliomielitis es una enfermedad infecto-contagiosa que afecta el sistema nervioso central, principalmente en niños, y puede provocar atrofia muscular, parálisis, deformidad y en algunos casos la muerte.

Cuba es el primer país de Latinoamérica en lograr la eliminación de esta enfermedad, y en 1995 recibió la Certificación de Erradicación de la Poliomielitis, por la Organización Panamericana de la Salud.

Actualmente en la mayor de las Antillas toda la población menor de 72 años está protegida contra este padecimiento altamente contagioso, y hasta 2021 se habían suministrado más de 857 millones de dosis de la vacuna antipoliomielítica.

Fuente: Cubadebate. Disponible en <https://bit.ly/3lJayio>

Firman Cuba y Belarús memorando de entendimiento en salud

27 feb. Representantes de los ministerios de Salud de Cuba y Belarús firmaron hoy en esta capital un Memorando que permite fortalecer vínculos en comercialización de medicamentos y gastables de salud pública entre ambos países.

Según conoció Prensa Latina, el documento fue rubricado por la Viceministra primera de Salud Pública de Cuba, Tania Cruz, y por el Director General de la empresa productora de medicamentos belarusos, Belfarmprom, Seguei Kazakevich.

Como parte del intenso trabajo de la delegación cubana en tierras de la nación eslava, este lunes mantuvieron un encuentro con la presidenta del Senado de la República de Belarús, Natalia Kachanova, quien patentizó las excelentes relaciones entre ambos países.

Igualmente, en la reunión se abordó la necesidad de cooperar en el fortalecimiento de su potencial



62 Campaña
Nacional de
Vacunación
Antipoliomielítica
Oral





productivo, en el área biofarmacéutica, y en los nexos entre los ministerios de Salud, sobre todo en la educación y superación de los cuadros.

En la jornada también se realizó un encuentro en la Agencia Regulatoria de Belarús, sitio donde por primera vez se registró la vacuna Soberana 02 en Europa.

De forma paralela se desarrolló en la nación europea un seminario para los angiólogos y endocrinólogos del país sobre las posibilidades y facultades que tiene el Heberprot-P en la curación del pie diabético.

La delegación cubana la integran además el vicepresidente de Biocubafarma, Eulogio Pimentel, y especialistas de los Centros de Inmunología Molecular, de Ingeniería Genética y Biotecnología, de la empresa Hayca y del Instituto Finlay de Vacunas.



Fuente: Prensa Latina. Disponible en <https://bit.ly/3IMwsBg>



VacciMonitor es una revista dedicada a la vacunología y temas afines como Inmunología, Adyuvantes, Infectología, Microbiología, Epidemiología, Validación, Aspectos regulatorios, entre otros. Arbitrada, de acceso abierto y bajo la Licencia *Creative Commons* está indexada en:



Síguenos en redes sociales



@vaccimonitor



@finlayediciones



@finlayediciones

FINLAY EDICIONES



Artículos científicos publicados en Medline

Filters activated: Publication date from 2023/02/15 to 2023/02/28. "vaccine" (Title/Abstract) 613 records.

[Vaccinomics: A scoping review.](#)

Dudley MZ, Gerber JE, Budigan Ni H, Blunt M, Holroyd TA, Carleton BC, Poland GA, Salmon DA. Vaccine. 2023 Feb 18;S0264-410X(23)00135-4. doi: 10.1016/j.vaccine.2023.02.009. Online ahead of print. PMID: 36803903

[COVID-19 vaccination coverage in Egypt: a large-scale national survey - to help achieving vaccination target, March-May, 2022.](#)

Kandeel A, Eldeyhy I, Abu ElSood H, Fahim M, Afifi S, Abu Kamar S, BahaaEldin H, Ahmed E, Mohsen A, Abdelghaffar K. BMC Public Health. 2023 Feb 27;23(1):397. doi: 10.1186/s12889-023-15283-w. PMID: 36849954

[Current status of hand-foot-and-mouth disease.](#)

Zhu P, Ji W, Li D, Li Z, Chen Y, Dai B, Han S, Chen S, Jin Y, Duan G. J Biomed Sci. 2023 Feb 24;30(1):15. doi: 10.1186/s12929-023-00908-4. PMID: 36829162

[Vaccine-like nanomedicine for cancer immunotherapy.](#)

Yi Y, Yu M, Li W, Zhu D, Mei L, Ou M. J Control Release. 2023 Feb 24;355:760-778. doi: 10.1016/j.jconrel.2023.02.015. Online ahead of print. PMID: 36822241

[Meeting Summary: Global Vaccine and Immunization Research Forum, 2021.](#)

Ford A, Hwang A, Mo AX, Baqar S, Touchette N, Deal C, King D, Earle K, Giersing B, Dull P, Hall BF. Vaccine. 2023 Feb 18;41(11):1799-807. doi: 10.1016/j.vaccine.2023.02.028. Online ahead of print. PMID: 36803897

[Trust in scientists on COVID-19 vaccine hesitancy and vaccine intention in China and the US.](#)

Yuan S, Rui J, Peng X. Int J Disaster Risk Reduct. 2023 Feb 15;86:103539. doi: 10.1016/j.ijdr.2023.103539. Epub 2023 Jan 14. PMID: 36687293

[Staphylococcal Enterotoxin B and C Mutants and Vaccine Toxoids.](#)

Schlievert PM. Microbiol Spectr. 2023 Feb 23:e0444622. doi: 10.1128/spectrum.04446-22. Online ahead of print. PMID: 36815779

[Vaccine hesitancy: current and future challenges.](#)

Male V. Immunol Cell Biol. 2023 Feb 16. doi: 10.1111/imcb.12631. Online ahead of print. PMID: 36798980

[Beliefs and knowledge related to human papillomavirus \(HPV\) vaccine among African Americans and African immigrants young adults.](#)

Adegboyega A, Obielodan O, Wiggins AT, Dignan M, Williams LB. Cancer Causes Control. 2023 Feb 28. doi: 10.1007/s10552-023-01678-y. Online ahead of print. PMID: 36854988

[In Silico Studies to Support Vaccine Development.](#)

Saldanha L, Langel Ü, Vale N. Pharmaceutics. 2023 Feb 15;15(2):654. doi: 10.3390/pharmaceutics15020654. PMID: 36839975

[COVID-19 vaccine hesitancy scale and its association with actual COVID-19 vaccine uptake in Israel.](#)

Grossman-Giron A, Tzur Bitan D, Shemesh S, Mayer Y, Shiffman N, Bloch Y. Vaccine. 2023 Feb 24;41(9):1567-1572. doi: 10.1016/j.vaccine.2023.01.044. Epub 2023 Jan 23. PMID: 36725432

[The emergence and persistence of the anti-vaccination movement.](#)

Kalichman SC, Eaton LA. Health Psychol. 2023 Feb 20. doi: 10.1037/hea0001273. Online ahead of print. PMID: 36809034

[mRNA Vaccine-A New Cancer Treatment Strategy.](#)

Xu C, Cao CH, Tan T, Deng ST, Wu BH, Yang Q, Wu MW, Wu H. Curr Cancer Drug Targets. 2023 Feb 22. doi: 10.2174/1568009623666230222124424. Online ahead of print. PMID: 36809966

[Glycomimetic Peptides as Therapeutic Tools.](#)

Hoober JK, Eggink LL. Pharmaceutics. 2023 Feb 17;15(2):688. doi: 10.3390/pharmaceutics15020688. PMID: 36840010

[Vaccination protects from chlamydial infertility.](#)

Bryan ER, Trim LK, Sadowski P, Paramasivan S, Kim JJ, Gough K, Worley S, Maidment TI, Carey AJ, Mihalas B, McLaughlin EA, Beagley KW. Biol Reprod. 2023 Feb 17:ioad021. doi: 10.1093/biolre/ioad021. Online ahead of print. PMID: 36799886

[Cost of introducing and delivering RTS,S/AS01 malaria vaccine within the malaria vaccine implementation program.](#)

Baral R, Levin A, Odero C, Pecenka C, Tanko Bawa J, Antwi-Agyei KO, Ampona-Achaino K, Chisema MN, Eddah Jalango R, Mkisi R, Gordon S, Morgan W, Muhib F. Vaccine. 2023 Feb 17;41(8):1496-1502. doi: 10.1016/j.vaccine.2023.01.043. Epub 2023 Jan 27. PMID: 36710234

[Expanding opportunities to engineer mucosal vaccination with biomaterials.](#)

Freire Haddad H, Roe EF, Collier JH. Biomater Sci. 2023 Feb 28;11(5):1625-1647. doi: 10.1039/d2bm01694j. PMID: 36723064

[Safety of Dengue Vaccine?](#)

Biswal S, Patel SS, Rauscher M. Clin Infect Dis. 2023 Feb 18;76(4):771-772. doi: 10.1093/cid/ciac808. PMID: 36196620 Free PMC article. No abstract available.

□ 19

[Broad perspectives in understanding vaccine hesitancy and vaccine confidence: an introduction to the special issue.](#)

Baldwin AS, Tiro JA, Zimet GD. J Behav Med. 2023 Feb 21:1-8. doi: 10.1007/s10865-023-00397-8. Online ahead of print. PMID: 36802315

[Corrections Officers' and Sheriffs' Perceptions of COVID-19 Vaccine Operationalization.](#)

Kraus C, Guardado R, Wurcel AG. J Correct Health Care. 2023 Feb 20. doi: 10.1089/jchc.21.12.0133. Online ahead of print. PMID: 36809061

[Estimating COVID-19 vaccine uptake and its drivers among migrants, homeless and precariously housed people in France.](#)

Roederer T, Mollo B, Vincent C, Leduc G, Sayyad-Hilario J, Mosnier M, Vandentorren S. *Commun Med (Lond)*. 2023 Feb 20;3(1):30. doi: 10.1038/s43856-023-00257-1. PMID: 36801917

[COVID-19 vaccine attitudes and facilitators among people in Australia who inject drugs.](#)

Price O, Maher L, Dietze PM, Bruno R, Crawford S, Sutherland R, Salom C, Dore GJ, Peacock A. *Drug Alcohol Rev*. 2023 Feb 21. doi: 10.1111/dar.13621. Online ahead of print. PMID: 36802338

[Critical assessment of the impact of vaccine-type and immunity on the burden of COVID-19.](#)

Taboe HB, Asare-Baah M, Iboi EA, Ngonghala CN. *Math Biosci*. 2023 Feb 15:108981. doi: 10.1016/j.mbs.2023.108981. Online ahead of print. PMID: 36803672

[Antecedents to COVID-19 vaccine uptake among patients and employees in the Veterans Health Administration.](#)

LoBrutto LR, Elwy AR, Miano D, Ann Petrakis B, Kyriash A, Javier S, Erhardt T, Midboe AM, Carbonaro R, Jasuja GK, McInnes DK, Maguire EM, Asch SM, Gifford AL, Clayman ML. *Transl Behav Med*. 2023 Feb 28;13(2):73-84. doi: 10.1093/tbm/ibac085. PMID: 36448882

[A Path Forward: COVID-19 Vaccine Equity Community Education and Outreach Initiative.](#)

Irvin R, Venkataramani M, Galiatsatos P, Hitchcock JD, Hemphill N, Dearey M, Bigelow BF, Cooper LA, Molello NE, O'Connor KJ, Page KR, Golden SH. *Health Secur*. 2023 Feb 15. doi: 10.1089/hs.2022.0096. Online ahead of print. PMID: 36791317

[A MAPS Vaccine Induces Multipronged Systemic and Tissue-Resident Cellular Responses and Protects Mice against Mycobacterium tuberculosis.](#)

O'Hara JM, Wakabayashi S, Siddiqi N, Cheung E, Babunovic GH, Thompson CM, Lu YJ, Rubin EJ, Malley R, Zhang F. *mBio*. 2023 Feb 28;14(1):e0361122. doi: 10.1128/mbio.03611-22. Epub 2023 Feb 7. PMID: 36749098

[COVID-19 vaccines versus pediatric hospitalization.](#)

Rosa Duque JS, Leung D, Yip KM, Lee DHL, So HK, Wong WHS, Lau YL. *Cell Rep Med*. 2023 Feb 21;4(2):100936. doi: 10.1016/j.xcrm.2023.100936. Epub 2023 Jan 23. PMID: 36801010

[γδ T cell-mediated immune responses to malaria.](#)

Bayarsaikhan G, Ibraheem Y, Inoue SI. *Microbiol Immunol*. 2023 Feb 24. doi: 10.1111/1348-0421.13059. Online ahead of print. PMID: 36829293

[COVID-19 vaccine literacy: A scoping review.](#)

Biasio LR, Zanobini P, Lorini C, Monaci P, Fanfani A, Gallinoro V, Cerini G, Albora G, Del Riccio M, Pecorelli S, Bonaccorsi G. *Hum Vaccin Immunother*. 2023 Feb 15:2176083. doi: 10.1080/21645515.2023.2176083. Online ahead of print. PMID: 36794338

[Safety and efficacy of tuberculosis vaccine candidates in low- and middle-income countries: a systematic review of randomised controlled clinical trials.](#)

Wilson L, Gracie L, Kidy F, Thomas GN, Nirantharakumar K, Greenfield S, Manaseki-Holland S, Ward DJ, Gooden TE. *BMC Infect Dis*. 2023 Feb 24;23(1):120. doi: 10.1186/s12879-023-08092-4. PMID: 36829123

[SARS-CoV-2 Variant-Specific mRNA Vaccine: Pros and Cons.](#)

Shahsavandi S, Hariri AA. *Viral Immunol.* 2023 Feb 16. doi: 10.1089/vim.2022.0121. Online ahead of print. PMID: 36796002

[Efficacy and Safety of an Ad26.RSV.preF-RSV preF Protein Vaccine in Older Adults.](#)

Falsey AR, Williams K, Gymnopoulou E, Bart S, Ervin J, Bastian AR, Menten J, De Paepe E, Vandenberghe S, Chan EKH, Sadoff J, Douoguih M, Callendret B, Comeaux CA, Heijnen E; CYPRESS Investigators. *N Engl J Med.* 2023 Feb 16;388(7):609-620. doi: 10.1056/NEJMoa2207566. PMID: 36791161

[The Regulation of Nucleic Acid Vaccine Responses by the Microbiome.](#)

Johnson AMF, Hager K, Alameh MG, Van P, Potchen N, Mayer-Blackwell K, Fiore-Gartland A, Minot S, Lin PJC, Tam YK, Weissman D, Kublin JG. *bioRxiv.* 2023 Feb 19:2023.02.18.529093. doi: 10.1101/2023.02.18.529093. Preprint. PMID: 36824851

[Intranasal multivalent adenoviral-vectored vaccine protects against replicating and dormant M.tb in conventional and humanized mice.](#)

Afkhami S, D'Agostino MR, Vaseghi-Shanjani M, Lepard M, Yang JX, Lai R, Choi MWY, Chacon A, Zganiacz A, Franken KLMC, Ertl HC, Ottenhoff THM, Jeyanathan M, Gillgrass A, Xing Z. *NPJ Vaccines.* 2023 Feb 23;8(1):25. doi: 10.1038/s41541-023-00623-z. PMID: 36823425

[Humoral and cellular response after BNT162b2 vaccine booster in hemodialysis patients and kidney transplant recipients.](#)

De Cagna MR, Colucci V, Di Maggio A, Notaristefano N, Cianciotta F, Danza K, Salvatore F, Santoniccolo A, Lanzillotta SG, Perniola MA, Marangi AL, Morrone LFP, Tampoia M. *Clin Exp Nephrol.* 2023 Feb 16:1-9. doi: 10.1007/s10157-023-02317-1. Online ahead of print. PMID: 36795176

[An overview of the vaccine platforms to combat COVID-19 with a focus on the subunit vaccines.](#)

Bayani F, Hashkavaei NS, Arjmand S, Rezaei S, Uskoković V, Alijanianzadeh M, Uversky VN, Ranaei Siadat SO, Mozaffari-Jovin S, Sefidbakht Y. *Prog Biophys Mol Biol.* 2023 Feb 18;178:32-49. doi: 10.1016/j.pbiomolbio.2023.02.004. Online ahead of print. PMID: 36801471

[History of vaccine and immunization: Vaccine-hesitancy discussion in Germany in XIX century.](#)

Parodi A, Martini M. *Vaccine.* 2023 Feb 17:S0264-410X(23)00164-0. doi: 10.1016/j.vaccine.2023.02.029. Online ahead of print. PMID: 36803870

[Boosting compromised SARS-CoV-2-specific immunity with mRNA vaccination in liver transplant recipients.](#)

Luxenburger H, Reeg DB, Lang-Meli J, Reinscheid M, Eisner M, Bettinger D, Oberhardt V, Alizei ES, Wild K, Graeser A, Karl V, Sagar, Emmerich F, Klein F, Panning M, Huzly D, Bengsch B, Boettler T, Elling R, Thimme R, Hofmann M, Neumann-Haefelin C. *J Hepatol.* 2023 Feb 17:S0168-8278(23)00095-8. doi: 10.1016/j.jhep.2023.02.007. Online ahead of print. PMID: 36804404

[Enablers and barriers to COVID-19 vaccine uptake in an urban slum in Lagos, Nigeria: informing vaccine engagement strategies for the marginalized.](#)

Ozoh OB, Akinkugbe AO, Olukoya MA, Adetifa IMO. *Int Health.* 2023 Feb 17:ihad009. doi: 10.1093/inthealth/ihad009. Online ahead of print. PMID: 36799143

[Spillover of **Vaccine** Hesitancy into Adult COVID-19 and Influenza: The Role of Race, Religion, and Political Affiliation in the United States.](#)

Zhang V, Zhu P, Wagner AL. Int J Environ Res Public Health. 2023 Feb 15;20(4):3376. doi: 10.3390/ijerph20043376. PMID: 36834071

[Respiratory Syncytial Virus Prefusion F Protein **Vaccine** in Older Adults.](#)

Papi A, Ison MG, Langley JM, Lee DG, Leroux-Roels I, Martinon-Torres F, Schwarz TF, van Zyl-Smit RN, Campora L, Dezutter N, de Schrevel N, Fissette L, David MP, Van der Wielen M, Kostanyan L, Hulstrøm V; AReSVi-006 Study Group. N Engl J Med. 2023 Feb 16;388(7):595-608. doi: 10.1056/NEJMoa2209604. PMID: 36791160

[COVID-19 and Mixed Cryoglobulinemia Syndrome: Long-Term Survey Study on the Prevalence and Outcome, **Vaccine** Safety, and Immunogenicity.](#)

Gragnani L, Visentini M, Lorini S, Santini SA, Lauletta G, Mazzaro C, Urraro T, Quartuccio L, Cacciapaglia F, Ruscitti P, Tavoni A, Marri S, Cusano G, Petraccia L, Naclerio C, Treppo E, Del Frate G, Di Cola I, Raimondo V, Scorpiniti D, Monti M, Puccetti L, Elia G, Fallahi P, Basili S, Scarpato S, Iannone F, Casato M, Antonelli A, Zignego AL, Ferri C. J Clin Immunol. 2023 Feb 16:1-12. doi: 10.1007/s10875-023-01444-4. Online ahead of print. PMID: 36795264

[Effectiveness and safety of coronavirus disease 2019 vaccines.](#)

Shi T, Robertson C, Sheikh A. Curr Opin Pulm Med. 2023 Feb 27. doi: 10.1097/MCP.0000000000000948. Online ahead of print. PMID: 36825398

[COVID-19 **vaccine** hesitancy among pregnant women and their reported reasons for **vaccine** refusal - A prospective study in Tehran, Iran.](#)

Moini A, Rabiei M, Pirjani R, Abiri A, Maleki-Hajiagha A. Vaccine. 2023 Feb 17;41(8):1490-1495. doi: 10.1016/j.vaccine.2023.01.022. Epub 2023 Jan 16. PMID: 36707338

[Respiratory Syncytial Virus Infection: Treatments and Clinical Management.](#)

Malik S, Ahmad T, Muhammad K, Waheed Y. Vaccines (Basel). 2023 Feb 20;11(2):491. doi: 10.3390/vaccines11020491. PMID: 36851368

[HIV and COVID-19 Co-Infection: Epidemiology, Clinical Characteristics, and Treatment.](#)

Basoulis D, Mastrogianni E, Voutsinas PM, Psichogiou M. Viruses. 2023 Feb 20;15(2):577. doi: 10.3390/v15020577. PMID: 36851791

[Adverse Reactions of COVID-19 Vaccines: A Scoping Review of Observational Studies.](#)

Dhamanti I, Suwantika AA, Adlia A, Yamani LN, Yakub F. Int J Gen Med. 2023 Feb 20;16:609-618. doi: 10.2147/IJGM.S400458. eCollection 2023. PMID: 36845341

[Covid-19 **Vaccine** Acceptance and Uptake in Bangkok, Thailand: Cross-Sectional Survey via Social Media.](#)

Rommel C, Tuli G, Varrelman T, Han A, Angkab P, Kosiyaporn H, Netrpukdee C, Sorndamrih S, Thamarangsi T, Brownstein J, Astley C. JMIR Public Health Surveill. 2023 Feb 22. doi: 10.2196/40186. Online ahead of print. PMID: 36811852

[Vaccine Passports and Political Legitimacy: A Public Reason Framework for Policymakers.](#)

Barnhill A, Bonotti M, Susser D. Ethical Theory Moral Pract. 2023 Feb 15;1-21. doi: 10.1007/s10677-022-10361-1. Online ahead of print. PMID: 36816818

[Broad protective vaccination against systemic Escherichia coli with autotransporter antigens.](#)

Xing Y, Clark JR, Chang JD, Chirman DM, Green S, Zulk JJ, Jelinski J, Patras KA, Maresso AW. PLoS Pathog. 2023 Feb 17;19(2):e1011082. doi: 10.1371/journal.ppat.1011082. eCollection 2023 Feb. PMID: 36800400

[Vaccine properties of Brucella melitensis 16MΔwzm and reactivation of placental infection in pregnant sheep.](#)

Zabalza-Baranguá A, Poveda-Urkixo I, Mena-Bueno S, Ramírez GA, De Bolle X, Grilló MJ. Vaccine. 2023 Feb 24;41(9):1554-1566. doi: 10.1016/j.vaccine.2023.01.017. Epub 2023 Jan 16. PMID: 36653223

[Health Belief Model and parents' acceptance of the Pfizer-BioNTech and Sinopharm COVID-19 vaccine for children aged 5-18 years Old: A national survey.](#)

Vatcharavongvan P, Boonyanitchayakul N, Khampachuea P, Sinturong I, Prasert V. Vaccine. 2023 Feb 17;41(8):1480-1489. doi: 10.1016/j.vaccine.2023.01.029. Epub 2023 Jan 23. PMID: 36707336

[Safety and immunogenicity of a 20-valent pneumococcal conjugate vaccine coadministered with quadrivalent influenza vaccine: A phase 3 randomized trial.](#)

Cannon K, Cardona JF, Yacisin K, Thompson A, Belanger TJ, Lee DY, Peng Y, Moyer L, Ginis J, Gruber WC, Scott DA, Watson W. Vaccine. 2023 Feb 22:S0264-410X(22)01459-1. doi: 10.1016/j.vaccine.2022.11.046. Online ahead of print. PMID: 36828719

[Evaluation of vaccine storage and distribution practices in rural healthcare facilities in Kenya.](#)

Sinnei DK, Karimi PN, Maru SM, Karengera S, Bizimana T. J Pharm Policy Pract. 2023 Feb 21;16(1):25. doi: 10.1186/s40545-023-00535-2. PMID: 36810145

[Immunoinformatics design of multi-epitope vaccine using OmpA, OmpD and enterotoxin against non-typhoidal salmonellosis.](#)

Beikzadeh B. BMC Bioinformatics. 2023 Feb 24;24(1):63. doi: 10.1186/s12859-023-05183-6. PMID: 36823524

[Messenger RNA Vaccine in Mother's Milk.](#)

Nelson JM, Fleming-Dutra KE, Meaney-Delman D. JAMA Pediatr. 2023 Feb 20. doi: 10.1001/jamapediatrics.2022.6024. Online ahead of print. PMID: 36805617

[Messenger RNA Vaccine in Mother's Milk.](#)

Davanzo R. JAMA Pediatr. 2023 Feb 20. doi: 10.1001/jamapediatrics.2022.6021. Online ahead of print. PMID: 36805160

[The Confounding Effect of Vaccine Status.](#)

Hsu CK, Lai CC. Clin Infect Dis. 2023 Feb 18;76(4):774. doi: 10.1093/cid/ciac770. PMID: 36111405

[Comparative effectiveness of BNT162b2 and ChAdOx1 nCoV-19 vaccines against COVID-19.](#)

Wei J, Zhang W, Doherty M, Wallace ZS, Sparks JA, Lu N, Li X, Zeng C, Lei G, Zhang Y. BMC Med. 2023 Feb 28;21(1):78. doi: 10.1186/s12916-023-02795-w. PMID: 36855108

[When to update COVID-19 vaccine composition.](#)

Grant R, Sacks JA, Abraham P, Chunsuttiwat S, Cohen C, Figueroa JP, Fleming T, Fine P, Goldblatt D, Hasegawa H, MacIntyre CR, Memish ZA, Miller E, Nishioka S, Sall AA, Sow S, Tomori O, Wang Y, Van Kerkhove MD, Wambo MA, Cohen HA, Mesfin S, Otieno JR, Subissi L, Briand S, Wentworth DE, Subbarao K. Nat Med. 2023 Feb 20. doi: 10.1038/s41591-023-02220-y. Online ahead of print. PMID: 36807683

[Global trends in poliomyelitis research over the past 20 years: A bibliometric analysis.](#)

Liu Q, Liu Z, Huang B, Teng Y, Li M, Peng S, Guo H, Wang M, Liang J, Zhang Y. Hum Vaccin Immunother. 2023 Feb 20:2173905. doi: 10.1080/21645515.2023.2173905. Online ahead of print. PMID: 36803526

[One Year of COVID-19 Vaccine Misinformation on Twitter: Longitudinal Study.](#)

Pierri F, DeVerna MR, Yang KC, Axelrod D, Bryden J, Menczer F. J Med Internet Res. 2023 Feb 24;25:e42227. doi: 10.2196/42227. PMID: 36735835

[Cellular and humoral immunity to Ebola Zaire glycoprotein and viral vector proteins following immunization with recombinant vesicular stomatitis virus-based Ebola vaccine \(rVSVΔG-ZEBOV-GP\).](#)

Raabe V, Lai L, Morales J, Xu Y, Roupheal N, Davey RT, Mulligan MJ. Vaccine. 2023 Feb 17;41(8):1513-1523. doi: 10.1016/j.vaccine.2023.01.059. Epub 2023 Jan 31. PMID: 36725433

[Demographic Determinants and Geographical Variability of COVID-19 Vaccine Hesitancy in Underserved Communities.](#)

Matas JL, Landry LG, Lee L, Hansel S, Coudray MS, Mata-McMurry LV, Chalasani N, Xu L, Stair T, Edwards C, Puckrein G, Meyer W, Wiltz G, Sampson M, Gregerson P, Barron C, Marable J, Akinboboye O, Il'yasova D. JMIR Public Health Surveill. 2023 Feb 22. doi: 10.2196/34163. Online ahead of print. PMID: 36811869

[Safety and immunogenicity of the anti-cocaine vaccine UFMG-VAC-V4N2 in a non-human primate model.](#)

Sabato B, Augusto PSA, Lima Gonçalves Pereira R, Coutinho Batista Esteves F, Caligorne SM, Rodrigues Dias Assis B, Apolo Correia Marcelino S, Pires do Espírito Santo L, Dias Dos Reis K, Da Silva Neto L, Goulart G, de Fátima Â, Pierezan F, Toshio Fujiwara R, Castro M, Garcia F. Vaccine. 2023 Feb 21:S0264-410X(23)00166-4. doi: 10.1016/j.vaccine.2023.02.031. Online ahead of print. PMID: 36822966

[Bidirectional and persistent immunomodulation of Astragalus polysaccharide as an adjuvant of influenza and recombinant SARS-CoV-2 vaccine.](#)

Zhao D, Chen X, Wang L, Zhang J, Zhao Z, Yue N, Zhu Y, Fei W, Li X, Tan L, He W. Int J Biol Macromol. 2023 Feb 16;234:123635. doi: 10.1016/j.ijbiomac.2023.123635. Online ahead of print. PMID: 36801224

[Analysis of COVID-19 vaccine adverse event using language model and unsupervised machine learning.](#)

Cheon S, Methiyothin T, Ahn I. PLoS One. 2023 Feb 21;18(2):e0282119. doi: 10.1371/journal.pone.0282119. eCollection 2023. PMID: 36802407

[A Review of the Data Supporting Use of COVID-19 Vaccinations in the Pediatric Population.](#)

Stultz JS, Eiland LS. Ann Pharmacother. 2023 Feb 27;10600280231156625. doi: 10.1177/10600280231156625. Online ahead of print. PMID: 36847285

[Computer-aided discovery of potent broad-spectrum vaccine adjuvants.](#)

Ma J, Wang S, Zhao C, Yan X, Ren Q, Dong Z, Qiu J, Liu Y, Shan Q, Xu M, Yan B, Liu S. Angew Chem Int Ed Engl. 2023 Feb 23:e202301059. doi: 10.1002/anie.202301059. Online ahead of print. PMID: 36815280

[SARS-CoV-2 nucleocapsid: Biological functions and implication for disease diagnosis and vaccine design.](#)

Maghsood F, Ghorbani A, Yadegari H, Golsaz-Shirazi F, Amiri MM, Shokri F. Rev Med Virol. 2023 Feb 15:e2431. doi: 10.1002/rmv.2431. Online ahead of print. PMID: 36790816

[Barriers and facilitators in uptake of human papillomavirus vaccine across English Canada: A review.](#)

Khan A, Abonyi S, Neudorf C. Hum Vaccin Immunother. 2023 Feb 20:2176640. doi: 10.1080/21645515.2023.2176640. Online ahead of print. PMID: 36803510

[An analysis of the knowledge of adults aged between 18 and 45 on HPV along with their attitudes and beliefs about HPV vaccine: the Cyprus case.](#)

Yarıcı F, Mammadov B. BMC Womens Health. 2023 Feb 16;23(1):70. doi: 10.1186/s12905-023-02217-2. PMID: 36793099

[A review of neurological side effects of COVID-19 vaccination.](#)

Hosseini R, Askari N. Eur J Med Res. 2023 Feb 25;28(1):102. doi: 10.1186/s40001-023-00992-0. PMID: 36841774

[Influenza and pneumococcal vaccine prescription for adults during COVID-19 first wave in three regions of Argentina.](#)

Matta MG, Pulido L, Herrera-Paz JJ, Picco JM, Wolff S, Tse G, Garcia-Zamora S. Vaccine. 2023 Feb 24;41(9):1541-1544. doi: 10.1016/j.vaccine.2023.01.056. Epub 2023 Jan 27. PMID: 36725429

[Trimeric, APC-Targeted Subunit Vaccines Protect Mice against Seasonal and Pandemic Influenza.](#)

Tjärnhage E, Brown D, Bogen B, Andersen TK, Grødeland G. J Virol. 2023 Feb 28;97(2):e0169422. doi: 10.1128/jvi.01694-22. Epub 2023 Jan 31. PMID: 36719241

[Accuracy-sensitisation promotes the sharing of pro- \(but not anti-\) vaccine information.](#)

Saling LL, Phillips JG, Cohen DB. Psychol Health. 2023 Feb 23:1-15. doi: 10.1080/08870446.2023.2179053. Online ahead of print. PMID: 36815337

[Engineered Norovirus-Derived Nanoparticles as a Plug-and-Play Cancer Vaccine Platform.](#)

Zheng P, Yang Y, Fu Y, He J, Hu Y, Zheng X, Duan B, Wang M, Liu Q, Li W, Li D, Yang Y, Yang Z, Yang X, Huang W, Ma Y. ACS Nano. 2023 Feb 28;17(4):3412-3429. doi: 10.1021/acsnano.2c08840. Epub 2023 Feb 13. PMID: 36779845

[\[Infections of the spinal cord and adjacent structures\].](#)

Pfausler B, Rass V, Lindner A. Nervenarzt. 2023 Feb 23:1-8. doi: 10.1007/s00115-023-01439-x. Online ahead of print. PMID: 36820856

[Risk of retinal vein occlusion following COVID-19 vaccination: a self-controlled case series.](#)

Pellegrini M, Carnevali A, Fiore T, Cagini C, De Palma A, Fontana L, Lupardi E, Cassini F, Bacherini D, Giansanti F, Giannaccare G, Scordia V, Vaccaro S, Ciarmatori N, D'Angelo S, Parmeggiani F, Mura M. Eye (Lond). 2023 Feb 22;1-4. doi: 10.1038/s41433-023-02459-2. Online ahead of print. PMID: 36813998

[Immunogenicity of two doses of inactive COVID-19 vaccine and third booster dose mRNA vaccine in patients with cancer receiving active systemic therapy.](#)

Guyen DC, Incesu FGG, Yildirim HC, Erul E, Chalabiyev E, Aktas BY, Yuce D, Arik Z, Kilickap S, Aksoy S, Erman M, Hayran KM, Unal S, Alp A, Dizdar O. Int J Cancer. 2023 Feb 15;152(4):679-685. doi: 10.1002/ijc.34280. Epub 2022 Sep 23. PMID: 36082448

[Acute Myocarditis and Pericarditis After m-RNA COVID-19 Vaccinations-A Single-Centre Retrospective Analysis.](#)

Wassif M, Lo P, Satouris P, Swan L, Tardo D, Kovacic JC, Muller D, Muthiah K, Kotlyar E, Bart NK. Heart Lung Circ. 2023 Feb 23:S1443-9506(23)00029-X. doi: 10.1016/j.hlc.2023.01.002. Online ahead of print. PMID: 36841638

[COVID-19 vaccination among different types of US Healthcare Personnel.](#)

Dudley MZ, Schuh HB, Shaw J, Rimal RN, Harvey SA, Balgobin KR, Zapf AJ, Salmon DA. Vaccine. 2023 Feb 17;41(8):1471-1479. doi: 10.1016/j.vaccine.2023.01.030. Epub 2023 Jan 20. PMID: 36707335

[The quest for an HIV-1 vaccine: will mRNA deliver us from evil?](#)

Lusso P. Expert Rev Vaccines. 2023 Feb 24. doi: 10.1080/14760584.2023.2184803. Online ahead of print. PMID: 36825464

[Reasons for refusal of the human papillomavirus vaccine among young cancer survivors.](#)

Cherven B, Klosky JL, Keith KE, Hudson MM, Bhatia S, Landier W. Cancer. 2023 Feb 15;129(4):614-623. doi: 10.1002/cncr.34521. Epub 2022 Dec 19. PMID: 36530157

[The CONFIDENT study protocol: a randomized controlled trial comparing two methods to increase long-term care worker confidence in the COVID-19 vaccines.](#)

Stevens G, Johnson LC, Saunders CH, Schmidt P, Sierpe A, Thomeer RP, Little NR, Cantrell M, Yen RW, Pogue JA, Holahan T, Schubbe DC, Forcino RC, Fillbrook B, Sheppard R, Wooten C, Goldmann D, O'Malley AJ, Dubé E, Durand MA, Elwyn G. BMC Public Health. 2023 Feb 23;23(1):384. doi: 10.1186/s12889-023-15266-x. PMID: 36823559

[Parental acceptance of and preferences for administration of routine varicella vaccination in the UK: A study to inform policy.](#)

Sherman SM, Lingley-Heath N, Lai J, Sim J, Bedford H. Vaccine. 2023 Feb 17;41(8):1438-1446. doi: 10.1016/j.vaccine.2023.01.027. Epub 2023 Jan 29. PMID: 36796935

[Evaluation of patients of vaccine side effects after the COVID-19 vaccine.](#)

Gedik MS, Kilci Aİ, Hakkoymaz H, Küçük ÖF, Solak Y, Basan NM, Çıkrıkçı YE. Rev Assoc Med Bras (1992). 2023 Feb 17;69(1):147-152. doi: 10.1590/1806-9282.20221035. eCollection 2023. PMID: 36820721

[Shigellosis in Southeast Asia: A systematic review and meta-analysis.](#)

Muzembo BA, Kitahara K, Mitra D, Ohno A, Khatiwada J, Dutta S, Miyoshi SI. *Travel Med Infect Dis.* 2023 Feb 16;52:102554. doi: 10.1016/j.tmaid.2023.102554. Online ahead of print. PMID: 36792021

[Cholera vaccine and mass gatherings: protecting the crowds.](#)

Farahat RA, Khan SH, Benson F, Heymann DL, Memish ZA. *J Travel Med.* 2023 Feb 18;30(1):taad010. doi: 10.1093/jtm/taad010. PMID: 36715147

[Efficacy of polyvalent vaccine on immune response and disease resistance against streptococcosis/lactococcosis and yersiniosis in rainbow trout \(*Oncorhynchus mykiss*\).](#)

Erfanmanesh A, Beikzadeh B, Khanzadeh M. *Vet Res Commun.* 2023 Feb 21. doi: 10.1007/s11259-023-10081-6. Online ahead of print. PMID: 36809599

[Optimal age targeting for pneumococcal vaccination in older adults; a modelling study.](#)

Thindwa D, Clifford S, Kleynhans J, von Gottberg A, Walaza S, Meiring S, Swarthout TD, Miller E, McIntyre P, Andrews N, Amin-Chowdhury Z, Fry N, Jambo KC, French N, Almeida SCG, Ladhani SN, Heyderman RS, Cohen C, de Cunto Brandileone MC, Flasche S. *Nat Commun.* 2023 Feb 16;14(1):888. doi: 10.1038/s41467-023-36624-8. PMID: 36797259

[Is Vaccination Against COVID-19 Associated With Inflammatory Bowel Disease Flare? Self-Controlled Case Series Analysis Using the UK CPRD.](#)

Card TR, Nakafero G, Grainge MJ, Mallen CD, Van-Tam JSN, Williams HC, Abhishek A. *Am J Gastroenterol.* 2023 Feb 22. doi: 10.14309/ajg.0000000000002205. Online ahead of print. PMID: 36826512

[Impact of nutraceuticals on immunomodulation against viral infections-A review during COVID-19 pandemic in Indian scenario.](#)

Nathan J, Shameera R, Ramachandran A. *J Biochem Mol Toxicol.* 2023 Feb 17:e23320. doi: 10.1002/jbt.23320. Online ahead of print. PMID: 36799127

[Optimal Epidemic Control under Uncertainty: Tradeoffs between Information Collection and Other Actions.](#)

Flaig J, Houy N. *Med Decis Making.* 2023 Feb 27:272989X231158295. doi: 10.1177/0272989X231158295. Online ahead of print. PMID: 36843493

[Identification of novel neutralizing determinants for protection against HCV.](#)

Alzua GP, Pihl AF, Offersgaard A, Velázquez-Moctezuma R, Duarte Hernandez CR, Augestad EH, Fahnøe U, Mathiesen CK, Krarup H, Law M, Prentoe J, Bukh J, Gottwein JM. *Hepatology.* 2023 Mar 1;77(3):982-996. doi: 10.1002/hep.32772. Epub 2023 Feb 17. PMID: 36056620

[Comparison of the replication and neutralization of different SARS-CoV-2 Omicron subvariants in vitro.](#)

Zhang Y, Lv Q, Qi F, Li F, Deng R, Liang X, Liu M, Yan Y, Bao L. *Animal Model Exp Med.* 2023 Feb 20. doi: 10.1002/ame2.12302. Online ahead of print. PMID: 36808904

[Evolution of Public Attitudes and Opinions Regarding COVID-19 Vaccination During the Vaccine Campaign in China: Year-Long Infodemiology Study of Weibo Posts.](#)

Hong Y, Xie F, An X, Lan X, Liu C, Yan L, Zhang H. *J Med Internet Res.* 2023 Feb 16;25:e42671. doi: 10.2196/42671. PMID: 36795467

[Peptide Vaccine Against ADAMTS-7 Ameliorates Atherosclerosis and Postinjury Neointima Hyperplasia.](#)

Ma Z, Mao C, Chen X, Yang S, Qiu Z, Yu B, Jia Y, Wu C, Wang Y, Wang Y, Gu R, Yu F, Yin Y, Wang X, Xu Q, Liu C, Liao Y, Zheng J, Fu Y, Kong W. *Circulation*. 2023 Feb 28;147(9):728-742. doi: 10.1161/CIRCULATIONAHA.122.061516. Epub 2022 Dec 23. PMID: 36562301

[Application of microfluidic technologies on COVID-19 diagnosis and drug discovery.](#)

Lin Z, Zou Z, Pu Z, Wu M, Zhang Y. *Acta Pharm Sin B*. 2023 Feb 24. doi: 10.1016/j.apsb.2023.02.014. Online ahead of print. PMID: 36855672

[Typhoid Fever Surveillance, Incidence Estimates, and Progress Toward Typhoid Conjugate Vaccine Introduction - Worldwide, 2018-2022.](#)

Hancuh M, Walldorf J, Minta AA, Tevi-Benissan C, Christian KA, Nedelec Y, Heitzinger K, Mikoleit M, Tiffany A, Bentsi-Enchill AD, Breakwell L. *MMWR Morb Mortal Wkly Rep*. 2023 Feb 17;72(7):171-176. doi: 10.15585/mmwr.mm7207a2. PMID: 36795626

[Education increases COVID-19 vaccine uptake among people in Canadian federal prisons in a prospective randomized controlled trial: The EDUCATE study.](#)

Zolotarova T, Dussault C, Park H, Varsaneux O, Basta NE, Watson L, Robert P, Davis S, Mercer M, Timmerman S, Bransfield M, Minhas M, Kempis R, Kronfli N. *Vaccine*. 2023 Feb 17;41(8):1419-1425. doi: 10.1016/j.vaccine.2023.01.040. Epub 2023 Jan 23. PMID: 36697314

[Evaluating methods to create protein functionalized cationic vesicles.](#)

Zayka P, Parr B, Robichaud H, Hickey S, Topping A, Holt E, Watts DBE, Soto N, Stein DC, DeShong P, Hurley M. *Soft Matter*. 2023 Feb 15;19(7):1429-1439. doi: 10.1039/d2sm01205g. PMID: 36723251

[RT-qPCR genotyping assays for differentiating Rift Valley fever phlebovirus strains.](#)

Balaraman V, Gaudreault NN, Trujillo JD, Indran SV, Wilson WC, Richt JA. *J Virol Methods*. 2023 Feb 16;315:114693. doi: 10.1016/j.jviromet.2023.114693. Online ahead of print. PMID: 36801236

[Self-administration of a Salmonella vaccine by domestic pigs.](#)

Robbins RC, Archer C, Giménez-Lirola LG, Mora-Díaz JC, McGlone JJ. *Sci Rep*. 2023 Feb 20;13(1):2972. doi: 10.1038/s41598-023-29987-x. PMID: 36806288

[Varicella-Zoster Virus Prevalence among Pregnant Women: A European Epidemiological Review.](#)

Bertelli A, Carta V, Mangeri L, Caruso A, De Francesco MA. *Life (Basel)*. 2023 Feb 20;13(2):593. doi: 10.3390/life13020593. PMID: 36836948

[Incidence determinants and serological correlates of reactive symptoms following SARS-CoV-2 vaccination.](#)

Holt H, Jolliffe DA, Talaei M, Faustini S, Vivaldi G, Greenig M, Richter AG, Lyons RA, Griffiths CJ, Kee F, Sheikh A, Davies GA, Shaheen SO, Martineau AR. *NPJ Vaccines*. 2023 Feb 25;8(1):26. doi: 10.1038/s41541-023-00614-0. PMID: 36841835

[Therapeutic and vaccine-induced cross-reactive antibodies with effector function against emerging Omicron variants.](#)

Addetia A, Piccoli L, Case JB, Park YJ, Beltramello M, Guarino B, Dang H, Pinto D, Scheaffer S, Sprouse K, Bassi J, Silacci-Fregni C, Muoio F, Dini M, Vincenzetti L, Acosta R, Johnson D, Subramanian S, Saliba C, Giurdanella M, Lombardo G, Leoni G, Culap K, McAlister C, Rajesh A, Dellota E, Zhou J, Farhat N, Bohan D, Noack J, Lempp FA, Camerone E, Whitener B, Giannini O, Ceschi A, Ferrari P, Franzetti-Pellanda A, Biggiogero M, Garzoni C, Zappi S, Bernasconi L, Kim MJ, Schnell G, Czudnochowski N, Franko N, Logue JK, Yoshiyama C, Stewart C, Chu H, Schmid MA, Purcell LA, Snell G, Lanzavecchia A, Diamond M, Corti D, Veesler D. bioRxiv. 2023 Feb 27:2023.01.17.523798. doi: 10.1101/2023.01.17.523798. Preprint. PMID: 36711984

[Cationic Nanoparticle-Stabilized Vaccine Delivery System for the H9N2 Vaccine to Promote Immune Response in Chickens.](#)

Zhang Y, Zhu T, Xu S, Gu P, Cai G, Peng S, Liu Z, Yang Y, Hu Y, Liu J, Wang D. Mol Pharm. 2023 Feb 16. doi: 10.1021/acs.molpharmaceut.2c00805. Online ahead of print. PMID: 36795759

[ChatGPT Output Regarding Compulsory Vaccination and COVID-19 Vaccine Conspiracy: A Descriptive Study at the Outset of a Paradigm Shift in Online Search for Information.](#)

Sallam M, Salim NA, Al-Tammemi AB, Barakat M, Fayyad D, Hallit S, Harapan H, Hallit R, Mahafzah A. Cureus. 2023 Feb 15;15(2):e35029. doi: 10.7759/cureus.35029. eCollection 2023 Feb. PMID: 36819954

[VelcroVax: a "Bolt-On" Vaccine Platform for Glycoprotein Display.](#)

Kingston NJ, Grehan K, Snowden JS, Hassall M, Alzahrani J, Paesen GC, Sherry L, Hayward C, Roe A, Stephen S, Tomlinson D, Zeltina A, Doores KJ, Ranson NA, Stacey M, Page M, Rose NJ, Bowden TA, Rowlands DJ, Stonehouse NJ. mSphere. 2023 Feb 21;8(1):e0056822. doi: 10.1128/msphere.00568-22. Epub 2023 Jan 31. PMID: 36719225

[Vaccine hesitancy in cancer patients: A rapid review.](#)

Butow P, Shaw J, Bartley N, Milch V, Sathiaraj R, Turnbull S, Der Vartanian C. Patient Educ Couns. 2023 Feb 24;111:107680. doi: 10.1016/j.pec.2023.107680. Online ahead of print. PMID: 36842287

[The shift to one-dose HPV vaccination: Where does this leave women living with HIV?](#)

McClymont E, Money D. Int J Gynaecol Obstet. 2023 Feb 20. doi: 10.1002/ijgo.14713. Online ahead of print. PMID: 36807125

[Messenger RNA Vaccine in Mother's Milk-Reply.](#)

Hanna N, Clauss C, Krilov LR. JAMA Pediatr. 2023 Feb 20. doi: 10.1001/jamapediatrics.2022.6018. Online ahead of print. PMID: 36804769

[Prevalence, determinants, and reasons for malaria vaccine hesitancy among caregivers of under-five children in Nigeria: Results from a nationwide cross-sectional survey.](#)

Kabir Sulaiman S, Isma'il Tsiga-Ahmed F, Sale Musa M, Kabir Sulaiman A, Muhammad Dayyab F, Ab Khan M, Idris Ahmad S, Abasi-Okot Akpan U, Ibrahim Usman U, Tjjani Bako A. Vaccine. 2023 Feb 17;41(8):1503-1512. doi: 10.1016/j.vaccine.2023.01.060. Epub 2023 Jan 31. PMID: 36725434

[Safety and immunogenicity of a protein subunit COVID-19 vaccine \(ZF2001\) in healthy children and adolescents aged 3-17 years in China: a randomised, double-blind, placebo-controlled, phase 1 trial and an open-label, non-randomised, non-inferiority, phase 2 trial.](#)

Gao L, Li Y, He P, Chen Z, Yang H, Li F, Zhang S, Wang D, Wang G, Yang S, Gong L, Ding F, Ling M, Wang X, Ci L, Dai L, Gao GF, Huang T, Hu Z, Ying Z, Sun J, Zuo X. Lancet Child Adolesc Health. 2023 Feb 17:S2352-4642(22)00376-5. doi: 10.1016/S2352-4642(22)00376-5. Online ahead of print. PMID: 36803632

[Vaccine effectiveness of recombinant and standard dose influenza vaccines against outpatient illness during 2018-2019 and 2019-2020 calculated using a retrospective test-negative design.](#)

Zimmerman RK, Dauer K, Clarke L, Nowalk MP, Raviotta JM, Balasubramani GK. Hum Vaccin Immunother. 2023 Feb 21:2177461. doi: 10.1080/21645515.2023.2177461. Online ahead of print. PMID: 36809982

[Using Location Intelligence to Evaluate the COVID-19 Vaccination Campaign in the United States: Spatiotemporal Big Data Analysis.](#)

Li Q, Peng JC, Mohan D, Lake B, Euler AR, Weir B, Kan L, Yang C, Labrique A. JMIR Public Health Surveill. 2023 Feb 16;9:e39166. doi: 10.2196/39166. PMID: 36626835

[Using the 5C model to understand COVID-19 vaccine hesitancy across a National and South Carolina sample.](#)

Rancher C, Moreland AD, Smith DW, Cornelison V, Schmidt MG, Boyle J, Dayton J, Kilpatrick DG. J Psychiatr Res. 2023 Feb 16;160:180-186. doi: 10.1016/j.jpsychires.2023.02.018. Online ahead of print. PMID: 36809746

[Parainfluenza virus 5 is a next-generation vaccine vector for human infectious pathogens.](#)

Wang T, Zheng L, Zhao Q, Yao Y, Zhou F, Wei F, Cai Q. J Med Virol. 2023 Feb 27. doi: 10.1002/jmv.28622. Online ahead of print. PMID: 36846910

[Nanovaccines for cancer immunotherapy: Focusing on complex formation between adjuvant and antigen.](#)

Hashemi Goradel N, Nemati M, Bakhshandeh A, Arashkia A, Negahdari B. Int Immunopharmacol. 2023 Feb 24;117:109887. doi: 10.1016/j.intimp.2023.109887. Online ahead of print. PMID: 36841155

[How does COVID-19 affect maternal and neonatal outcomes?](#)

Koç E, Dilli D. J Perinat Med. 2022 Dec 29;51(2):277-283. doi: 10.1515/jpm-2022-0509. Print 2023 Feb 23. PMID: 36580338

[mRNA vaccine effective against RSV respiratory disease.](#)

Carvalho T. Nat Med. 2023 Feb 15. doi: 10.1038/d41591-023-00017-7. Online ahead of print. PMID: 36792804

[Yeast-Based Virus-like Particles as an Emerging Platform for Vaccine Development and Delivery.](#)

Srivastava V, Nand KN, Ahmad A, Kumar R. Vaccines (Basel). 2023 Feb 18;11(2):479. doi: 10.3390/vaccines11020479. PMID: 36851356

[Cohort profile: A Québec-based plasma donor biobank to study COVID-19 immunity \(PlasCoV\).](#)

Germain M, Lewin A, Bazin R, Dieudé M, Perreault J, Boivin A, Grégoire Y, Renaud C. BMJ Open. 2023 Feb 23;13(2):e068803. doi: 10.1136/bmjopen-2022-068803. PMID: 36822809

[Antigenic mapping of enterovirus A71 from Taiwan and Southeast Asia.](#)

Cheng D, Huang SW, Tsai YH, Lien YY, Wang JR. Antiviral Res. 2023 Feb 22;212:105569. doi: 10.1016/j.antiviral.2023.105569. Online ahead of print. PMID: 36822369

[Hepatitis A Occurrence and Outbreaks in Europe Over the Past Two Decades: a Systematic Review.](#)

Andani A, Bunge E, Kassianos G, Eeuwijk J, Mellou K, Van Damme P, Mukherjee P, Steffen R. J Viral Hepat. 2023 Feb 24. doi: 10.1111/jvh.13821. Online ahead of print. PMID: 36825922

[Systems Biology Approaches for the Improvement of Oncolytic Virus-Based Immunotherapies.](#)

Tripodi L, Sasso E, Feola S, Coluccino L, Vitale M, Leoni G, Szomolay B, Pastore L, Cerullo V. Cancers (Basel). 2023 Feb 17;15(4):1297. doi: 10.3390/cancers15041297. PMID: 36831638

[Skin-Based Vaccination: A Systematic Mapping Review of the Types of Vaccines and Methods Used and Immunity and Protection Elicited in Pigs.](#)

Có-Rives I, Chen AY, Moore AC. Vaccines (Basel). 2023 Feb 16;11(2):450. doi: 10.3390/vaccines11020450. PMID: 36851328

[A Beta Strain-Based Spike Glycoprotein Vaccine Candidate Induces Broad Neutralization and Protection against SARS-CoV-2 Variants of Concern.](#)

Cao L, Guo J, Li H, Ren H, Xiao K, Zhang Y, Zhu S, Song Y, Zhao W, Wu D, Chen Z, Zhang Y, Xia B, Ji T, Yan D, Wang D, Yang Q, Zhou Y, Li X, Hou Z, Xu W. Microbiol Spectr. 2023 Feb 27:e0268722. doi: 10.1128/spectrum.02687-22. Online ahead of print. PMID: 36847495

[Can ChatGPT draft a research article? An example of population-level vaccine effectiveness analysis.](#)

Macdonald C, Adeloje D, Sheikh A, Rudan I. J Glob Health. 2023 Feb 17;13:01003. doi: 10.7189/jogh.13.01003. PMID: 36798998

[Chromosome-length genome assembly of Teladorsagia circumcincta - a globally important helminth parasite in livestock.](#)

Hassan SU, Chua EG, Paz EA, Tay CY, Greeff JC, Palmer DG, Dudchenko O, Aiden EL, Martin GB, Kaur P. BMC Genomics. 2023 Feb 15;24(1):74. doi: 10.1186/s12864-023-09172-0. PMID: 36792983

[COVID-19 Vaccine Uptake and Associated Factors in Sub-Saharan Africa: Evidence from a Community-Based Survey in Tanzania.](#)

Msuya SE, Manongi RN, Jonas N, Mtei M, Amour C, Mgongo MB, Bilakwate JS, Amour M, Kalolo A, Kapologwe N, Kengia J, Tinuga F, Ngalesoni F, Bakari AH, Kirakoya FB, Araya A, Mboya IB. Vaccines (Basel). 2023 Feb 17;11(2):465. doi: 10.3390/vaccines11020465. PMID: 36851342

[Targeting COVID-19 vaccine-hesitancy in college students: An audience-centered approach.](#)

Zhou Y, Li R, Shen L. J Am Coll Health. 2023 Feb 28:1-10. doi: 10.1080/07448481.2023.2180988. Online ahead of print. PMID: 36853986

[Facile Synthesis of Multifunctional Bioreducible Polymers for mRNA Delivery.](#)

Hickey JC, Hurst PJ, Patterson JP, Guan Z. Chemistry. 2023 Feb 24;29(12):e202203393. doi: 10.1002/chem.202203393. Epub 2023 Jan 24. PMID: 36469740

[COVID post-vaccination lymphadenopathy: a review of the use of fine needle aspiration cytology.](#)

Caputo A, Caleo A, Cozzolino I, Zeppa P, Ciancia G, Ciliberti V. *Cytopathology*. 2023 Feb 18. doi: 10.1111/cyt.13221. Online ahead of print. PMID: 36807950

[Children, vaccines, and financial incentives.](#)

Erdem O, Erdem S, Monson K. *Int J Health Econ Manag*. 2023 Feb 28:1-16. doi: 10.1007/s10754-023-09343-2. Online ahead of print. PMID: 36853572

[Identifying and Evaluating the Socioeconomic Factors of COVID Vaccine Hesitancy Through an Integrated Multicriteria Decision Analysis Approach.](#)

Ahmed W, Ali S, Waqas H, Asghar M, Erum N. *Glob Soc Welf*. 2023 Feb 22:1-9. doi: 10.1007/s40609-023-00268-9. Online ahead of print. PMID: 36846516

[SARS-CoV-2-reactive antibody waning, booster effect and breakthrough SARS-CoV-2 infection in hematopoietic stem cell transplant and cell therapy recipients at one year after vaccination.](#)

Piñana JL, Martino R, Vazquez L, López-Corral L, Pérez A, Chorão P, Avendaño-Pita A, Pascual MJ, Sánchez-Salinas A, Sanz-Linares G, Olave MT, Arroyo I, Tormo M, Villalon L, Conesa-Garcia V, Gago B, Terol MJ, Villalba M, Garcia-Gutierrez V, Cabero A, Hernández-Rivas JÁ, Ferrer E, García-Cadenas I, Teruel A, Navarro D, Cedillo Á, Sureda A, Solano C; Spanish Hematopoietic Stem Cell Transplantation and Cell Therapy Group (GETH-TC). *Bone Marrow Transplant*. 2023 Feb 28. doi: 10.1038/s41409-023-01946-0. Online ahead of print. PMID: 36854892

[Robust specific-RBD responses and neutralizing antibodies after ChAdOx1 nCoV-19 and CoronaVac vaccination in SARS-CoV-2 seropositive individuals.](#)

Fernandes ER, Taminato M, de Souza Apostolico J, Gabrielonni MC, Santos Lunardelli VA, Maricato JT, Andersen ML, Tufik S, Rosa DS. *J Allergy Clin Immunol Glob*. 2023 Feb 21:100083. doi: 10.1016/j.jacig.2023.100083. Online ahead of print. PMID: 36845213

[The effects of parent's health literacy and health beliefs on vaccine hesitancy.](#)

Zhang H, Chen L, Huang Z, Li D, Tao Q, Zhang F. *Vaccine*. 2023 Feb 21:S0264-410X(23)00161-5. doi: 10.1016/j.vaccine.2023.02.026. Online ahead of print. PMID: 36822968

[Susceptibility to Hepatitis B Virus Infection in Adults Living in Spain.](#)

Soriano V, Aguilera A, Benito R, González-Díez R, Miró E, Liendo P, Rodríguez-Díaz JC, Cabezas T, Richart A, Ramos JM, Barea L, Álvarez C, Treviño A, Gómez-Gallego F, Corral O, de Mendoza C. *Liver Int*. 2023 Feb 21. doi: 10.1111/liv.15548. Online ahead of print. PMID: 36809581

[COVID-19 Vaccination Preferences among non-Chinese migrants in Hong Kong: A Discrete Choice Experiment.](#)

Asim S, Wang K, Nichini E, Yip FF, Zhu L, Fung HCE, Zeng Y, Fang Z, Cheung AW, Wong E, Dong D, Yeoh EK. *JMIR Public Health Surveill*. 2023 Feb 23. doi: 10.2196/40587. Online ahead of print. PMID: 36848242

[Chimeric Hepatitis B core virus-like particles harboring SARS-CoV2 epitope elicit a humoral immune response in mice.](#)

Sazegari S, Akbarzadeh Niaki M, Afsharifar A, Niazi A, Derakhshandeh A, Moradi Vahdat M, Hemmati F, Eskandari MH. *Microb Cell Fact*. 2023 Feb 25;22(1):39. doi: 10.1186/s12934-023-02043-z. PMID: 36841778

[Using World Cafés to engage an Australian culturally and linguistically diverse community around human papillomavirus vaccination.](#)

Prokopovich K, Phillipson L, West Pitts L, Stanoevska B, Street J, Braunack-Mayer A. *Health Expect*. 2023 Feb 16. doi: 10.1111/hex.13703. Online ahead of print. PMID: 36798035

[Vesiculobullous and Other Cutaneous Manifestations of COVID-19 Vaccines: a Scoping and Narrative Review.](#)

Mahmood F, Cyr J, Li A, Lipson J, Pratt M, Beecker J. *J Cutan Med Surg*. 2023 Feb 15:12034754231156561. doi: 10.1177/12034754231156561. Online ahead of print. PMID: 36789514

[Reforms in China's Vaccine Administration-From the Perspective of New Governance Approach.](#)

Tang L, Zhang L. *Int J Environ Res Public Health*. 2023 Feb 16;20(4):3450. doi: 10.3390/ijerph20043450. PMID: 36834145

[Incidence of HPV-related cancers among males and females 15-34 years old in the US.](#)

Guo F, Adekanmbi V, Hsu CD, Berenson AB. *JNCI Cancer Spectr*. 2023 Feb 23:pkad016. doi: 10.1093/jncics/pkad016. Online ahead of print. PMID: 36821427

[COVID-19 Vaccination: Comparison of Attitudes, Decision-Making Processes, and Communication among Vaccinated and Unvaccinated Black Americans.](#)

Cunningham-Erves J, George W, Stewart EC, Footman A, Davis J, Sanderson M, Smalls M, Morris P, Clarkson K, Lee O, Brandt HM. *Int J Environ Res Public Health*. 2023 Feb 16;20(4):3481. doi: 10.3390/ijerph20043481. PMID: 36834175

[Executive summary. Diagnosis, treatment and prophylaxis of influenza virus infection. Consensus statement of the Spanish Society of Infectious Diseases and Clinical Microbiology \(SEIMC\), the Spanish Society of Pediatric Infectious Diseases \(SEIP\), the Spanish Association of Vaccinology \(AEV\), the Spanish Society of Family and Community Medicine \(SEMFYC\) and the Spanish Society of Preventive Medicine, Public Health and Health Management \(SEMPSPGS\).](#)

López-Medrano F, Alfayate S, Carratalà J, Chamorro-Camazón J, Cordero E, Cruz-Cañete M, Fernández-Prada M, García-Cenoz M, Marcos MÁ, Melón S, Moreno-Millán N, Onieva-García MÁ, Ortiz de Lejarazu R, Pérez-Martín JJ, Rodríguez-García J, Schwarz-Chavarri G, Tagarro-García A, van Esso-Arbolave D, Viasus D, Pumarola T. *An Pediatr (Engl Ed)*. 2023 Feb 20:S2341-2879(23)00028-5. doi: 10.1016/j.anpede.2023.01.012. Online ahead of print. PMID: 36813618

[Infection, Transmission, Pathogenesis and Vaccine Development against *Mycoplasma gallisepticum*.](#)

Mugunthan SP, Kannan G, Chandra HM, Paital B. *Vaccines (Basel)*. 2023 Feb 17;11(2):469. doi: 10.3390/vaccines11020469. PMID: 36851345

[Knowledge, attitudes and practices of health care workers in a cardiology department on influenza vaccination.](#)

Benedict Kpozehouen E, Arrudshivah B, Raina Macintyre C. *Vaccine*. 2023 Feb 15:S0264-410X(23)00112-3. doi: 10.1016/j.vaccine.2023.01.070. Online ahead of print. PMID: 36801083

[Short-term improvement of mental health after a COVID-19 vaccination.](#)

Chourpiliadis C, Lovik A, Kähler AK, Valdimarsdóttir UA, Frans EM, Nyberg F, Sullivan PF, Fang F. PLoS One. 2023 Feb 15;18(2):e0280587. doi: 10.1371/journal.pone.0280587. eCollection 2023. PMID: 36791070

[Trusted messengers and trusted messages: The role for community-based organizations in promoting COVID-19 and routine immunizations.](#)

Shen AK, Browne S, Srivastava T, Kornides ML, Tan ASL. Vaccine. 2023 Feb 16:S0264-410X(23)00180-9. doi: 10.1016/j.vaccine.2023.02.045. Online ahead of print. PMID: 36803894

[Antigenic diversity of type 1 polioviruses and its implications for the efficacy of polio vaccines.](#)

Kouivaskaia D, Mirochnitchenko O, Troy S, Chumakov K. Vaccine. 2023 Feb 22:S0264-410X(23)00052-X. doi: 10.1016/j.vaccine.2023.01.031. Online ahead of print. PMID: 36828716

[Adaptive metrics for an evolving pandemic A dynamic approach to area-level COVID-19 risk designations.](#)

Bilinski AM, Salomon JA, Hatfield LA. medRxiv. 2023 Feb 16:2023.02.15.23285969. doi: 10.1101/2023.02.15.23285969. Preprint. PMID: 36824769

[Parents' willingness to vaccinate their daughters with human papillomavirus vaccine and associated factors in Debretabor town, Northwest Ethiopia: A community-based cross-sectional study.](#)

Aragaw GM, Anteneh TA, Abiy SA, Bewota MA, Aynalem GL. Hum Vaccin Immunother. 2023 Feb 15:2176082. doi: 10.1080/21645515.2023.2176082. Online ahead of print. PMID: 36794293

[Recent advances in respiratory immunization: A focus on COVID-19 vaccines.](#)

He X, Chen X, Wang H, Du G, Sun X. J Control Release. 2023 Feb 17;355:655-674. doi: 10.1016/j.jconrel.2023.02.011. Online ahead of print. PMID: 36787821

[A chimeric vaccine targeting Pseudomonas aeruginosa virulence factors protects mice against lethal infection.](#)

Korpi F, Irajian G, Forouhi F, Mohammadian T. Microb Pathog. 2023 Feb 20:106033. doi: 10.1016/j.micpath.2023.106033. Online ahead of print. PMID: 36813005

[Association of a third vaccination with antibody levels and side reactions in essential workers: A prospective cohort study.](#)

Hamada H, Futamura M, Ito H, Yamamoto R, Yata K, Iwatani Y, Inoue H, Fukatsu N, Nagai H, Hasegawa Y. Vaccine. 2023 Feb 24;41(9):1632-1637. doi: 10.1016/j.vaccine.2023.01.050. Epub 2023 Feb 2. PMID: 36737319

[Vaccine- and Breakthrough Infection-Elicited Pre-Omicron Immunity More Effectively Neutralizes Omicron BA.1, BA.2, BA.4 and BA.5 Than Pre-Omicron Infection Alone.](#)

Santos da Silva E, Servais JY, Kohnen M, Arendt V, Gilson G, Staub T, Seguin-Devaux C, Perez-Bercoff D. Curr Issues Mol Biol. 2023 Feb 19;45(2):1741-1761. doi: 10.3390/cimb45020112. PMID: 36826057

[Myocarditis or Pericarditis Events After BNT162b2 Vaccination in Individuals Aged 12 to 17 Years in Ontario, Canada.](#)

Buchan SA, Alley S, Seo CY, Johnson C, Kwong JC, Nasreen S, Thampi N, Lu D, Harris TM, Calzavara A, Wilson SE. JAMA Pediatr. 2023 Feb 27:e226166. doi: 10.1001/jamapediatrics.2022.6166. Online ahead of print. PMID: 36848096

[Factor associated with SARS-CoV-2 vaccination serological efficacy in adolescents and adults with Down syndrome: data from an international, collaborative initiative of the Trisomy 21 Research Society](#)
[RUNNING TITLE: Factors determining COVID-19 vaccine efficacy in Down syndrome.](#)

Valentini D, Carfi A, Di Paola A, Yarci-Carrión A, Villani A, Real de Asúa D. J Infect. 2023 Feb 20:S0163-4453(23)00090-7. doi: 10.1016/j.jinf.2023.02.021. Online ahead of print. PMID: 36813120

[Immunization with matrix-, nucleoprotein and neuraminidase protects against H3N2 influenza challenge in pH1N1 pre-exposed pigs.](#)

Vatzia E, Feest K, McNee A, Manjegowda T, Carr BV, Paudyal B, Chrun T, Maze EA, Mccarron A, Morris S, Everett HE, MacLoughlin R, Salguero FJ, Lambe T, Gilbert SC, Tchilian E. NPJ Vaccines. 2023 Feb 15;8(1):19. doi: 10.1038/s41541-023-00620-2. PMID: 36792640

[VLPs containing stalk domain and ectodomain of matrix protein 2 of influenza induce protection in mice.](#)

Shi L, Long Y, Zhu Y, Dong J, Chen Y, Feng H, Sun X. Virol J. 2023 Feb 27;20(1):38. doi: 10.1186/s12985-023-01994-4. PMID: 36849974

[DEVELOPMENT AND VALIDATION OF LC-MS/MS METHODS FOR THE SIMULTANEOUS QUANTIFICATION OF SOFOSBUVIR AND ITS MAJOR METABOLITE \(GS-331007\) IN BLOOD PLASMA, CEREBROSPINAL, AND SEMINAL FLUID: APPLICATION TO A PILOT CLINICAL TRIAL WITH A FOCUS ON ZIKA.](#)

Vilhena LS, de Azevedo da Silva AC, da Silva DMD, Pinto DP, Coelho EF, de Araújo JFGM, da Silveira GPE, Pereira HM, de Sá Fernandes Vallim da Silva L, de Cássia Elias Estrela Marins R, Bortolini RG, Souza TML, Dos Santos VGV, de Assis Nascimento V, Amendoeira FC, da Fonseca LB. Biomed Chromatogr. 2023 Feb 16:e5606. doi: 10.1002/bmc.5606. Online ahead of print. PMID: 36797051

[Migrants in the Middle East and North Africa during the COVID-19 pandemic.](#)

Wickramage K, Ito C, Hilali M, Hargreaves S, Requena-Méndez A. J Travel Med. 2023 Feb 18;30(1):taab097. doi: 10.1093/jtm/taab097. PMID: 34195828

[Do Socioeconomic Disparities Matter? Unraveling the Impacts of Online Vaccine Misinformation on Vaccination Intention During the COVID-19 Pandemic in China.](#)

Lu J, Xiao Y. J Health Commun. 2023 Feb 28:1-11. doi: 10.1080/10810730.2023.2185320. Online ahead of print. PMID: 36855812

[Genetic analysis of infectious bronchitis virus \(IBV\) in vaccinated poultry populations over a period of 10 years.](#)

Vermeulen CJ, Dijkman R, de Wit JJS, Bosch BJ, Heesterbeek JAPH, van Schaik G. Avian Pathol. 2023 Feb 24:1-11. doi: 10.1080/03079457.2023.2177140. Online ahead of print. PMID: 36745131

[Overcoming vaccine hesitancy by multiplex social network targeting: An analysis of targeting algorithms and implications.](#)

Fügenschuh M, Fu F. ArXiv. 2023 Feb 15:arXiv:2302.07813v1. Preprint. PMID: 36824428

[Comparison of three dosing intervals for the primary vaccination of the SARS-CoV-2 mRNA Vaccine \(BNT162b2\) on magnitude, neutralization capacity and durability of the humoral immune response in health care workers: A prospective cohort study.](#)

Leong DP, Zhang A, Breznik JA, Clare R, Huynh A, Mushtaha M, Rangarajan S, Stacey H, Kim PY, Loeb M, Denburg JA, Mertz D, Chagla Z, Nazy I, Miller MS, Bowdish DME, Duong M. PLoS One. 2023 Feb 15;18(2):e0281673. doi: 10.1371/journal.pone.0281673. eCollection 2023. PMID: 36791069

[Beliefs in COVID-19 Vaccine Misinformation Among Unvaccinated Black Americans: Prevalence, Socio-Psychological Predictors, and Consequences.](#)

Wang Y, Thier K, Ntiri SO, Quinn SC, Adebamowo C, Nan X. Health Commun. 2023 Feb 15:1-13. doi: 10.1080/10410236.2023.2179711. Online ahead of print. PMID: 36794382

[Effectiveness of Different Vaccine Platforms in Reducing Mortality and Length of ICU Stay in Severe and Critical Cases of COVID-19 in the Omicron Variant Era: A National Cohort Study in Iran.](#)

Jamaati H, Karimi S, Ghorbani F, Panahi Y, Hosseini-Baharanchi FS, Hajmoradi M, Malek R, Noorali S, Mokhtari M, Khoundabi B, Sadr M, Mohamadnia A, Zahraei SM, Hashemian SM, Dastan F, Mortaz E, Tayeri K, Behtaj F, Vaezi H, Forouzanfar MM, Shafaghi S. J Med Virol. 2023 Feb 23. doi: 10.1002/jmv.28607. Online ahead of print. PMID: 36815507

[Peripheral facial palsy post SARS-CoV-2 vaccine: A regional pharmacovigilance cases series.](#)

Chamboux M, Simon C, Beau-Salinas F, Maurier A, Agier MS, Thillard EM, Largeau B, Jonville-Bera AP. Therapie. 2023 Feb 16:S0040-5957(23)00033-1. doi: 10.1016/j.therap.2023.02.005. Online ahead of print. PMID: 36849281

[mSphere of Influence: Pertussis Vaccination and Antibodies in Mothers and Infants.](#)

Portillo S. mSphere. 2023 Feb 21;8(1):e0000923. doi: 10.1128/msphere.00009-23. Epub 2023 Feb 2. PMID: 36728427

[Gene-encoded nanoparticle vaccine platforms for in vivo assembly of multimeric antigen to promote adaptive immunity.](#)

Tursi NJ, Xu Z, Kulp DW, Weiner DB. Wiley Interdiscip Rev Nanomed Nanobiotechnol. 2023 Feb 20:e1880. doi: 10.1002/wnan.1880. Online ahead of print. PMID: 36807845

[The function of \$\gamma\delta\$ T cells in humoral immune responses.](#)

Qiu L, Zhang Y, Zeng X. Inflamm Res. 2023 Feb 17. doi: 10.1007/s00011-023-01704-4. Online ahead of print. PMID: 36799949

[Vaccination against SARS-CoV-2 using extracellular blebs derived from spike protein-expressing dendritic cells.](#)

Young Chung J, Thone MN, Davies JE, Gach JS, Huw Davies D, Forthal DN, Kwon YJ. Cell Immunol. 2023 Feb 16;386:104691. doi: 10.1016/j.cellimm.2023.104691. Online ahead of print. PMID: 36822152

[Study on college students' willingness to inoculate COVID-19 vaccine based on bioinformatics and KAP analysis.](#)

Cao Z. Biotechnol Genet Eng Rev. 2023 Feb 25:1-16. doi: 10.1080/02648725.2023.2183314. Online ahead of print. PMID: 36841943

[COVID-19 risk perception, cognitive dissonance, and vaccine hesitancy.](#)

Equils O, Bakaj Berishaj A, Stice E, da Costa C. Hum Vaccin Immunother. 2023 Feb 27;2180217. doi: 10.1080/21645515.2023.2180217. Online ahead of print. PMID: 36852481

[A guide to current methodology and usage of reverse vaccinology towards in silico vaccine discovery.](#)

Goodswen SJ, Kennedy PJ, Ellis JT. FEMS Microbiol Rev. 2023 Feb 20:fuad004. doi: 10.1093/femsre/fuad004. Online ahead of print. PMID: 36806618

[Phase II randomized, double blind, placebo controlled, clinical trial of safety and immunogenicity of an inactivated SARS-CoV-2 vaccine FAKHRAVAC in adults aged 18-70 years.](#)

Gholami F, Hamidi Farahani R, Karimi Rahjerdi A, Ahi M, Sheidaei A, Gohari K, Rahimi Z, Ansarifar A, Basiri P, Moradi M, Jahangiri A, Naderi K, Ghasemi S, Khatami P, Honari M, Khodaverdloo S, Shooshtari M, Mehr Azin H, Moradi S, Shafaghi B, Allahyari H, Monazah A, Khodaei Poor A, Taghva Z, Bakhshande H, Karimi Nia M, Solaymani Dodaran M, Forooghizade M. BMC Infect Dis. 2023 Feb 24;23(1):118. doi: 10.1186/s12879-023-08079-1. PMID: 36829111

[What are the key pediatric public policy priorities as the COVID-19 pandemic persists?](#)

Schleiss MR, Permar SR, John CC. Pediatr Res. 2023 Feb 25;1-5. doi: 10.1038/s41390-023-02529-x. Online ahead of print. PMID: 36841882

[Vaccine Hesitancy Among Canadian Mothers: Differences in Attitudes Towards a Pediatric COVID-19 Vaccine Among Women Who Experience Intimate Partner Violence.](#)

Davidson CA, Jackson KT, Kennedy K, Stoyanovich E, Mantler T. Matern Child Health J. 2023 Feb 17:1-9. doi: 10.1007/s10995-023-03610-x. Online ahead of print. PMID: 36800061

[COVID-19 Vaccination Perception and Acceptance Among Female Medical and Nursing Students at Al-Azhar University, Egypt.](#)

Abd Elgalil HM, Elsheikh AA, Ahmed DS, Ahmed AM, Mohamed SS. Infect Drug Resist. 2023 Feb 21;16:1069-1079. doi: 10.2147/IDR.S390996. eCollection 2023. PMID: 36852305

[Acceptance, Advocacy, and Perception of Health Care Providers on COVID-19 Vaccine: Comparing Early Stage of COVID-19 Vaccination with Latter Stage in the Eastern Region of Saudi Arabia.](#)

Almusalami EM, Al-Bazroun MI, Alhasawi AI, Alahmed FS, Al-Muslim ZM, Al-Bazroun LI, Muslim M, Saha C, Kay E, Alzahrani ZA, Ahmed GY, Al Mutair A. Vaccines (Basel). 2023 Feb 20;11(2):488. doi: 10.3390/vaccines11020488. PMID: 36851365

[SARS-CoV-2 S Glycoprotein Stabilization Strategies.](#)

Pedenko B, Sulbaran G, Guilligay D, Effantin G, Weissenhorn W. Viruses. 2023 Feb 17;15(2):558. doi: 10.3390/v15020558. PMID: 36851772

[Interim Estimates of 2022-23 Seasonal Influenza Vaccine Effectiveness - Wisconsin, October 2022-February 2023.](#)

McLean HQ, Petrie JG, Hanson KE, Meece JK, Rolfes MA, Sylvester GC, Neumann G, Kawaoka Y, Belongia EA. MMWR Morb Mortal Wkly Rep. 2023 Feb 24;72(8):201-205. doi: 10.15585/mmwr.mm7208a1. PMID: 36821715

[Human adenovirus type 7 virus-like particle vaccine induces Dendritic cell maturation through the TLR4/NF-κB pathway and is highly immunogenic.](#)

Li Y, Xiu Z, Li S, Zhu Y, Li Y, Zhao R, Li Y, Yang X, Ge C, Li N, Jin N, Shang C, Li X, Han J. Antiviral Res. 2023 Feb 20;105559. doi: 10.1016/j.antiviral.2023.105559. Online ahead of print. PMID: 36813181

[Assessing the relationship between operationally defined zero-dose communities and access to selected primary healthcare services for children and pregnant women in emergency settings.](#)

Suprenant MP, Nyankesha E, Moreno-Garcia R, Buj V, Yakubu A, Shafique F, Zaman MH. PLoS One. 2023 Feb 16;18(2):e0281764. doi: 10.1371/journal.pone.0281764. eCollection 2023. PMID: 36795706

[Microencapsulated IL-12 Drives Genital Tract Immune Responses to Intranasal Gonococcal Outer Membrane Vesicle Vaccine and Induces Resistance to Vaginal Infection with Diverse Strains of Neisseria gonorrhoeae.](#)

Liu Y, Hammer LA, Daamen J, Stork M, Egilmez NK, Russell MW. mSphere. 2023 Feb 21;8(1):e0038822. doi: 10.1128/msphere.00388-22. Epub 2022 Dec 20. PMID: 36537786

[Recent Developments in Oral Delivery of Vaccines Using Nanocarriers.](#)

Zafar A, Arshad R, Ur Rehman A, Ahmed N, Akhtar H. Vaccines (Basel). 2023 Feb 20;11(2):490. doi: 10.3390/vaccines11020490. PMID: 36851367

[Trajectory of Humoral Responses to Two Doses of ChAdOx1 nCoV-19 Vaccination in Patients Receiving Maintenance Hemodialysis.](#)

Ling TC, Chen PL, Li NY, Ko WC, Sun CY, Chao JY, Shieh CC, Shen CF, Wu JL, Huang TC, Chao CH, Wang JR, Chang YT. Microbiol Spectr. 2023 Feb 21:e0344522. doi: 10.1128/spectrum.03445-22. Online ahead of print. PMID: 36809164

[Psychological determinants of COVID-19 vaccine acceptance: A comparison between immigrants and the host population in Japan.](#)

Teng Y, Hanibuchi T, Machida M, Nakaya T. Vaccine. 2023 Feb 17;41(8):1426-1430. doi: 10.1016/j.vaccine.2023.01.037. Epub 2023 Jan 23. PMID: 36702692

[Maternity care provider acceptance of a future Group B Streptococcus vaccine - A qualitative study in three countries.](#)

Geoghegan S, Acosta F, Stephens LC, Gillan H, Valera S, Drew RJ, Eogan M, Ratner AJ, Steenhoff AP, Butler KM, Feemster KA. Vaccine. 2023 Feb 18:S0264-410X(23)00172-X. doi: 10.1016/j.vaccine.2023.02.037. Online ahead of print. PMID: 36803900

[LRP6 Is a Functional Receptor for Attenuated Canine Distemper Virus.](#)

Gradauskaite V, Inglebert M, Doench J, Scherer M, Dettwiler M, Wyss M, Shrestha N, Rottenberg S, Plattet P. mBio. 2023 Feb 28;14(1):e0311422. doi: 10.1128/mbio.03114-22. Epub 2023 Jan 16. PMID: 36645301

[Attitudes and experiences of asylum seekers and refugees to the COVID-19 vaccination.](#)

Gordon ACT, Crenstil C, Mamluk L. BJGP Open. 2023 Feb 28:BJGPO.2023.0016. doi: 10.3399/BJGPO.2023.0016. Online ahead of print. PMID: 36854459

[Novel csuC-DNA nanovaccine based on chitosan candidate **vaccine** against infection with *Acinetobacter baumannii*.](#)

Hosseinnezhad-Lazarjani E, Doosti A, Sharifzadeh A. *Vaccine*. 2023 Feb 23;S0264-410X(23)00181-0. doi: 10.1016/j.vaccine.2023.02.046. Online ahead of print. PMID: 36841724

[Neutralization Effect of Sera against Delta and Omicron in Patients Recovering from COVID-19 and Inactivated **Vaccine** Recipients.](#)

Zhu Y, Zhong Q, Ma Z, Liu S, Lan Y, Peng B, Zhang X, Shi X, Qu J, Wu Z, Zhao Z, Zhang X, Zhang D. *Vaccines (Basel)*. 2023 Feb 17;11(2):471. doi: 10.3390/vaccines11020471. PMID: 36851348

[Diné \(Navajo\) Traditional Knowledge Holders' Perspective of COVID-19.](#)

Kahn CB, James D, George S, Johnson T, Kahn-John M, Teufel-Shone NI, Begay C, Tutt M, Bauer MC. *Int J Environ Res Public Health*. 2023 Feb 20;20(4):3728. doi: 10.3390/ijerph20043728. PMID: 36834423

[Development of Autoantibodies Following BNT162b2 mRNA COVID-19 Vaccination and Their Association with Disease Flares in Adult Patients with Autoimmune Inflammatory Rheumatic Diseases \(AIIRD\) and the General Population: Results of 1-Year Prospective Follow-Up Study.](#)

Gazitt T, Eviatar T, Shear J, Meidan R, Furer V, Feld J, Haddad A, Elias M, Hijazi N, Stein N, Shaked Mishan P, Zetser A, Peleg H, Elkayam O, Zisman D. *Vaccines (Basel)*. 2023 Feb 17;11(2):476. doi: 10.3390/vaccines11020476. PMID: 36851352

[Development of Autoantibodies Following BNT162b2 mRNA COVID-19 Vaccination and Their Association with Disease Flares in Adult Patients with Autoimmune Inflammatory Rheumatic Diseases \(AIIRD\) and the General Population: Results of 1-Year Prospective Follow-Up Study.](#)

Gazitt T, Eviatar T, Shear J, Meidan R, Furer V, Feld J, Haddad A, Elias M, Hijazi N, Stein N, Shaked Mishan P, Zetser A, Peleg H, Elkayam O, Zisman D. *Vaccines (Basel)*. 2023 Feb 17;11(2):476. doi: 10.3390/vaccines11020476. PMID: 36851352

[Comparison of antibody responses before and after booster doses with the Pfizer-BioNTech or Oxford-AstraZeneca vaccines in healthcare workers in Thailand.](#)

Phumisantiphong U, Chunchakan S, Manomaipiboon A, Maneerit J, Dechanuwong P, Trakarnvanich T, Oajaum W, Chan-In W. *Vaccine X*. 2023 Apr;13:100277. doi: 10.1016/j.jvacx.2023.100277. Epub 2023 Feb 20. PMID: 36845212

[Acceptance and Risk Perception of COVID-19 Vaccination among Pregnant and Non Pregnant Women in Sub-Saharan Africa: A Cross-Sectional Matched-Sample Study.](#)

Amiebenomo OM, Osuagwu UL, Envuladu EA, Miner CA, Mashige KP, Oveneri-Ogbomo G, Abu EK, Timothy CG, Ekpenyong BN, Langsi R, Oloruntoba R, Goson PC, Charwe DD, Ishaya T, Agho KE. *Vaccines (Basel)*. 2023 Feb 20;11(2):484. doi: 10.3390/vaccines11020484. PMID: 36851361

[Optimized workplace risk mitigation measures for SARS-CoV-2 in 2022.](#)

Pettit R, Peng B, Yu P, Matos PG, Greninger AL, McCashin J, Amos CI. *Sci Rep*. 2023 Feb 16;13(1):2779. doi: 10.1038/s41598-023-29087-w. PMID: 36797293

["Community members have more impact on their neighbors than celebrities": leveraging community partnerships to build COVID-19 **vaccine** confidence.](#)

Tjilos M, Tamlyn AL, Ragan EJ, Assoumou SA, Barnett KG, Martin P, Perkins RB, Linas BP, Drainoni ML. BMC Public Health. 2023 Feb 16;23(1):350. doi: 10.1186/s12889-023-15198-6. PMID: 36797724

[Spontaneous reports of primary ovarian insufficiency after vaccination: A review of the vaccine adverse event reporting system \(VAERS\).](#)

Patricia Wodi A, Marquez P, Mba-Jonas A, Barash F, Nguon K, Moro PL. Vaccine. 2023 Feb 24;41(9):1616-1622. doi: 10.1016/j.vaccine.2022.12.038. Epub 2023 Jan 31. PMID: 36732165

[Evaluation of safety and immuno-efficacy of a next generation live-attenuated yellow fever vaccine in cynomolgus macaques.](#)

Piras-Douce F, Broudic K, Chautard E, Raynal F, Courtois V, Gautheron S, Mantel N. Vaccine. 2023 Feb 17;41(8):1457-1470. doi: 10.1016/j.vaccine.2022.11.051. Epub 2023 Jan 24. PMID: 36702693

[Immunogenicity and protective efficacy of GBP510/AS03 vaccine against SARS-CoV-2 delta challenge in rhesus macaques.](#)

Jacob-Dolan C, Yu J, McMahan K, Giffin V, Chandrashekar A, Martinot AJ, Anioke T, Powers OC, Hall K, Hope D, Miller J, Hachmann NP, Chung B, Gardner S, Sellers D, Barrett J, Lewis MG, Andersen H, Kleanthous H, Seo KW, Lee SJ, Park YW, Kim H, Barouch DH. NPJ Vaccines. 2023 Feb 23;8(1):23. doi: 10.1038/s41541-023-00622-0. PMID: 36823160

[Mucosal and systemic neutralizing antibodies to norovirus induced in infant mice orally inoculated with recombinant rotaviruses.](#)

Kawagishi T, Sánchez-Tacuba L, Feng N, Costantini VP, Tan M, Jiang X, Green KY, Vinjé J, Ding S, Greenberg HB. Proc Natl Acad Sci U S A. 2023 Feb 28;120(9):e2214421120. doi: 10.1073/pnas.2214421120. Epub 2023 Feb 23. PMID: 36821582

[Mucoadhesive drug delivery systems: a promising noninvasive approach to bioavailability enhancement. Part II: formulation considerations.](#)

Kulkarni R, Fanse S, Burgess DJ. Expert Opin Drug Deliv. 2023 Mar;20(3):413-434. doi: 10.1080/17425247.2023.2181332. Epub 2023 Feb 22. PMID: 36803264

[The Role of Faith-Based Organizations in Improving Vaccination Confidence & Addressing Vaccination Disparities to Help Improve Vaccine Uptake: A Systematic Review.](#)

Syed U, Kapera O, Chandrasekhar A, Baylor BT, Hassan A, Magalhães M, Meidany F, Schenker I, Messiah SE, Bhatti A. Vaccines (Basel). 2023 Feb 15;11(2):449. doi: 10.3390/vaccines11020449. PMID: 36851325

[An inactivated SARS-CoV-2 vaccine induced cross-neutralizing persisting antibodies and protected against challenge in small animals.](#)

Offersgaard A, Duarte Hernandez CR, Feng S, Marichal-Gallardo P, Holmbeck K, Pihl AF, Fernandez-Antunez C, Alzua GP, Hartmann KT, Pham LV, Zhou Y, Gammeltoft KA, Fahnøe U, Schneider UV, Pedersen GK, Jensen HE, Christensen JP, Ramirez S, Bukh J, Gottwein JM. iScience. 2023 Feb 17;26(2):105949. doi: 10.1016/j.isci.2023.105949. Epub 2023 Jan 10. PMID: 36644321

[Designing multi-epitope vaccine against important colorectal cancer \(CRC\) associated pathogens based on immunoinformatics approach.](#)

Motamedi H, Ari MM, Shahlaei M, Moradi S, Farhadikia P, Alvandi A, Abiri R. BMC Bioinformatics. 2023 Feb 24;24(1):65. doi: 10.1186/s12859-023-05197-0. PMID: 36829112

[Construction and efficacy of a new live chimeric C-strain vaccine with DIVA characteristics against classical swine fever.](#)

Yi W, Wang H, Qin H, Wang Q, Guo R, Wen G, Pan Z. Vaccine. 2023 Feb 18:S0264-410X(23)00179-2. doi: 10.1016/j.vaccine.2023.02.044. Online ahead of print. PMID: 36803898

[Antibody response to ChAdOx1 nCoV-19 \(Covishield®\) vaccine in people on maintenance hemodialysis.](#)

Bhadauria DS, Tiwari P, Goel A, Katiyar H, Kaul A, Mayank, Aggarwal A, Verma A, Khetan D, Yachha M, Behera MR, Yadav B, Agarwal K, Prasad N. Semin Dial. 2023 Feb 26. doi: 10.1111/sdi.13149. Online ahead of print. PMID: 36843062

[High Clinical Burden of Influenza Disease in Adults Aged \$\geq\$ 65 Years: Can We Do Better? A Systematic Literature Review.](#)

Langer J, Welch VL, Moran MM, Cane A, Lopez SMC, Srivastava A, Enstone AL, Sears A, Markus KJ, Heuser M, Kewley RM, Whittle IJ. Adv Ther. 2023 Feb 15:1-27. doi: 10.1007/s12325-023-02432-1. Online ahead of print. PMID: 36790682

[Reporting Rates for VAERS Death Reports Following COVID-19 Vaccination, December 14, 2020-November 17, 2021.](#)

Day B, Menschik D, Thompson D, Jankosky C, Su J, Moro P, Zinderman C, Welsh K, Dimova RB, Nair N. Pharmacoepidemiol Drug Saf. 2023 Feb 22. doi: 10.1002/pds.5605. Online ahead of print. PMID: 36813704

[Enhanced mucosal immune responses and reduced viral load in the respiratory tract of ferrets to intranasal lipid nanoparticle-based SARS-CoV-2 proteins and mRNA vaccines.](#)

Boley PA, Lee CM, Schrock J, Yadav KK, Patil V, Suresh R, Lu S, Feng MM, Hanson J, Channappanavar R, Kenney SP, Renukaradhya GJ. J Nanobiotechnology. 2023 Feb 22;21(1):60. doi: 10.1186/s12951-023-01816-3. PMID: 36814238

[Marburg Vaccine Safe, Immunogenic in Phase 1 Trial.](#)

Harris E. JAMA. 2023 Feb 15. doi: 10.1001/jama.2023.1343. Online ahead of print. PMID: 36790829

[Reported rates of all-cause serious adverse events following immunization with BNT-162b in 5-17-year-old children in the United States.](#)

Mangat HS, Rippon B, Reddy NT, Syed AA, Maruthanal JM, Luedtke S, Puthumana JJ, Srivatsa A, Bosman A, Kostkova P. PLoS One. 2023 Feb 17;18(2):e0281993. doi: 10.1371/journal.pone.0281993. eCollection 2023. PMID: 36800368

[Shot Talk: Development and Pilot Test of a Theory of Planned Behavior Campaign to Combat College Student COVID-19 Vaccine Hesitancy.](#)

Ball H, Wozniak TR, Kuchenbecker CM. J Health Commun. 2023 Feb 27:1-9. doi: 10.1080/10810730.2023.2183438. Online ahead of print. PMID: 36852444

[COVID-19 Vaccine Hesitancy among New Jersey Teachers and Impacts of Vaccination Information Dissemination.](#)

Nguyen KT, Aggarwal J, Campbell ML, Shiao S, Shendell DG. *Vaccines* (Basel). 2023 Feb 17;11(2):466. doi: 10.3390/vaccines11020466. PMID: 36851344

[Evaluation of BNT162b2 Covid-19 Vaccine in Children Younger than 5 Years of Age.](#)

Muñoz FM, Sher LD, Sabharwal C, Gurtman A, Xu X, Kitchin N, Lockhart S, Riesenbergr R, Sexter JM, Czajka H, Paulsen GC, Maldonado Y, Walter EB, Talaat KR, Englund JA, Sarwar UN, Hansen C, Iwamoto M, Webber C, Cunliffe L, Ukkonen B, Martínez SN, Pahud BA, Munjal I, Domachowske JB, Swanson KA, Ma H, Koury K, Mather S, Lu C, Zou J, Xie X, Shi PY, Cooper D, Türeci Ö, Şahin U, Jansen KU, Gruber WC; C4591007 Clinical Trial Group. *N Engl J Med*. 2023 Feb 16;388(7):621-634. doi: 10.1056/NEJMoa2211031. PMID: 36791162

[Safety and effectiveness of monovalent COVID-19 mRNA vaccination and risk factors for hospitalisation caused by the omicron variant in 0.8 million adolescents: A nationwide cohort study in Sweden.](#)

Nordström P, Ballin M, Nordström A. *PLoS Med*. 2023 Feb 21;20(2):e1004127. doi: 10.1371/journal.pmed.1004127. Online ahead of print. PMID: 36802397

[Plasminogen activator inhibitor 1 is not a major causative factor for exacerbation in a mouse model of SARS-CoV-2 infection.](#)

Nakayama T, Azegami T, Kiso M, Imai M, Uraki R, Hayashi K, Hishikawa A, Yoshimoto N, Nakamichi R, Sugita-Nishimura E, Yoshida-Hama E, Kawaoka Y, Itoh H. *Sci Rep*. 2023 Feb 22;13(1):3103. doi: 10.1038/s41598-023-30305-8. PMID: 36813909

[Japan moves to bolster its vaccine R&D sector.](#)

Normile D. *Science*. 2023 Feb 17;379(6633):627. doi: 10.1126/science.adh1698. Epub 2023 Feb 16. PMID: 36795816

[Prevention of COVID-19 during youth ice hockey.](#)

Chilibeck PD. *Appl Physiol Nutr Metab*. 2023 Feb 27. doi: 10.1139/apnm-2022-0361. Online ahead of print. PMID: 36848644

[Anti-vaccination attitude trends during the COVID-19 pandemic: A machine learning-based analysis of tweets.](#)

To QG, To KG, Huynh VN, Nguyen NT, Ngo DT, Alley S, Tran AN, Tran AN, Pham NT, Bui TX, Vandelanotte C. *Digit Health*. 2023 Feb 19;9:20552076231158033. doi: 10.1177/20552076231158033. eCollection 2023 Jan-Dec. PMID: 36825077

[Nasopharyngeal colonization by *Streptococcus pneumoniae* in children and adults before the introduction of the 10-valent conjugate vaccine, Paraguay.](#)

Chamorro G, Kawabata A, Carvalho MDG, Pimenta FC, Lessa FC, Torres C, Lerea MJ, León ME. *PLoS One*. 2023 Feb 16;18(2):e0280722. doi: 10.1371/journal.pone.0280722. eCollection 2023. PMID: 36795644

[Evaluation of the Mucosal Immunity Effect of Bovine Viral Diarrhea Virus Subunit Vaccine E2Fc and E2Ft.](#)

Cheng Y, Tu S, Chen T, Zou J, Wang S, Jiang M, Tian S, Guo Q, Suolang S, Zhou H. *Int J Mol Sci*. 2023 Feb 20;24(4):4172. doi: 10.3390/ijms24044172. PMID: 36835584

[Current Methods for the Detection of Antibodies of Varicella-Zoster Virus: A Review.](#)

Pan D, Wang W, Cheng T. Microorganisms. 2023 Feb 17;11(2):519. doi: 10.3390/microorganisms11020519. PMID: 36838484

[Effectiveness of Coronavirus Disease 2019 Vaccines Against Hospitalization and Death in Canada: A Multiprovincial, Test-Negative Design Study.](#)

Nasreen S, Febriani Y, Velásquez García HA, Zhang G, Tadrous M, Buchan SA, Righolt CH, Mahmud SM, Janjua NZ, Kraiden M, De Serres G, Kwong JC. Clin Infect Dis. 2023 Feb 18;76(4):640-648. doi: 10.1093/cid/ciac634. PMID: 35974428

[Trivalent mosaic or consensus HIV immunogens prime humoral and broader cellular immune responses in adults.](#)

Cohen KW, Fiore-Gartland A, Walsh SR, Yusim K, Frahm N, Elizaga ML, Maenza J, Scott H, Mayer KH, Goepfert PA, Edupuganti S, Pantaleo G, Hutter J, Morris DE, De Rosa SC, Geraghty DE, Robb ML, Michael NL, Fischer W, Giorgi EE, Malhi H, Pensiero MN, Ferrari G, Tomaras GD, Montefiori DC, Gilbert PB, McElrath MJ, Haynes BF, Korber BT, Baden LR; NIAID HVTN 106 Study Group. J Clin Invest. 2023 Feb 15;133(4):e163338. doi: 10.1172/JCI163338. PMID: 36787249

[Facial Dermal Filler Injection and Vaccination: A Twelve-Year Review of Adverse Event Reporting and Literature Review.](#)

Sun AH, Tiongco RFP, Manahan MA. Aesthet Surg J. 2023 Feb 15:sjad031. doi: 10.1093/asj/sjad031. Online ahead of print. PMID: 36788718

[Independent control of COVID-19 vaccines by EU Official Control Authority Batch Release: challenges, strengths and successes.](#)

Milne C, Wagner R, Cano F, Bruysters M, Waeterloos G, Pullirsch D, Wierer M, Mallet L. NPJ Vaccines. 2023 Feb 23;8(1):22. doi: 10.1038/s41541-023-00617-x. PMID: 36823287

[Platelet Activation and Cytokine Release of Interleukin-8 and Interferon-Gamma-Induced Protein 10 after ChAdOx1 nCoV-19 Coronavirus Vaccine Injection.](#)

Shen CL, Wang TF, Liu CZ, Wu YF. Vaccines (Basel). 2023 Feb 16;11(2):456. doi: 10.3390/vaccines11020456. PMID: 36851332

[A 1-year analysis of adverse events following COVID-19 vaccination in Lebanon: a retrospective study.](#)

Zeitoun A, Hallit S, Chehade S, Ibrahim A, Helali M, Allam C, Karam R. J Pharm Policy Pract. 2023 Feb 21;16(1):24. doi: 10.1186/s40545-023-00528-1. PMID: 36810279

[Evaluation of an Engineered Zika Virus-Like Particle Vaccine Candidate in a Mosquito-Mouse Transmission Model.](#)

Mancini MV, Tandavanitj R, Ant TH, Murdochy SM, Gingell DD, Setthapramote C, Natsrita P, Kohl A, Sinkins SP, Patel AH, De Lorenzo G. mSphere. 2023 Feb 22:e0056422. doi: 10.1128/msphere.00564-22. Online ahead of print. PMID: 36840596

[Bacterial Pathogenesis in Various Fish Diseases: Recent Advances and Specific Challenges in Vaccine Development.](#)

Irshath AA, Rajan AP, Vimal S, Prabhakaran VS, Ganesan R. Vaccines (Basel). 2023 Feb 17;11(2):470. doi: 10.3390/vaccines11020470. PMID: 36851346

[A bivalent form of nanoparticle-based dengue vaccine stimulated responses that potentially eliminate both DENV-2 particles and DENV-2-infected cells.](#)

Seesen M, Jearanaiwitayakul T, Limthongkul J, Midoeng P, Sunintaboon P, Ubol S. *Vaccine*. 2023 Feb 24;41(9):1638-1648. doi: 10.1016/j.vaccine.2023.01.062. Epub 2023 Feb 3. PMID: 36740559

[A Case Series and Literature Review of Telogen Effluvium and Alopecia Universalis after the Administration of a Heterologous COVID-19 Vaccine Scheme.](#)

Hernández Arroyo J, Izquierdo-Condoy JS, Ortiz-Prado E. *Vaccines (Basel)*. 2023 Feb 15;11(2):444. doi: 10.3390/vaccines11020444. PMID: 36851320

Wigle J, Hodwitz K, Juando-Prats C, Allan K, Li X, Howard L, Fallon B, Birken CS, Maguire JL, Parsons JA. *CMAJ*. 2023 Feb 21;195(7):E259-E266. doi: 10.1503/cmaj.221401. PMID: 36810223

[Cirrhosis is associated with lower serological responses to COVID-19 vaccines in patients with chronic liver disease.](#)

Simão AL, Palma CS, Izquierdo-Sanchez L, Putignano A, Carvalho-Gomes A, Posch A, Zanaga P, Girleanu I, Henrique MM, Araújo C, Degre D, Gustot T, Sahuco I, Spagnolo E, Carvalhana S, Moura M, Fernandes DA, Banales JM, Romero-Gomez M, Trifan A, Russo FP, Stauber R, Berenguer M, Moreno C, Gonçalves J, Cortez-Pinto H, Castro RE. *JHEP Rep*. 2023 Feb 20:100697. doi: 10.1016/j.jhepr.2023.100697. Online ahead of print. PMID: 36844943

[A vaccine targeting human IL-4 and IL-13 protects against asthma in humanized mice.](#)

Lamanna E, Conde E, Mougél A, Bonnefoy J, Colaone F, Godon O, Hamdi S, Kamphuis JBJ, Drouet B, Serra V, Bruhns P, Reber LL. *Allergy*. 2023 Feb 17. doi: 10.1111/all.15680. Online ahead of print. PMID: 36799426

[COVID-19 Breakthrough Infection Among Vaccinated Population in the United Arab Emirates.](#)

Dash NR, Barqawi HJ, Obaideen AA, Al Chame HQ, Samara KA, Qadri R, Eldesouki S. *J Epidemiol Glob Health*. 2023 Feb 16:1-24. doi: 10.1007/s44197-023-00090-8. Online ahead of print. PMID: 36795274

[Humoral responses to the CoronoVac vaccine in healthcare workers.](#)

Eyupoglu G, Guven R, Karabulut N, Cakir A, Sener K, Yavuz BG, Tekyol D, Avci A. *Rev Soc Bras Med Trop*. 2023 Feb 20;56:e0209. doi: 10.1590/0037-8682-0209-2022. eCollection 2023. PMID: 36820653

[AF03 adjuvant improves anti-hemagglutinin and anti-neuraminidase immune responses induced by licensed seasonal quadrivalent influenza vaccines in mice.](#)

Ustyugova IV, Pougatcheva S, Farrell T, Strugnell T, Ganesh V, Zeldovich KB, Chivukula S, Goncalvez AP, Barro M. *Vaccine*. 2023 Feb 18:S0264-410X(23)00169-X. doi: 10.1016/j.vaccine.2023.02.034. Online ahead of print. PMID: 36803901

[Retinal Vasculitis Following COVID-19 Vaccination: Causation or Coincidence?](#)

Yi Z, Chen L, Zheng H, Chen C. *Ocul Immunol Inflamm*. 2023 Feb 17:1-3. doi: 10.1080/09273948.2023.2176887. Online ahead of print. PMID: 36799876

[National surveillance data analysis of COVID-19 vaccine uptake in England by women of reproductive age.](#)

Magee LA, Molteni E, Bowyer V, Bone JN, Boulding H, Khalil A, Mistry HD, Poston L, Silverio SA, Wolfe I, Duncan EL, von Dadelszen P; RESILIENT Study Group. Nat Commun. 2023 Feb 22;14(1):956. doi: 10.1038/s41467-023-36125-8. PMID: 36813760

[Genetic variations of Plasmodium falciparum circumsporozoite protein and the impact on interactions with human immunoproteins and malaria vaccine efficacy.](#)

Dieng CC, Ford CT, Lerch A, Doniou D, Vegesna K, Janies D, Cui L, Amoah L, Afrane Y, Lo E. Infect Genet Evol. 2023 Feb 23:105418. doi: 10.1016/j.meegid.2023.105418. Online ahead of print. PMID: 36841398

[A New Antibody Binding Test for Potency Assessment of the Human Rabies Vaccine.](#)

Miao L, Wang X, Zhao C, Li Y, He W, Li Y, Zhang J, Xu X, Feng X. Viral Immunol. 2023 Feb 23. doi: 10.1089/vim.2022.0161. Online ahead of print. PMID: 36827324

[Community Health Workers as Vaccinators: A Rapid Review of the Global Landscape, 2000-2021.](#)

Gibson E, Zameer M, Alban R, Kouwanou LM. Glob Health Sci Pract. 2023 Feb 28;11(1):e2200307. doi: 10.9745/GHSP-D-22-00307. Print 2023 Feb 28. PMID: 36853637

[COVID-19 Bivalent Booster Vaccination Coverage and Intent to Receive Booster Vaccination Among Adolescents and Adults - United States, November-December 2022.](#)

Lu PJ, Zhou T, Santibanez TA, Jain A, Black CL, Srivastav A, Hung MC, Kriss JL, Schorpp S, Yankey D, Sterrett N, Fast HE, Razzaghi H, Elam-Evans LD, Singleton JA. MMWR Morb Mortal Wkly Rep. 2023 Feb 17;72(7):190-198. doi: 10.15585/mmwr.mm7207a5. PMID: 36795677

[Design of a potential Sema4A-based multi-epitope vaccine to combat triple-negative breast cancer: an immunoinformatic approach.](#)

Paranthaman P, Veerappapillai S. Med Oncol. 2023 Feb 23;40(3):105. doi: 10.1007/s12032-023-01970-6. PMID: 36823384

[Allergic Reactions to Vaccines in Children: From Constituents to Specific Vaccines.](#)

Tsai MH, Chiu CY. Biomedicines. 2023 Feb 18;11(2):620. doi: 10.3390/biomedicines11020620. PMID: 36831156

[A systematic review of artificial intelligence-based COVID-19 modeling on multimodal genetic information.](#)

Sekaran K, Gnanasambandan R, Thirunavukarasu R, Iyyadurai R, Karthick G, George Priya Doss C. Prog Biophys Mol Biol. 2023 Feb 19;179:1-9. doi: 10.1016/j.pbiomolbio.2023.02.003. Online ahead of print. PMID: 36809830

[BNT162b2 COVID-19 Vaccine Safety among Healthcare Workers of a Tertiary Hospital in Italy.](#)

Beccia F, Regazzi L, Marziali E, Beccia V, Pascucci D, Mores N, Vetrugno G, Laurenti P. Vaccines (Basel). 2023 Feb 17;11(2):477. doi: 10.3390/vaccines11020477. PMID: 36851354

[A Qualitative Comparative Analysis to explore the predictors of individuals' willingness towards vaccination.](#)

Rajkumar E, Romate J, Greeshma R, Lipsa M. Heliyon. 2023 Mar;9(3):e13778. doi: 10.1016/j.heliyon.2023.e13778. Epub 2023 Feb 16. PMID: 36820092

[Impact of vaccination against COVID-19 on the outcomes of in vitro fertilization-embryo transfer: a retrospective cohort study.](#)

Yin J, Wang Y, Tao L, Chen L, Liu P, Li R. Chin Med J (Engl). 2023 Feb 21. doi: 10.1097/CM9.0000000000002444. Online ahead of print. PMID: 36801859

[Functional studies of HLA and its role in SARS-CoV-2: Stimulating T cell response and vaccine development.](#)

Lin F, Lin X, Fu B, Xiong Y, Zaky MY, Wu H. Life Sci. 2023 Feb 15;315:121374. doi: 10.1016/j.lfs.2023.121374. Epub 2023 Jan 6. PMID: 36621539

[COVID-19 Vaccination Coverage and Demographic Characteristics of Infants and Children Aged 6 Months-4 Years - United States, June 20-December 31, 2022.](#)

Murthy BP, Fast HE, Zell E, Murthy N, Meng L, Shaw L, Vogt T, Chatham-Stephens K, Santibanez TA, Gibbs-Scharf L, Harris LQ. MMWR Morb Mortal Wkly Rep. 2023 Feb 17;72(7):183-189. doi: 10.15585/mmwr.mm7207a4. PMID: 36795658

[A comprehensive evaluation of humoral immune response to second and third SARS-CoV-2 mRNA vaccination in patients with malignant lymphoma.](#)

Suzuki T, Kusumoto S, Kamezaki Y, Hashimoto H, Nishitarumizu N, Nakanishi Y, Kato Y, Kawai A, Matsunaga N, Ebina T, Nakamura T, Marumo Y, Oiwa K, Kinoshita S, Narita T, Ito A, Inagaki A, Ri M, Komatsu H, Aritsu T, Iida S. Int J Hematol. 2023 Feb 15:1-10. doi: 10.1007/s12185-023-03550-w. Online ahead of print. PMID: 36790667

[Advances on the early cellular events occurring upon exposure of human macrophages to aluminum oxyhydroxide adjuvant.](#)

Masson JD, Badran G, Domdom MA, Gherardi RK, Mograbi B, Authier FJ, Crépeaux G. Sci Rep. 2023 Feb 23;13(1):3198. doi: 10.1038/s41598-023-30336-1. PMID: 36823452

[Effectiveness of the BNT162b2 mRNA COVID-19 vaccine among adolescents with juvenile-onset inflammatory rheumatic diseases.](#)

Ziv A, Heshin-Bekenstein M, Haviv R, Kivity S, Netzer D, Yaron S, Schur Y, Egert T, Egert Y, Sela Y, Hashkes PJ, Uziel Y. Rheumatology (Oxford). 2023 Feb 23;62(SI2):SI145-SI151. doi: 10.1093/rheumatology/keac408. PMID: 35920789

[The risk of miscarriage following COVID-19 vaccination: a systematic review and meta-analysis.](#)

Rimmer MP, Teh JJ, Mackenzie SC, Al Wattar BH. Hum Reprod. 2023 Feb 16:dead036. doi: 10.1093/humrep/dead036. Online ahead of print. PMID: 36794918

[Nanoparticle vaccine based on the envelope protein domain III of Japanese encephalitis virus elicits robust protective immune responses in mice.](#)

Yao M, Ren X, Yin M, Chen H, Li X, Qian P. Nanomedicine (Lond). 2023 Feb 15. doi: 10.2217/nnm-2022-0298. Online ahead of print. PMID: 36789970

[Short Message Service Reminder Nudge for Parents and Influenza Vaccination Uptake in Children and Adolescents With Special Risk Medical Conditions: The Flutext-4U Randomized Clinical Trial.](#)

Tuckerman J, Harper K, Sullivan TR, Cuthbert AR, Fereday J, Couper J, Smith N, Tai A, Kelly A, Couper R, Friswell M, Flood L, Blyth CC, Danchin M, Marshall HS. JAMA Pediatr. 2023 Feb 20:e226145. doi: 10.1001/jamapediatrics.2022.6145. Online ahead of print. PMID: 36806893

[T follicular helper cell responses to SARS-CoV-2 vaccination among healthy and immunocompromised adults.](#)

Boyd MAA, Carey Hoppe A, Kelleher AD, Munier CML. Immunol Cell Biol. 2023 Feb 24. doi: 10.1111/imcb.12635. Online ahead of print. PMID: 36825370

[Genetic and epidemiological description of an outbreak of circulating vaccine-derived polio-virus type 2 \(cVDPV2\) in Angola, 2019-2020.](#)

Morais A, Morais J, Felix M, Neto Z, Madaleno V, Umar AS, Panda N, Lemma F, Chivale JAL, Cavalcante DG, Davlantes E, Ghiselli M, Espinosa C, Whiteman A, Iber J, Henderson E, Bullard K, Jorba J, Burns CC, Diop O, Gumede N, Seakamela L, Howard W, Frawley A. Vaccine. 2023 Feb 17:S0264-410X(23)00170-6. doi: 10.1016/j.vaccine.2023.02.035. Online ahead of print. PMID: 36803869

[Traditional Chinese Medicine for the Common Cold: Evidence and Potential Mechanisms.](#)

Wu S, Su W, Fan Q, Shang H, Xiao W, Wang Y. Am J Chin Med. 2023 Feb 18:1-29. doi: 10.1142/S0192415X23500258. Online ahead of print. PMID: 36803206

[HPV Vaccination Adherence in Working-Age Men: A Systematic Review and Meta-Analysis.](#)

Amantea C, Foschi N, Gavi F, Borrelli I, Rossi MF, Spuntarelli V, Russo P, Gualano MR, Santoro PE, Moscato U. Vaccines (Basel). 2023 Feb 15;11(2):443. doi: 10.3390/vaccines11020443. PMID: 36851321

[Route and antigen shape immunity to dmlT-adjuvanted vaccines to a greater extent than biochemical stress or formulation excipients.](#)

Stone AE, Rambaran S, Trinh IV, Estrada M, Jarand CW, Williams BS, Murrell AE, Huerter CM, Bai W, Palani S, Nakanishi Y, Laird RM, Poly FM, Reed WF, White JA, Norton EB. Vaccine. 2023 Feb 24;41(9):1589-1601. doi: 10.1016/j.vaccine.2023.01.033. Epub 2023 Jan 31. PMID: 36732163

[Impact of COVID-19 Pandemic on Human Papillomavirus Vaccine Uptake in Israel.](#)

Lavie M, Lavie I, Laskov I, Cohen A, Grisaru D, Grisaru-Soen G, Michaan N. J Low Genit Tract Dis. 2023 Feb 23. doi: 10.1097/LGT.0000000000000729. Online ahead of print. PMID: 36815631

[Analysis of hematologic adverse events reported to a national surveillance system following COVID-19 bivalent booster vaccination.](#)

Jacobs JW, Booth GS, Adkins BD. Ann Hematol. 2023 Feb 16:1-5. doi: 10.1007/s00277-023-05136-2. Online ahead of print. PMID: 36795118

[Bioorthogonal-Activated In Situ Vaccine Mediated by a COF-Based Catalytic Platform for Potent Cancer Immunotherapy.](#)

Sun M, Liu Z, Wu L, Yang J, Ren J, Qu X. J Am Chem Soc. 2023 Feb 23. doi: 10.1021/jacs.2c13010. Online ahead of print. PMID: 36815731

[Projecting the COVID-19 immune landscape in Japan in the presence of waning immunity and booster vaccination.](#)

Sasanami M, Fujimoto M, Kayano T, Hayashi K, Nishiura H. J Theor Biol. 2023 Feb 21;559:111384. doi: 10.1016/j.jtbi.2022.111384. Epub 2022 Dec 14. PMID: 36528092

[Small-Fiber Neuropathy After Vaccination With mRNA-1273 SARS-CoV-2 Vaccine.](#)

Bernheimer JH, Pan B, Gerecke BJ. J Clin Neuromuscul Dis. 2023 Mar 1;24(3):169-170. doi: 10.1097/CND.0000000000000432. Epub 2023 Feb 16. PMID: 36809210

[Virtual communication training to address COVID-19 vaccine hesitancy.](#)

Real FJ, Meisman A, Rosen BL. Med Educ. 2023 Feb 28. doi: 10.1111/medu.15061. Online ahead of print. PMID: 36855282

[Antagonisms of ASFV towards Host Defense Mechanisms: Knowledge Gaps in Viral Immune Evasion and Pathogenesis.](#)

Yu L, Zhu Z, Deng J, Tian K, Li X. Viruses. 2023 Feb 19;15(2):574. doi: 10.3390/v15020574. PMID: 36851786

[COVID-19 Vaccine Response in People with Multiple Sclerosis Treated with Dimethyl Fumarate, Diroximel Fumarate, Natalizumab, Ocrelizumab, or Interferon Beta Therapy.](#)

Jaber A, Patel M, Sylvester A, Yarussi M, Kalina JT, Mendoza JP, Avila RL, Tremblay MA. Neurol Ther. 2023 Feb 16:1-14. doi: 10.1007/s40120-023-00448-x. Online ahead of print. PMID: 36792812

[A randomized phase I/II safety and immunogenicity study of the Montanide-adjuvanted SARS-CoV-2 spike protein-RBD-Fc vaccine, AKS-452.](#)

Feitsma EA, Janssen YF, Boersma HH, van Sleen Y, van Baarle D, Alleva DG, Lancaster TM, Sathiyaseelan T, Murikipudi S, Delpero AR, Scully MM, Ragupathy R, Kotha S, Haworth JR, Shah NJ, Rao V, Nagre S, Ronca SE, Green FM, Aminetzah A, Sollie F, Kruijff S, Brom M, van Dam GM, Zion TC. Vaccine. 2023 Feb 23:S0264-410X(23)00200-1. doi: 10.1016/j.vaccine.2023.02.057. Online ahead of print. PMID: 36842886

[Deletion of African Swine Fever Virus \(ASFV\) H240R Gene Attenuates the Virulence of ASFV by Enhancing NLRP3-Mediated Inflammatory Responses.](#)

Huang L, Liu H, Ye G, Liu X, Chen W, Wang Z, Zhao D, Zhang Z, Feng C, Hu L, Yu H, Zhou S, Zhang X, He X, Zheng J, Bu Z, Li J, Weng C. J Virol. 2023 Feb 28;97(2):e0122722. doi: 10.1128/jvi.01227-22. Epub 2023 Jan 19. PMID: 36656014

[COVID-19 Incidence and Vaccine Effectiveness in University Staff, 1 March 2020-2 April 2022.](#)

Cegolon L, Negro C, Pesce M, Filon FL. Vaccines (Basel). 2023 Feb 19;11(2):483. doi: 10.3390/vaccines11020483. PMID: 36851360

[Immunoinformatics-aided design of a new multi-epitope vaccine adjuvanted with domain 4 of pneumolysin against Streptococcus pneumoniae strains.](#)

Shafaghi M, Bahadori Z, Madanchi H, Ranjbar MM, Shabani AA, Mousavi SF. BMC Bioinformatics. 2023 Feb 24;24(1):67. doi: 10.1186/s12859-023-05175-6. PMID: 36829109

[Immunogenicity and Safety of a Combined Intramuscular/Intranasal Recombinant Spike Protein COVID-19 Vaccine \(RCP\) in Healthy Adults Aged 18 to 55 Years Old: A Randomized, Double-Blind, Placebo-Controlled, Phase I Trial.](#)

Dodaran MS, Banihashemi SR, Es-Haghi A, Mehrabadi MHF, Nofeli M, Mokarram AR, Mokhberalsafa L, Sadeghi F, Ranjbar A, Ansarifar A, Mohazzab A, Setarehdan SA, Bagheri Amiri F, Mohseni V, Hajimoradi M, Ghahremanzadeh N, Razzaz SH, Masoomi S, Taghdiri M, Bagheri M, Lofti M, Khorasani A, Ghader M, Safari S, Shahsavv M, Kalantari S. *Vaccines* (Basel). 2023 Feb 16;11(2):455. doi: 10.3390/vaccines11020455. PMID: 36851334

[A Biological OR\(XNOR\) Logic Gate Couples Carbon Source and Transgene Expression Switching in a *Komagataella phaffii* \(*Pichia pastoris*\) Strain Co-producing Process-Enhancing Lipase and a Virus-like Particle \(VLP\) Vaccine.](#)

Bandyopadhyay S, Pavlika V, Bracewell DG, Nesbeth DN. *ACS Synth Biol*. 2023 Feb 27. doi: 10.1021/acssynbio.2c00342. Online ahead of print. PMID: 36848292

[Age-dependent impairment in antibody responses elicited by a homologous CoronaVac booster dose.](#)

Filardi BA, Monteiro VS, Schwartzmann PV, do Prado Martins V, Zucca LER, Baiocchi GC, Malik AA, Silva J, Hahn AM, Chen NFG, Pham K, Pérez-Then E, Miric M, Brache V, Cochon L, Larocca RA, Mendez RDR, Bardini Silveira D, Pinto AR, Croda J, Yildirim I, Omer SB, Ko AI, Vermund SH, Grubaugh ND, Iwasaki A, Lucas C; Yale SARS-CoV-2 Genomic Surveillance Initiative; Vogels CBF, Breban M, Koch TR, Chaguza C, Tikhonova I, Castaldi C, Mane S, De Kumar B, Ferguson D, Kerantzas N, Peaper D, Landry ML, Schulz W. *Sci Transl Med*. 2023 Feb 15;15(683):eade6023. doi: 10.1126/scitranslmed.ade6023. Epub 2023 Feb 15. PMID: 36791210

[SARS-CoV-2 Vaccine-Induced T-Cell Response after Three Doses in People Living with HIV on Antiretroviral Therapy Compared to Seronegative Controls \(CTN 328 COVAXHIV Study\).](#)

Alexandrova Y, Yero A, Mboumba Bouassa RS, Comeau E, Samarani S, Brumme ZL, Hull M, Crawley AM, Langlois MA, Angel JB, Cooper CL, Needham J, Lee T, Singer J, Anis AH, Costiniuk CT, Jenabian MA. *Viruses*. 2023 Feb 19;15(2):575. doi: 10.3390/v15020575. PMID: 36851789

[Correction to: Two-Dose Severe Acute Respiratory Syndrome Coronavirus 2 Vaccine Effectiveness With Mixed Schedules and Extended Dosing Intervals: Test-Negative Design Studies From British Columbia and Quebec, Canada.](#)

[No authors listed] *Clin Infect Dis*. 2023 Feb 18;76(4):778-779. doi: 10.1093/cid/ciac584. PMID: 36650055

[Antigenic comparison of H3N8 equine influenza viruses belonging to Florida sublineage clade 1 between vaccine strains and North American strains isolated in 2021-2022.](#)

Nemoto M, Reedy SE, Yano T, Suzuki K, Fukuda S, Garvey M, Kambayashi Y, Bannai H, Tsujimura K, Yamanaka T, Cullinane A, Chambers TM. *Arch Virol*. 2023 Feb 19;168(3):94. doi: 10.1007/s00705-023-05720-x. PMID: 36806782

[Enhancement of immunogenicity and neutralizing responses against SARS-CoV-2 spike protein using the Fc fusion fragment.](#)

Ehteshaminia Y, Jalali SF, Jadidi-Niaragh F, Enderami SE, Pagheh AS, Akbari E, Kenari SA, Hassannia H. *Life Sci*. 2023 Feb 23:121525. doi: 10.1016/j.lfs.2023.121525. Online ahead of print. PMID: 36841470

[Combinations but Not a Single PlpE Epitope Induces Host Protective Immunity against *Pasteurella multocida*.](#)

Zhu W, Zhou B, Chen L, Zhao J, Rao H. *Infect Immun*. 2023 Feb 23:e0027222. doi: 10.1128/iai.00272-22. Online ahead of print. PMID: 36815793

[Tracing the recent updates on vaccination approaches and significant adjuvants being developed against HIV.](#)

Malik S, Muhammad K, Aslam SM, Waheed Y. Expert Rev Anti Infect Ther. 2023 Feb 27:1-16. doi: 10.1080/14787210.2023.2182771. Online ahead of print. PMID: 36803177

[Effectiveness of BNT162b2 and CoronaVac vaccines in preventing SARS-CoV-2 Omicron infections, hospitalizations, and severe complications in the pediatric population in Hong Kong: a case-control study.](#)

Chun Yan VK BPharm, Tak Cheng FW MCLinPharm, Ling Chui CS PhD, Tsun Lai FT PhD, Ho Wong CK PhD, Li X PhD, Fai Wan EY PhD, Chih Wong JS MBBS, Chan EW PhD, Kei Wong IC PhD, Wah Kwan MY MSc MBBS, Ip P MPH MBBS. Emerg Microbes Infect. 2023 Feb 28:2185455. doi: 10.1080/22221751.2023.2185455. Online ahead of print. PMID: 36852582

[Immunogenicity of two doses of BNT162b2 and mRNA-1273 vaccines for solid cancer patients on treatment with or without a previous SARS-CoV-2 infection.](#)

La Verde N, Riva A, Cona MS, Gabrieli A, Cattaneo M, Fasola C, Lipari G, De Stradis C, Favorito V, Lombardi Stocchetti B, Chizzoniti D, Covizzi A, Rulli E, Galli F, Ruggieri L, Gambaro A, Ferrario S, Dalu D, Tarkowski MS. Int J Cancer. 2023 Feb 15;152(4):661-671. doi: 10.1002/ijc.34273. Epub 2022 Sep 28. PMID: 36056571

[Characterizing U.S. mothers with high human papillomavirus vaccine intent yet unvaccinated adolescents.](#)

Srivastava T, Head KJ, O'Dell SM, Feemster KA, Panozzo CA, Zimet GD, Kornides ML. Prev Med. 2023 Feb 26:107472. doi: 10.1016/j.yjpm.2023.107472. Online ahead of print. PMID: 36854366

[Effect of Antigen Structure in Subunit Vaccine Nanoparticles on Humoral Immune Responses.](#)

Park J, Champion JA. ACS Biomater Sci Eng. 2023 Feb 27. doi: 10.1021/acsbmaterials.2c01516. Online ahead of print. PMID: 36848229

[Highly Prolonged Release of the Cancer Vaccine and Immunomodulator via a Two-Layer Biodegradable Microneedle for Prophylactic Treatment of Metastatic Cancer.](#)

Duong HTT, Yin Y, Le TMD, Jeong JH, Lee DS. Biomacromolecules. 2023 Feb 21. doi: 10.1021/acs.biomac.2c01270. Online ahead of print. PMID: 36802451

[High-plex protein and whole transcriptome co-mapping at cellular resolution with spatial CITE-seq.](#)

Liu Y, DiStasio M, Su G, Asashima H, Enniful A, Qin X, Deng Y, Nam J, Gao F, Bordignon P, Cassano M, Tomayko M, Xu M, Halene S, Craft JE, Hafler D, Fan R. Nat Biotechnol. 2023 Feb 23. doi: 10.1038/s41587-023-01676-0. Online ahead of print. PMID: 36823353

[A Fluorinated Supramolecular Self-Assembled Peptide as Nanovaccine Adjuvant for Enhanced Cancer Vaccine Therapy.](#)

Jia S, Ji S, Zhao J, Lv Y, Wang J, Sun D, Ding D. Small Methods. 2023 Feb 19:e2201409. doi: 10.1002/smt.202201409. Online ahead of print. PMID: 36802205

[An Organizational Assessment of 34 Home Delivered Meals Programs that Engaged and Assisted Homebound Individuals With Obtaining the COVID-19 Vaccine During the Pandemic.](#)

Guglielmo D, Cloud J, Trejo L, Baca C, Smith LV, Shetgiri R, Kuo T; Homebound Data Workgroup. J Appl Gerontol. 2023 Feb 16:7334648231157583. doi: 10.1177/07334648231157583. Online ahead of print. PMID: 36797836

[Cell Proteomic Footprinting: Advances in the Quality of Cellular and Cell-Derived Cancer Vaccines.](#)

Lokhov PG, Balashova EE, Trifonova OP, Maslov DL, Archakov AI. *Pharmaceutics*. 2023 Feb 16;15(2):661. doi: 10.3390/pharmaceutics15020661. PMID: 36839983

[Ethics of age de-escalation in pediatric vaccine trials: Attending to the case of COVID-19.](#)

Harbin A, Laventhal N, Navin M. *Vaccine*. 2023 Feb 24;41(9):1584-1588. doi: 10.1016/j.vaccine.2023.01.055. Epub 2023 Jan 27. PMID: 36732168

[Exploring Intergenerational Communication on Social Media Group Chats as a Cancer Prevention Intervention Opportunity Among Vietnamese American Families: Qualitative Study.](#)

Duong HT, Hopfer S. *JMIR Form Res*. 2023 Feb 15;7:e35601. doi: 10.2196/35601. PMID: 36790844

[A Synthetic Biology Approach for Vaccine Candidate Design against Delta Strain of SARS-CoV-2 Revealed Disruption of Favored Codon Pair as a Better Strategy over Using Rare Codons.](#)

Gurjar P, Karuvantevida N, Rzhepakovsky IV, Khan AA, Khandia R. *Vaccines (Basel)*. 2023 Feb 20;11(2):487. doi: 10.3390/vaccines11020487. PMID: 36851364

[Acid-Responsive Immune-Enhancing Chitosan Formulation Capable of Transforming from Particle Stabilization to Polymer Chain Stabilization.](#)

Zou Y, Liu X, Chen Q, Oku H, Ma G, Wu J. *ACS Appl Mater Interfaces*. 2023 Feb 24. doi: 10.1021/acscami.2c17505. Online ahead of print. PMID: 36825996

[Integrating civil liberty and the ethical principle of autonomy in building public confidence to reduce COVID-19 vaccination inequity in Africa.](#)

Couch MA, Katoto PDMC, Cinini SF, Wiysonge CS. *Hum Vaccin Immunother*. 2023 Feb 20;21:79789. doi: 10.1080/21645515.2023.2179789. Online ahead of print. PMID: 36803523

[Unveiling growth and dynamics of liposomes by graphene liquid cell-transmission electron microscopy.](#)

Jabbari V, Sawczyk M, Amiri A, Král P, Shahbazian-Yassar R. *Nanoscale*. 2023 Feb 15. doi: 10.1039/d2nr06147c. Online ahead of print. PMID: 36790028

[Monitoring and immunogenicity of SARS-CoV-2 vaccination of laboratory rhesus monkeys \(*Macaca mulatta*\).](#)

Oh DQP, Grothe I, Lukaß H, Kreiter AK, Hoffmann M, Wegener D. *Sci Rep*. 2023 Feb 25;13(1):3274. doi: 10.1038/s41598-023-30473-7. PMID: 36841887

[The association between adverse events of COVID-19 vaccination and anxiety and willingness to receive a booster dose.](#)

Chen L, Liang H, Liu L, Qiu W, Su L, Yang H. *Hum Vaccin Immunother*. 2023 Feb 16;21:76643. doi: 10.1080/21645515.2023.2176643. Online ahead of print. PMID: 36798968

[Dynamic Covalent Dextran Hydrogels as Injectable, Self-Adjuvating Peptide Vaccine Depots.](#)

Fan B, Torres García D, Salehi M, Webber MJ, van Kasteren SI, Eelkema R. *ACS Chem Biol*. 2023 Feb 17. doi: 10.1021/acscchembio.2c00938. Online ahead of print. PMID: 36799174

[Design of a stabilized non-glycosylated Pfs48/45 antigen enables a potent malaria transmission-blocking nanoparticle vaccine.](#)

Dickey TH, Gupta R, McAleese H, Ouahes T, Orr-Gonzalez S, Ma R, Muratova O, Salinas ND, Hume JCC, Lambert LE, Duffy PE, Tolia NH. NPJ Vaccines. 2023 Feb 18;8(1):20. doi: 10.1038/s41541-023-00619-9. PMID: 36808125

[Public health impact of herpes zoster vaccination on older adults in Hong Kong.](#)

Chan PKS, Wong MCS, Chan M, Ching K, Giannelos N, Ng C. Hum Vaccin Immunother. 2023 Feb 28:2176065. doi: 10.1080/21645515.2023.2176065. Online ahead of print. PMID: 36854447

[Fingerprinting trimeric SARS-CoV-2 RBD by capillary isoelectric focusing with whole-column imaging detection.](#)

Du J, Wu G, Chen Q, Yu C, Xu G, Liu A, Wang L. Anal Biochem. 2023 Feb 15;663:115034. doi: 10.1016/j.ab.2022.115034. Epub 2022 Dec 28. PMID: 36586502

[Impact of COVID-19 vaccination on COVID-19 hospital admissions in England during 2021: an observational study.](#)

Cornforth F, Webber L, Kerr G, Dinsdale H, Majeed A, Greengross P. J R Soc Med. 2023 Feb 24:1410768231157017. doi: 10.1177/01410768231157017. Online ahead of print. PMID: 36825557

[Cancer Vaccines Based on Fluorine-Modified KH-1 Elicit Robust Immune Response.](#)

Liu Y, Li B, Zheng X, Xiong D, Ye X. Molecules. 2023 Feb 17;28(4):1934. doi: 10.3390/molecules28041934. PMID: 36838925

[Addressing misclassification bias in vaccine effectiveness studies with an application to Covid-19.](#)

Eusebi P, Speybroeck N, Hartnack S, Stærk-Østergaard J, Denwood MJ, Kostoulas P. BMC Med Res Methodol. 2023 Feb 27;23(1):55. doi: 10.1186/s12874-023-01853-4. PMID: 36849911

[Community-Based Public Health Vaccination Campaign \(VaccinateLA\) in Los Angeles' Black and Latino Communities: Protocol for a Participatory Study.](#)

Kipke MD, Karimipour N, Wolfe N, Orechwa A, Stoddard L, Rubio-Diaz M, North G, Dezfuli G, Murphy S, Phelps A, Kagan J, De La Haye K, Perry C, Baezconde-Garbanati L. JMIR Res Protoc. 2023 Feb 20;12:e40161. doi: 10.2196/40161. PMID: 36757953

[Preliminary clinical study of personalized neoantigen vaccine therapy for microsatellite stability \(MSS\)-advanced colorectal cancer.](#)

Yu YJ, Shan N, Li LY, Zhu YS, Lin LM, Mao CC, Hu TT, Xue XY, Su XP, Shen X, Cai ZZ. Cancer Immunol Immunother. 2023 Feb 16. doi: 10.1007/s00262-023-03386-7. Online ahead of print. PMID: 36795124

[The association between COVID-19 vaccination and idiopathic sudden sensorineural hearing loss, clinical manifestation and outcomes.](#)

Fisher R, Tarnovsky Y, Hirshoren N, Kaufman M, Stern Shavit S. Eur Arch Otorhinolaryngol. 2023 Feb 17:1-5. doi: 10.1007/s00405-023-07869-2. Online ahead of print. PMID: 36799975

[B-Cell Epitope Mapping of the *Plasmodium falciparum* Malaria Vaccine Candidate GMZ2.6c in a Naturally Exposed Population of the Brazilian Amazon.](#)

Baptista BO, Souza ABL, Oliveira LS, Souza HADS, Barros JP, Queiroz LT, Souza RM, Amoah LE, Singh SK, Theisen M, Rodrigues-da-Silva RN, Riccio EKP, Totino PRR, Lima-Junior JDC, Daniel-Ribeiro CT,

Pratt-Riccio LR. *Vaccines* (Basel). 2023 Feb 15;11(2):446. doi: 10.3390/vaccines11020446. PMID: 36851323

[Comparison of immune response to SARS-COV-2 vaccine in COVID-recovered versus non-infected Individuals.](#)

Mushtaq S, Azam Khan MK, Alam Khan MQ, Rathore MA, Parveen B, Noor M, Ghani E, Tahir AB, Tipu HN, Lin B. *Clin Exp Med*. 2023 Feb 21:1-7. doi: 10.1007/s10238-023-01005-4. Online ahead of print. PMID: 36802308

[Purification of recombinant vesicular stomatitis virus-based HIV vaccine candidate.](#)

Bakhshizadeh Gashti A, Chahal PS, Gaillet B, Garnier A. *Vaccine*. 2023 Feb 24:S0264-410X(23)00201-3. doi: 10.1016/j.vaccine.2023.02.058. Online ahead of print. PMID: 36842887

[Targeting Ubiquitin-like Protein, ISG15, as a Novel Tumor Associated Antigen in Colorectal Cancer.](#)

Nguyen HM, Gaikwad S, Oladejo M, Paulishak W, Wood LM. *Cancers* (Basel). 2023 Feb 15;15(4):1237. doi: 10.3390/cancers15041237. PMID: 36831577

[Two Case Reports of Chronic Inflammatory Demyelinating Polyneuropathy After COVID-19 Vaccination.](#)

Kim S, Lee EK, Sohn E. *J Korean Med Sci*. 2023 Feb 27;38(8):e57. doi: 10.3346/jkms.2023.38.e57. PMID: 36852853

[Surgically Derived Cancer Cell Membrane-Coated R837-Loaded Poly\(2-Oxazoline\) Nanoparticles for Prostate Cancer Immunotherapy.](#)

Li S, Dong S, Wu J, Lv X, Yang N, Wei Q, Wang C, Chen J. *ACS Appl Mater Interfaces*. 2023 Feb 15;15(6):7878-7886. doi: 10.1021/acsami.2c22363. Epub 2023 Feb 4. PMID: 36738473

[Response to anti-SARS-CoV-2 mRNA vaccines in multiple myeloma and chronic lymphocytic leukemia patients.](#)

Zaleska J, Kwasnik P, Paziewska M, Purkot J, Szabelak A, Jurek M, Masny N, Dziatkiewicz I, Pronobis-Szczylik B, Piebiak A, Szymczyk A, Jarosz-Chudzik K, Bolkun L, Kozłowska K, Piszcz J, Subocz E, Halka J, Bator M, Kalicinska E, Wrobel T, Usnarska-Zubkiewicz L, Rybka J, Deren-Wagemann I, Szyca-Smieszniak M, Dybko J, Hus I, Pula B, Cichocka E, Rymko M, Zdunczyk D, Ziarkiewicz M, Basak GW, Bullinger L, Giannopoulos K. *Int J Cancer*. 2023 Feb 15;152(4):705-712. doi: 10.1002/ijc.34209. Epub 2022 Jul 27. PMID: 35830214

[Characterization and evaluation of an oral vaccine via nano-carrier for surface immunogenic protein \(Sip\) delivery against *Streptococcus agalactiae* infection.](#)

Zhu C, Zhang N, Jing D, Liu X, Zeng Z, Wang J, Xiao F, Zhang H, Chi H, Wan C, Lin P, Gong H, Wu Y. *Int J Biol Macromol*. 2023 Feb 22;235:123770. doi: 10.1016/j.ijbiomac.2023.123770. Online ahead of print. PMID: 36822292

[Migrants' access to COVID-19 vaccination in Japan: Progress and challenges.](#)

Fujita M, Kanda M, Kiyohara H, Ikeda S, Iwamoto A, Sudo K, Teshima Y, Nii M, Murata Y, Kato J, Komatsu A, Yumino A, Sawada T, Sato H, Nakasa T. *J Migr Health*. 2023 Feb 16;7:100169. doi: 10.1016/j.jmh.2023.100169. eCollection 2023. PMID: 36814897

[Side effects of Sputnik V, Oxford-AstraZeneca, Sinopharm, and Covaxin and their associations with other variables among healthcare workers of a tertiary hospital in Iran.](#)

Oghazian S, Tavanaei Tamanaei T, Haghighi R, Faregh M, Oghazian MB. Int Immunopharmacol. 2023 Feb 20;117:109784. doi: 10.1016/j.intimp.2023.109784. Online ahead of print. PMID: 36812676

[Effectiveness of quadrivalent HPV vaccination in reducing vaccine-type and nonvaccine-type high risk HPV infection.](#)

Li C, Hall TG, Hall JJ, He WQ. Epidemiol Infect. 2023 Feb 15:1-25. doi: 10.1017/S0950268823000213. Online ahead of print. PMID: 36789960

[Mpox Perceptions and Vaccine Advocacy among the Healthcare Workers of Solid Organ Transplant Centers: A Multicenter, Cross-Sectional Survey in Saudi Arabia.](#)

Alhasan K, Sallam M, Aljamaan F, Ali T, Al-Jedai A, Nazmi A, Ajlan A, Aleid H, Karar E, Al-Awwami M, Almojalli H, Shah YZ, Mohammed AEI, Barry M, Alsubaie S, Altheaby A, Almaghrabi RS, Askandarani S, Memish ZA, Al-Tawfiq JA, Broering DC, Temsah MH. Healthcare (Basel). 2023 Feb 17;11(4):603. doi: 10.3390/healthcare11040603. PMID: 36833136

[Effectiveness of mRNA vaccine against Omicron-related infections in the real world: A systematic review and meta-analysis.](#)

Guo K, Ni P, Chang S, Jin Y, Duan G, Zhang R. Am J Infect Control. 2023 Feb 16:S0196-6553(23)00075-5. doi: 10.1016/j.ajic.2023.02.005. Online ahead of print. PMID: 36801346

[Application of Magnetocardiography to Screen for Inflammatory Cardiomyopathy and Monitor Treatment Response.](#)

Brala D, Thevathasan T, Grahl S, Barrow S, Violano M, Bergs H, Golpour A, Suwalski P, Poller W, Skurk C, Landmesser U, Heidecker B. J Am Heart Assoc. 2023 Feb 21;12(4):e027619. doi: 10.1161/JAHA.122.027619. Epub 2023 Feb 6. PMID: 36744683

[Targeting fibroblast activation protein \(FAP\): advances in CAR-T cell, antibody, and vaccine in cancer immunotherapy.](#)

Shahvali S, Rahiman N, Jaafari MR, Arabi L. Drug Deliv Transl Res. 2023 Feb 25. doi: 10.1007/s13346-023-01308-9. Online ahead of print. PMID: 36840906

[Multi-level quality improvement strategies to optimize HPV vaccination starting at the 9-year well child visit: Success stories from two private pediatric clinics.](#)

Zorn S, Darville-Sanders G, Vu T, Carter A, Treend K, Raunio C, Vasavada A. Hum Vaccin Immunother. 2023 Feb 16:2163807. doi: 10.1080/21645515.2022.2163807. Online ahead of print. PMID: 36798976

[Genomic Characterization of Skin and Soft Tissue Streptococcus pyogenes Isolates from a Low-Income and a High-Income Setting.](#)

Bah SY, Keeley AJ, Armitage EP, Khalid H, Chaudhuri RR, Senghore E, Manneh J, Tilley L, Marks M, Darboe S, Sesay AK, de Silva TI, Turner CE; MRCG Strep A Study Group. mSphere. 2023 Feb 21;8(1):e0046922. doi: 10.1128/msphere.00469-22. Epub 2022 Dec 12. PMID: 36507654

[In silico designed mRNA vaccines targeting CA-125 neoantigen in breast and ovarian cancer.](#)

Lu L, Ma W, Johnson CH, Khan SA, Irwin ML, Pusztai L. Vaccine. 2023 Feb 20:S0264-410X(23)00183-4. doi: 10.1016/j.vaccine.2023.02.048. Online ahead of print. PMID: 36813666

[Salmonella Typhimurium expressing chromosomally integrated Schistosoma mansoni Cathepsin B protects against schistosomiasis in mice.](#)

Hassan AS, Houle S, Labrie L, Perera DJ, Dozois CM, Ward BJ, Ndao M. NPJ Vaccines. 2023 Feb 27;8(1):27. doi: 10.1038/s41541-023-00599-w. PMID: 36849453

[New-onset retroperitoneal fibrosis following COVID-19 mRNA vaccination: Coincidental or vaccine-induced phenomenon?](#)

Ture HY, Kim NR, Nam EJ. Int J Rheum Dis. 2023 Feb 22. doi: 10.1111/1756-185X.14621. Online ahead of print. PMID: 36814401

[How large could the public health impact of introducing recombinant zoster vaccination for people aged ≥50 years in five Latin American countries be?](#)

Han R, Gomez JA, de Veras B, Pinto T, Guzman-Holst A, Nieto J, van Oorschot DAM. Hum Vaccin Immunother. 2023 Feb 23:2164144. doi: 10.1080/21645515.2022.2164144. Online ahead of print. PMID: 36821856

[A Novel Mathematical Model That Predicts the Protection Time of SARS-CoV-2 Antibodies.](#)

Xu Z, Wei D, Zhang H, Demongeot J. Viruses. 2023 Feb 20;15(2):586. doi: 10.3390/v15020586. PMID: 36851801

[Impact of host genetic polymorphisms on response to inactivated influenza vaccine in children.](#)

Tsang TK, Wang C, Tsang NNY, Fang VJ, Perera RAPM, Malik Peiris JS, Leung GM, Cowling BJ, Ip DKM. NPJ Vaccines. 2023 Feb 20;8(1):21. doi: 10.1038/s41541-023-00621-1. PMID: 36804941

[Characterization of the Human Immunodeficiency Virus \(HIV-1\) Envelope Glycoprotein Conformational States on Infectious Virus Particles.](#)

Nguyen HT, Wang Q, Anang S, Sodroski JG. J Virol. 2023 Feb 23:e0185722. doi: 10.1128/jvi.01857-22. Online ahead of print. PMID: 36815832

[Immunization of Mice with Virus-Like Vesicles of Kaposi Sarcoma-Associated Herpesvirus Reveals a Role for Antibodies Targeting ORF4 in Activating Complement-Mediated Neutralization.](#)

Lam AK, Roshan R, Miley W, Labo N, Zhen J, Kurland AP, Cheng C, Huang H, Teng PL, Harelson C, Gong D, Tam YK, Radu CG, Epeldegui M, Johnson JR, Zhou ZH, Whitby D, Wu TT. J Virol. 2023 Feb 28;97(2):e0160022. doi: 10.1128/jvi.01600-22. Epub 2023 Feb 9. PMID: 36757205

[Thyroid eye disease following administration of the BNT162B2 COVID-19 vaccine.](#)

Fujita H, Makino S, Hasegawa T, Saima Y, Tanaka Y, Nagashima S, Kakehashi A, Kaburaki T. QJM. 2023 Feb 24;116(2):130-132. doi: 10.1093/qjmed/hcac265. PMID: 36448695

[Outcome of early treatment of SARS-CoV-2 infection in patients with haematological disorders.](#)

Mikulska M, Testi D, Russo C, Balletto E, Sepulcri C, Bussini L, Dentone C, Magne F, Policarpo S, Campoli C, Miselli F, Cilli A, Ghiggi C, Aquino S, Di Grazia C, Giannella M, Giacobbe DR, Vena A, Raiola AM, Bonifazi F, Zinzani P, Cavo M, Lemoli R, Angelucci E, Viale P, Bassetti M, Bartoletti M. Br J Haematol. 2023 Feb 20. doi: 10.1111/bjh.18690. Online ahead of print. PMID: 36806152

[Long-Term Immunogenicity and *In Vitro* Prophylactic Protective Efficacy of *M. tuberculosis* Fusion Protein DR2 Combined with Liposomal Adjuvant DIMQ as a Boosting Vaccine for BCG.](#)

Mao LR, Du JP, Wang XC, Xu LF, Zhang YP, Sun QS, Shi ZL, Xing YR, Su YX, Wang SJ, Wang J, Ma JL, Zhang JY. ACS Infect Dis. 2023 Feb 21. doi: 10.1021/acsinfecdis.2c00570. Online ahead of print. PMID: 36808986

[Immunogenicity and protection of a variant nanoparticle vaccine that confers broad neutralization against SARS-CoV-2 variants.](#)

Logue J, Johnson RM, Patel N, Zhou B, Maciejewski S, Foreman B, Zhou H, Portnoff AD, Tian JH, Rehman A, McGrath ME, Haupt RE, Weston SM, Baracco L, Hammond H, Guebre-Xabier M, Dillen C, Madhangi M, Greene AM, Massare MJ, Glenn GM, Smith G, Frieman MB. Nat Commun. 2023 Feb 28;14(1):1130. doi: 10.1038/s41467-022-35606-6. PMID: 36854666

[Bioaerosol dispersion and environmental risk simulation: Method and a case study for a biopharmaceutical plant of Gansu province, China.](#)

Xu X, Wang C, Wang P, Chu Y, Guo J, Bo X, Lin A. Sci Total Environ. 2023 Feb 20;860:160506. doi: 10.1016/j.scitotenv.2022.160506. Epub 2022 Nov 25. PMID: 36442625

[Integrated analyses reveal a hinge glycan regulates coronavirus spike tilting and virus infectivity.](#)

Chmielewski D, Wilson E, Pintilie G, Zhao P, Chen M, Schmid M, Simmons G, Wells L, Jin J, Singharoy A, Chiu W. Res Sq. 2023 Feb 15:rs.3.rs-2553619. doi: 10.21203/rs.3.rs-2553619/v1. Preprint. PMID: 36824920

[Immunogenicity 6 months post COVID-19 mRNA vaccination among adolescents with juvenile idiopathic arthritis on treatment with TNF inhibitors.](#)

Dimopoulou D, Tsolia MN, Spyridis N, Maritsi DN. Rheumatology (Oxford). 2023 Feb 23;62(SI2):SI205-SI209. doi: 10.1093/rheumatology/keac352. PMID: 35788275

[Possibility of mpox viral transmission and control from high-risk to the general population: a modeling study.](#)

Yang S, Guo X, Zhao Z, Abudunaibi B, Zhao Y, Rui J, Wang Y, Song W, Wei H, Chen T. BMC Infect Dis. 2023 Feb 24;23(1):119. doi: 10.1186/s12879-023-08083-5. PMID: 36829116

[Comparative frequency of specified adverse events following Vero cell culture-derived Japanese encephalitis and Vi capsular polysaccharide typhoid vaccines in U.S. military personnel, July 2011-August 2019.](#)

Seshadri S, Martin SW, Hills SL, Collins LC Jr. Vaccine. 2023 Feb 24;41(9):1537-1540. doi: 10.1016/j.vaccine.2023.01.061. Epub 2023 Jan 30. PMID: 36725428

[Engineered Bacterial Outer Membrane Vesicles with Lipidated Heterologous Antigen as an Adjuvant-Free Vaccine Platform for Streptococcus suis.](#)

Li Q, Zhou G, Fei X, Tian Y, Wang S, Shi H. Appl Environ Microbiol. 2023 Feb 21:e0204722. doi: 10.1128/aem.02047-22. Online ahead of print. PMID: 36809058

[Are pediatricians responsible for maintaining high MMR vaccination coverage? Nationwide survey on parental knowledge and attitudes towards MMR vaccine in Serbia.](#)

Loncarevic GS, Jovanovic AL, Kanazir MS, Kistic Tepavcevic DB, Maric GD, Pekmezovic TD. PLoS One. 2023 Feb 16;18(2):e0281495. doi: 10.1371/journal.pone.0281495. eCollection 2023. PMID: 36795643

[Disparities in greenspace access during COVID-19 mobility restrictions.](#)

Lusseau D, Baillie R. Environ Res. 2023 Feb 23;115551. doi: 10.1016/j.envres.2023.115551. Online ahead of print. PMID: 36841525

[Lipid nanoparticles \(LNP\) induce activation and maturation of antigen presenting cells in young and aged individuals.](#)

Connors J, Joyner D, Mege NJ, Cusimano GM, Bell MR, Marcy J, Taramangalam B, Kim KM, Lin PJC, Tam YK, Weissman D, Kutzler MA, Alameh MG, Haddad EK. Commun Biol. 2023 Feb 17;6(1):188. doi: 10.1038/s42003-023-04555-1. PMID: 36805684

[Highlights into historical and current immune interventions for cancer.](#)

Cole K, Al-Kadhimi Z, Talmadge JE. Int Immunopharmacol. 2023 Feb 25;117:109882. doi: 10.1016/j.intimp.2023.109882. Online ahead of print. PMID: 36848790

[Patterns of Diverse and Changing Sentiments Towards COVID-19 Vaccines: A Sentiment Analysis Study Integrating 11 Million Tweets and Surveillance Data Across over 180 Countries.](#)

Wang H, Li Y, Hutch MR, Kline AS, Otero S, Mithal LB, Miller ES, Naidech A, Luo Y. J Am Med Inform Assoc. 2023 Feb 23:ocad029. doi: 10.1093/jamia/ocad029. Online ahead of print. PMID: 36821435

[Safety, tolerability, and immunogenicity of V114 pneumococcal vaccine compared with PCV13 in a 2+1 regimen in healthy infants: A phase III study \(PNEU-PED-EU-2\).](#)

Benfield T, Rämetsä M, Valentini P, Seppä I, Dagan R, Richmond P, Mercer S, Churchill C, Lupinacci R, McFetridge R, Park J, Wittke F, Banniattis N, Musey L, Bickham K, Kaminski J. Vaccine. 2023 Feb 23:S0264-410X(23)00176-7. doi: 10.1016/j.vaccine.2023.02.041. Online ahead of print. PMID: 36841723

[Implementing interventions to start HPV vaccination at age 9: Using the evidence we have.](#)

Brandt HM, Footman A, Adsul P, Ramanadhan S, Kepka D. Hum Vaccin Immunother. 2023 Feb 20:2180250. doi: 10.1080/21645515.2023.2180250. Online ahead of print. PMID: 36803261

[Parental preferences for rotavirus vaccination for their children under 5 years old in China: A discrete choice experiment.](#)

Ma W, Zhang L, Ren D, Meng X, Yin J, Sun Q. Hum Vaccin Immunother. 2023 Feb 15:2179222. doi: 10.1080/21645515.2023.2179222. Online ahead of print. PMID: 36794417

[An Equity Analysis of Zero-Dose Children in India Using the National Family Health Survey Data: Status, Challenges, and Next Steps.](#)

Taneja G, Datta E, Sapru M, Johri M, Singh K, Jandu HS, Das S, Ray A, Laserson K, Dhawan V. Cureus. 2023 Feb 24;15(2):e35404. doi: 10.7759/cureus.35404. eCollection 2023 Feb. PMID: 36851944

[An integrated chance constraints approach for optimal vaccination strategies under uncertainty for COVID-19.](#)

Gong J, Gujjula KR, Ntamo L. Socioecon Plann Sci. 2023 Feb 21:101547. doi: 10.1016/j.seps.2023.101547. Online ahead of print. PMID: 36845344

[Sociodemographic differences in Covid-19 vaccine uptake in Denmark: a nationwide register-based cohort study.](#)

Gram MA, Moustsen-Helms IR, Valentiner-Branth P, Emborg HD. BMC Public Health. 2023 Feb 24;23(1):391. doi: 10.1186/s12889-023-15301-x. PMID: 36829138

[Acute central nervous system inflammation following COVID-19 vaccination: An observational cohort study.](#)

Lee S, Muccilli A, Schneider R, Selchen D, Krysko KM. Mult Scler. 2023 Feb 25:13524585231154780. doi: 10.1177/13524585231154780. Online ahead of print. PMID: 36840605

[Structure-based design of oligomeric receptor-binding domain \(RBD\) recombinant proteins as potent vaccine candidates against SARS-CoV-2.](#)

Zhang T, Zheng N, Wang Z, Xu X. Hum Vaccin Immunother. 2023 Feb 27:2174755. doi: 10.1080/21645515.2023.2174755. Online ahead of print. PMID: 36846890

[New HIV Vaccine Approach Safely Stimulated Rare Precursors to Broadly Neutralizing Antibodies.](#)

Suran M. JAMA. 2023 Feb 21;329(7):527-528. doi: 10.1001/jama.2022.23242. PMID: 36723948

[The social and socio-political embeddedness of COVID-19 vaccination decision-making: A five-country qualitative interview study from Europe.](#)

Zimmermann BM, Paul KT, Araújo ER, Buyx A, Ferstl S, Fiske A, Kraus D, Marelli L, McLennan S, Porta V, Prainsack B, Radhuber IM, Saxinger G. Vaccine. 2023 Feb 16:S0264-410X(23)00139-1. doi: 10.1016/j.vaccine.2023.02.012. Online ahead of print. PMID: 36813665

[Arepally GM, Ortel TL. Vaccine-induced immune thrombotic thrombocytopenia: what we know and do not know. Blood. 2021;138\(4\):293-298.](#)

[No authors listed] Blood. 2023 Feb 16;141(7):808. doi: 10.1182/blood.2022017479. PMID: 36795442

[Age-Related Associations of Altruism with Attitudes towards COVID-19 and Vaccination: A Representative Survey in the North of Italy.](#)

Barbieri V, Wiedermann CJ, Lombardo S, Plagg B, Piccoliori G, Gärtner T, Engl A. Behav Sci (Basel). 2023 Feb 19;13(2):188. doi: 10.3390/bs13020188. PMID: 36829417

[Effectiveness of mRNA and viral-vector vaccines in epidemic period led by different SARS-CoV-2 variants: a systematic review and meta-analysis.](#)

Zhang J, Yang W, Huang F, Zhang K. J Med Virol. 2023 Feb 28. doi: 10.1002/jmv.28623. Online ahead of print. PMID: 36852651

[20 million pregnant women with group B streptococcus carriage: consequences, challenges, and opportunities for prevention.](#)

Paul P, Gonçalves BP, Le Doare K, Lawn JE. Curr Opin Pediatr. 2023 Apr 1;35(2):223-230. doi: 10.1097/MOP.0000000000001223. Epub 2023 Feb 16. PMID: 36749143

[It was a pleasure to read, "Exploring COVID-19 Vaccine Hesitancy Among Stakeholders in African American and Latinx Communities in the Deep South Through the Lens of the Health Belief Model".](#)

Stubbs AW, Regmi S, Ward KD. Am J Health Promot. 2023 Feb 25:8901171231159474. doi: 10.1177/08901171231159474. Online ahead of print. PMID: 36840695

[Application and comparison of lyophilisation protocols to enhance stable long-term storage of filovirus pseudotypes for use in antibody neutralisation tests.](#)

Neto MM, Wright E, Temperton N, Soema P, Ten Have R, Ploemen I, Scott S. J Appl Microbiol. 2023 Feb 16;134(2):lxac067. doi: 10.1093/jambio/lxac067. PMID: 36724296

[Effect of persuasive messaging about COVID-19 vaccines for 5- to 11-year-old children on parent intention to vaccinate.](#)

Kaufman J, Steffens MS, Hoq M, King C, Marques MD, Mao K, Bullivant B, Danchin M. J Paediatr Child Health. 2023 Feb 18. doi: 10.1111/jpc.16374. Online ahead of print. PMID: 36807943

[A novel high throughput plate-based method for 2-PE quantification in novel multidose vaccines \(R21 malaria, Covishield and Covovax\) and combination vaccines \(Hexavalent\).](#)

Ranade D, Jena R, Patil K, Dogar V, Sancheti S, Deore V, Ashtagi S, Gairola S. Vaccine. 2023 Feb 17:S0264-410X(23)00174-3. doi: 10.1016/j.vaccine.2023.02.039. Online ahead of print. PMID: 36803871

[Universal selenium nanoadjuvant with immunopotentiating and redox-shaping activities inducing high-quality immunity for SARS-CoV-2 vaccine.](#)

Lai H, Xu L, Liu C, Shi S, Jiang Y, Yu Y, Deng B, Chen T. Signal Transduct Target Ther. 2023 Feb 27;8(1):88. doi: 10.1038/s41392-023-01371-1. PMID: 36849546

[Mining adverse events in large frequency tables with ontology, with an application to the vaccine adverse event reporting system.](#)

Zhao B, Zhao L. Stat Med. 2023 Feb 15. doi: 10.1002/sim.9684. Online ahead of print. PMID: 36791465

[Prevalence of Serum Antibody Titers against Core Vaccine Antigens in Italian Dogs.](#)

Dall'Ara P, Lauzi S, Zambarbieri J, Servida F, Barbieri L, Rosenthal R, Turin L, Scarparo E, Filipe J. Life (Basel). 2023 Feb 20;13(2):587. doi: 10.3390/life13020587. PMID: 36836944

[Timing of Bariatric Surgery and COVID-19 Vaccination: Experience From a High-volume Single Center.](#)

Vitiello A, Berardi G, Velotti N, Schiavone V, Abu-Abeid A, Musella M. Surg Laparosc Endosc Percutan Tech. 2023 Feb 21. doi: 10.1097/SLE.0000000000001154. Online ahead of print. PMID: 36821652

[Avelumab in Men With Metastatic Castration-Resistant Prostate Cancer, Enriched for Patients Treated Previously With a Therapeutic Cancer Vaccine.](#)

Madan RA, Redman JM, Karzai F, Dahut WL, Cordes L, Fakhrejehani F, Vu T, Sheikh N, Schlom J, Gulley JL. J Immunother. 2023 Feb 24. doi: 10.1097/CJI.0000000000000459. Online ahead of print. PMID: 36821354

[Glioblastoma treatment slowly moves toward change: novel druggable targets and translational horizons in 2022.](#)

Gatto L, Franceschi E, Tosoni A, Di Nunno V, Bartolini S, Brandes AA. Expert Opin Drug Discov. 2023 Mar;18(3):269-286. doi: 10.1080/17460441.2023.2174097. Epub 2023 Feb 16. PMID: 36718723

[The safety and immunogenicity of inactivated COVID-19 vaccine in old pulmonary tuberculosis patients.](#)

Yang L, Xiang F, Wang D, Guo Q, Deng B, Jiang D, Ren H. Eur J Clin Microbiol Infect Dis. 2023 Feb 28. doi: 10.1007/s10096-023-04566-0. Online ahead of print. PMID: 36849838

[Nanotechnology for next-generation cancer immunotherapy: State of the art and future perspectives.](#)

Chen Y. J Control Release. 2023 Feb 15:S0168-3659(23)00126-8. doi: 10.1016/j.jconrel.2023.02.016. Online ahead of print. PMID: 36805873

[Trajectories of Seroprevalence and Neutralizing Activity of Antibodies against SARS-CoV-2 in Southern Switzerland between July 2020 and July 2021: An Ongoing, Prospective Population-Based Cohort Study.](#)

Amati R, Piumatti G, Franscella G, Buttaroni P, Camerini AL, Corna L, Levati S, Fadda M, Fiordelli M, Annoni AM, Bezani K, Amendola A, Fragoso Corti C, Sabatini S, Kaufmann M, Frei A, Puhan MA, Crivelli L, Albanese E, On Behalf Of The Corona Immunitas Ticino Study Group. Int J Environ Res Public Health. 2023 Feb 19;20(4):3703. doi: 10.3390/ijerph20043703. PMID: 36834397

[Study protocol for cholera vaccination as a model to measure the inflammatory response in the gut: A case of modulation with a Lactobacillus plantarum K8 lysate.](#)

Park MY, Park SY, Hartog A, van Hoffen E, Kardinaal A, Kim J, Choi HJ, Kwon O, Kim JY. PLoS One. 2023 Feb 21;18(2):e0281817. doi: 10.1371/journal.pone.0281817. eCollection 2023. PMID: 36809275

[Identification of Five Tumor Antigens for Development and Two Immune Subtypes for Personalized Medicine of mRNA Vaccines in Papillary Renal Cell Carcinoma.](#)

Hu J, Yuan Z, Jiang Y, Mo Z. J Pers Med. 2023 Feb 18;13(2):359. doi: 10.3390/jpm13020359. PMID: 36836593

[Incorporation of SARS-CoV-2 spike NTD to RBD Protein Vaccine Improves Immunity Against Viral Variants.](#)

Montgomerie I, Bird TW, Palmer OR, Mason NC, Pankhurst TE, Lawley B, Hernández LC, Harfoot R, Authier-Hall A, Anderson DE, Hilligan KL, Buick KH, Mbenza NM, Mittelstädt G, Maxwell S, Sinha S, Kuang J, Subbarao K, Parker EJ, Sher A, Hermans IF, Ussher JE, Quiñones-Mateu ME, Comoletti D, Connor LM; On behalf theVAANZ Group. iScience. 2023 Feb 20:106256. doi: 10.1016/j.isci.2023.106256. Online ahead of print. PMID: 36845030

[Microsurgical complication associated with vaccine-induced immune thrombotic thrombocytopenia \(VITT\): A case report.](#)

Hung CT, Hsu H. Medicine (Baltimore). 2023 Feb 17;102(7):e33013. doi: 10.1097/MD.00000000000033013. PMID: 36800613

[Vaccine Rhetorics, by Heidi Yoston Lawrence. Columbus, OH: The Ohio State University Press, 2020.](#)

Navin MC. J Med Humanit. 2023 Feb 21:1-3. doi: 10.1007/s10912-023-09789-y. Online ahead of print. PMID: 36809637

[Ionic Liquid-Based Transcutaneous Peptide Antitumor Vaccine: Therapeutic Effect in a Mouse Tumor Model.](#)

Shimizu T, Matsuzaki T, Fukuda S, Yoshioka C, Shimazaki Y, Takese S, Yamanaka K, Nakae T, Ishibashi M, Hamamoto H, Ando H, Ishima Y, Ishida T. AAPS J. 2023 Feb 17;25(2):27. doi: 10.1208/s12248-023-00790-w. PMID: 36805860

[Central diabetes insipidus: a late sequela of BNT162b2 SARS-CoV-2 mRNA vaccine?](#)

Ishay A, Shacham EC. BMC Endocr Disord. 2023 Feb 22;23(1):47. doi: 10.1186/s12902-023-01296-4. PMID: 36810011

[Characteristics of COVID-19 vaccinated and unvaccinated patients admitted to Careggi University Hospital, Florence, Italy.](#)

Paggi R, Barbiero A, Manciuilli T, Miftode A, Tilli M, Lagi F, Mencarini J, Borchì B, Pozzi M, Bartalesi F, Spinicci M, Martini L, Coppola A, Nozzoli C, Peris A, Bonizzoli M, Pieralli F, Bartoloni A, Zammarchi L. Intern Emerg Med. 2023 Feb 28. doi: 10.1007/s11739-023-03231-w. Online ahead of print. PMID: 36853393

[Vaccination and mortality from COVID-19: a comparative study between hemodialysis, peritoneal dialysis, and non-dialysis adult population in Panama.](#)

Courville KJ, Bustamante NE, Nuñez-Samudio V, Pecchio M, Landires I, Viggiano C, Durán H, Novoa N, Alvarado E, Vargas F, Salado D, Manzanares J, Haughton K, Cuero C, Niedda M, Valdés R. Int Urol Nephrol. 2023 Feb 24:1-8. doi: 10.1007/s11255-023-03529-w. Online ahead of print. PMID: 36828920

[Self-assembled multiepitope nanovaccine based on NoV P particles induces effective and lasting protection against H3N2 influenza virus.](#)

Nie J, Wang Q, Jin S, Yao X, Xu L, Chang Y, Ding F, Li Z, Sun L, Shi Y, Shan Y. Nano Res. 2023 Feb 16:1-10. doi: 10.1007/s12274-023-5395-6. Online ahead of print. PMID: 36820263

[Evaluating potential impacts of a preferential vaccine recommendation for adults aged 65 and older on United States influenza burden.](#)

Morris SE, Grohskopf LA, Ferdinands JM, Reed C, Biggerstaff M. Epidemiology. 2023 Feb 21:e001603. doi: 10.1097/EDE.0000000000001603. Online ahead of print. PMID: 36807266

[COVID-19 vaccination intentions and subsequent uptake: An analysis of the role of marginalisation in society using British longitudinal data.](#)

Mendolia S, Walker I. Soc Sci Med. 2023 Feb 15;321:115779. doi: 10.1016/j.socscimed.2023.115779. Online ahead of print. PMID: 36842308

[Knowledge, attitudes, and factors determining the willingness for COVID-19 vaccination among students in Bangladesh: An online-based cross-sectional study.](#)

Talukder A, Sharmin S, Nath CD, Haq I, Hossain MI, Habib MJ, Sara SS. Z Gesundh Wiss. 2023 Feb 17:1-10. doi: 10.1007/s10389-023-01851-2. Online ahead of print. PMID: 36811014

[Assessment of attenuation of varicella-zoster virus vaccines based on genomic comparison.](#)

Moon JY, Seo J, Lee J, Park D. J Med Virol. 2023 Feb 18. doi: 10.1002/jmv.28590. Online ahead of print. PMID: 36807919

[Simulating potential outbreaks of Delta and Omicron variants based on contact-tracing data: A modelling study in Fujian Province, China.](#)

Guo Y, Ye W, Zhao Z, Guo X, Song W, Su Y, Zhao B, Ou J, Deng Y, Chen T. Infect Dis Model. 2023 Mar;8(1):270-281. doi: 10.1016/j.idm.2023.02.002. Epub 2023 Feb 18. PMID: 36846047

[Humoral and cellular immune response dynamics in Japanese healthcare workers up to six months after receiving a third dose of BNT162b2 monovalent vaccine.](#)

Uwamino Y, Yokoyama T, Sato Y, Shibata A, Kurafuji T, Tanabe A, Noguchi M, Arai T, Ohno A, Yokota H, Namkoong H, Nishimura T, Kosaki K, Hasegawa N, Wakui M, Murata M, Matsushita H. Vaccine. 2023 Feb 24;41(9):1545-1549. doi: 10.1016/j.vaccine.2023.01.049. Epub 2023 Jan 31. PMID: 36732167

[Inexpensive High-Throughput Multiplexed Biomarker Detection Using Enzymatic Metallization with Cellphone-Based Computer Vision.](#)

Rafat N, Brewer L, Das N, Trivedi DJ, Kaszala BK, Sarkar A. ACS Sens. 2023 Feb 24;8(2):534-542. doi: 10.1021/acssensors.2c01429. Epub 2023 Feb 8. PMID: 36753573

[Alanine-based spacers promote an efficient antigen processing and presentation in neoantigen polypeptide vaccines.](#)

Aguilar-Gurrieri C, Barajas A, Rovirosa C, Ortiz R, Urrea V, de la Iglesia N, Clotet B, Blanco J, Carrillo J. Cancer Immunol Immunother. 2023 Feb 23. doi: 10.1007/s00262-023-03409-3. Online ahead of print. PMID: 36820900

[The importance of cultural tailoring of communicators and media outlets in an influenza vaccination awareness campaign: a digital randomized trial.](#)

Habib GL, Yousuf H, Bredius L, Bindraban NR, Winter MM, Scherder EJA, van der Linden S, Narula J, Hofstra L. Sci Rep. 2023 Feb 16;13(1):1744. doi: 10.1038/s41598-023-27910-y. PMID: 36797274

[Structural insights into protection against a SARS-CoV-2 spike variant by T cell receptor \(TCR\) diversity.](#)

Wu D, Efimov GA, Bogolyubova AV, Pierce BG, Mariuzza RA. J Biol Chem. 2023 Feb 16:103035. doi: 10.1016/j.jbc.2023.103035. Online ahead of print. PMID: 36806685

[Coimmunization with Preerythrocytic Antigens alongside Circumsporozoite Protein Can Enhance Sterile Protection against *Plasmodium* Sporozoite Infection.](#)

Vigdorovich V, Patel H, Watson A, Raappana A, Reynolds L, Selman W, Beeman S, Edlefsen PT, Kappe SHI, Sather DN. Microbiol Spectr. 2023 Feb 27:e0379122. doi: 10.1128/spectrum.03791-22. Online ahead of print. PMID: 36847573

[Effect of cigarette smoke on mucosal vaccine response with activation of plasmacytoid dendritic cells: The outcomes of in vivo and in vitro experiments.](#)

Suzuki F, Maeyama JI, Kubota A, Nishimune A, Horiguchi S, Takii T, Urasaki Y, Shimada I, Iho S. Vaccine. 2023 Feb 17;41(8):1447-1456. doi: 10.1016/j.vaccine.2023.01.019. Epub 2023 Jan 24. PMID: 36702691

[CD4 binding site immunogens elicit heterologous anti-HIV-1 neutralizing antibodies in transgenic and wild-type animals.](#)

Gristick HB, Hartweger H, Loewe M, van Schooten J, Ramos V, Oliveira TY, Nishimura Y, Koranda NS, Wall A, Yao KH, Poston D, Gazumyan A, Wiatr M, Horning M, Keeffe JR, Hoffmann MAG, Yang Z, Abernathy ME, Dam KA, Gao H, Gnanapragasam PNP, Kakutani LM, Pavlovitch-Bedzyk AJ, Seaman MS, Howarth M, McGuire AT, Stamatatos L, Martin MA, West AP Jr, Nussenzweig MC, Bjorkman PJ. Sci Immunol. 2023 Feb 17;8(80):eade6364. doi: 10.1126/sciimmunol.ade6364. Epub 2023 Feb 10. PMID: 36763635

[Persistence of immunity against hepatitis A in Brazilian children vaccinated with a single dose of inactivated virus vaccine.](#)

Brito WI, Oliveira RM, Silva J, Tubarão LN, Bom APDA, Melgaço JG, Pinto MA, Souto FJD. J Viral Hepat. 2023 Feb 20. doi: 10.1111/jvh.13819. Online ahead of print. PMID: 36807662

[Frequent Transmission of Streptococcus pneumoniae Serotype 35B and 35D, Clonal Complex 558 Lineage, across Continents and the Formation of Multiple Clades in Japan.](#)

Shinohara K, Fujisawa T, Chang B, Ito Y, Suga S, Matsumura Y, Yamamoto M, Nagao M, Ohnishi M, Sugai M, Nakano S. Antimicrob Agents Chemother. 2023 Feb 16;67(2):e0108322. doi: 10.1128/aac.01083-22. Epub 2023 Jan 18. PMID: 36651739

[Superior mesenteric artery thrombosis after the messenger RNA-1273 vaccine.](#)

Chen CW, Chen WY, Chang R, Kao CH. Int J Rheum Dis. 2023 Feb 26. doi: 10.1111/1756-185X.14614. Online ahead of print. PMID: 36842162

[Evaluation of eight lateral flow tests for the detection of anti-SARS-CoV-2 antibodies in a vaccinated population.](#)

Greenland-Bews C, Byrne RL, Owen SI, Watkins RL, Benguey D, Buist K, Clerkin K, Escadafal C, Finch LS, Gould S, Giorgi E, Hodgkinson A, Mashenko L, Powell D, Savage HR, Thompson CR, Turtle L, Wardale J, Wooding D, Edwards T, Atienzar AC, Adams ER. BMC Infect Dis. 2023 Feb 23;23(1):110. doi: 10.1186/s12879-023-08033-1. PMID: 36823583

[Preliminary Estimates of Effectiveness of Monovalent mRNA Vaccines in Preventing Symptomatic SARS-CoV-2 Infection Among Children Aged 3-5 Years - Increasing Community Access to Testing Program, United States, July 2022-February 2023.](#)

Fleming-Dutra KE, Ciesla AA, Roper LE, Smith ZR, Miller JD, Accorsi EK, Verani JR, Shang N, Derado G, Wiegand RE, Pilishvili T, Britton A, Link-Gelles R. MMWR Morb Mortal Wkly Rep. 2023 Feb 17;72(7):177-182. doi: 10.15585/mmwr.mm7207a3. PMID: 36795625

[Automated monitoring and detection of disease using a generic facial feature scoring system - A case study on FMD infected cows.](#)

Hofstra G, van Abeelen H, Duindam M, Houben B, Kuijpers J, Arendsen T, van der Kolk M, Rapp F, van Spaendonk J, Gonzales JL, Petie R. Prev Vet Med. 2023 Feb 18;213:105880. doi: 10.1016/j.prevetmed.2023.105880. Online ahead of print. PMID: 36841043

[Investigation into the use of gamma irradiated Cytodex-1 microcarriers to produce a human cytomegalovirus \(HCMV\) vaccine candidate in epithelial cells.](#)

Spatafore Iii D, Warakomski D, Hofmann C, Wagner JM, Christanti S. J Biotechnol. 2023 Feb 18:S0168-1656(23)00038-X. doi: 10.1016/j.jbiotec.2023.02.005. Online ahead of print. PMID: 36804577

[Surveillance for multisystem inflammatory syndrome in U.S. children aged 5-11 years who received Pfizer-BioNTech COVID-19 vaccine, November 2021-March 2022.](#)

Cortese MM, Taylor AW, Akinbami LJ, Thames-Allen A, Yousaf AR, Campbell AP, Maloney SA, Harrington T, Anyalechi EG, Munshi D, Kamidani S, Curtis CR, McCormick DW, Staat MA, Edwards KM, Creech CB, Museru O, Marquez P, Thompson D, Su JR, Schlaudecker EP, Broder KR. J Infect Dis. 2023 Feb 23;jiad051. doi: 10.1093/infdis/jiad051. Online ahead of print. PMID: 36821777

[Analysis of Bacteriophage Behavior of a Human RNA Virus, SARS-CoV-2, through the Integrated Approach of Immunofluorescence Microscopy, Proteomics and D-Amino Acid Quantification.](#)

Brogna C, Costanzo V, Brogna B, Bisaccia DR, Brogna G, Giuliano M, Montano L, Viduto V, Cristoni S, Fabrowski M, Piscopo M. Int J Mol Sci. 2023 Feb 15;24(4):3929. doi: 10.3390/ijms24043929. PMID: 36835341

[Long non-coding RNA-derived peptides are immunogenic and drive a potent anti-tumour response.](#)

Barczak W, Carr SM, Liu G, Munro S, Nicastrì A, Lee LN, Hutchings C, Ternette N, Klenerman P, Kanapin A, Samsonova A, La Thangue NB. Nat Commun. 2023 Feb 25;14(1):1078. doi: 10.1038/s41467-023-36826-0. PMID: 36841868

[Insights into Synonymous Codon Usage Bias in Hepatitis C Virus and Its Adaptation to Hosts.](#)

Khandia R, Khan AA, Karuvantevida N, Gurjar P, Rzhepakovsky IV, Legaz I. Pathogens. 2023 Feb 15;12(2):325. doi: 10.3390/pathogens12020325. PMID: 36839597

[Fear God, Not COVID-19: Is Conservative Protestantism Associated with Risky Pandemic Lifestyles?](#)

Bartkowski JP, Klee K, Hill TD, Garcia-Alexander G, Ellison CG, Burdette AM. Healthcare (Basel). 2023 Feb 15;11(4):582. doi: 10.3390/healthcare11040582. PMID: 36833117

[Update on Covid-19: vaccines, timing of transplant after COVID-19 infection and use of positive donors.](#)

Boutin CA, Alamri M, Ison MG. Curr Opin Organ Transplant. 2023 Feb 16. doi: 10.1097/MOT.0000000000001056. Online ahead of print. PMID: 36809306

[Challenges in Cervical Cancer Prevention: Real-World Scenario in India.](#)

Kaur S, Sharma LM, Mishra V, Goyal MGB, Swasti S, Talele A, Parikh PM. South Asian J Cancer. 2023 Feb 25;12(1):9-16. doi: 10.1055/s-0043-1764222. eCollection 2023 Jan. PMID: 36851931

[Spray Drying Is a Viable Technology for the Preservation of Recombinant Proteins in Microalgae.](#)

Vilatte A, Spencer-Milnes X, Jackson HO, Purton S, Parker B. Microorganisms. 2023 Feb 17;11(2):512. doi: 10.3390/microorganisms11020512. PMID: 36838478

[An inactivated NDV-HXP-S COVID-19 vaccine elicits a higher proportion of neutralizing antibodies in humans than mRNA vaccination.](#)

Carreño JM, Raskin A, Singh G, Tcheou J, Kawabata H, Gleason C, Srivastava K, Vigdorovich V, Dambrauskas N, Gupta SL, González Domínguez I, Martínez JL, Slamanig S, Sather DN, Raghunandan R, Wirachwong P, Muangnoicharoen S, Pitisuttithum P, Wrammert J, Suthar MS, Sun W, Palese P, García-Sastre A, Simon V, Krammer F. Sci Transl Med. 2023 Feb 15;15(683):eabo2847. doi: 10.1126/scitranslmed.abo2847. Epub 2023 Feb 15. PMID: 36791207

[Effects of a novel recombinant Gonadotropin-Releasing Hormone-1 vaccine on the reproductive function of mixed-breed dogs \(Canis familiaris\) in Taiwan.](#)

Chang AM, Chen CC, Lee JW, Hou DL, Huang HH, Ke GM. Vaccine. 2023 Feb 25:S0264-410X(23)00215-3. doi: 10.1016/j.vaccine.2023.02.061. Online ahead of print. PMID: 36849340

[Possible biased virulence attenuation in the Senegal strain of Ehrlichia ruminantium by ntrX gene conversion from an inverted segmental duplication.](#)

Gordon JL, Oliva Chavez AS, Martínez D, Vachieri N, Meyer DF. PLoS One. 2023 Feb 17;18(2):e0266234. doi: 10.1371/journal.pone.0266234. eCollection 2023. PMID: 36800354

[Safety and efficacy of autologous cell vaccines in solid tumors: a systematic review and meta-analysis of randomized control trials.](#)

Bastin DJ, Montroy J, Kennedy MA, Martel AB, Shorr R, Ghiasi M, Boucher DM, Wong B, Gresham L, Diallo JS, Fergusson DA, Lalu MM, Kekre N, Auer RC. *Sci Rep.* 2023 Feb 27;13(1):3347. doi: 10.1038/s41598-023-29630-9. PMID: 36849805

[Enhanced antitumor activity of a novel, oral, helper epitope-containing WT1 protein vaccine in a model of murine leukemia.](#)

Minagawa H, Hashii Y, Nakajima H, Fujiki F, Morimoto S, Nakata J, Shirakawa T, Katayama T, Tsuboi A, Ozono K. *BMC Cancer.* 2023 Feb 20;23(1):167. doi: 10.1186/s12885-023-10547-5. PMID: 36803483

[Potent Therapeutic Strategies for COVID-19 with Single-Domain Antibody Immunoliposomes Neutralizing SARS-CoV-2 and Lip/cGAMP Enhancing Protective Immunity.](#)

Zhou Y, Lu X, Wang X, Ying T, Tan X. *Int J Mol Sci.* 2023 Feb 17;24(4):4068. doi: 10.3390/ijms24044068. PMID: 36835479

[Multiplex Assay for Simultaneous Detection of Antibodies against Crimean-Congo Hemorrhagic Fever Virus Nucleocapsid Protein and Glycoproteins in Ruminants.](#)

Hoste ACR, Djadjovski I, Jiménez-Clavero MÁ, Rueda P, Barr JN, Sastre P. *Microbiol Spectr.* 2023 Feb 23:e0260022. doi: 10.1128/spectrum.02600-22. Online ahead of print. PMID: 36815788

[Childhood vaccine hesitancy in two regions with different socioeconomic backgrounds in Turkey.](#)

Durmuş Sarıkahya S, Güden E, Sümeyye Yorulmaz D. *Z Gesundh Wiss.* 2023 Feb 23:1-10. doi: 10.1007/s10389-023-01854-z. Online ahead of print. PMID: 36855466

[Cognitive and Behavioral Factors Predicting the Decision to Vaccinate against COVID-19 in Clinical Psychiatric Population-A Cross-Sectional Survey.](#)

Marcu GM, Radu AM, Bucuță MD, Fleacă RS, Tanasescu C, Roman MD, Boicean A, Bacilă CI. *Vaccines (Basel).* 2023 Feb 15;11(2):441. doi: 10.3390/vaccines11020441. PMID: 36851318

[Tracking COVID-19 vaccination expectancies and vaccination refusal in the United States.](#)

Hennesy M, Bleakley A, Langbaum JB. *Psychol Health Med.* 2023 Feb 21:1-20. doi: 10.1080/13548506.2023.2181977. Online ahead of print. PMID: 36809232

[Development and validation of a mass spectrometry based analytical method to quantify the ratios in hemagglutinin trimers in quadrivalent influenza nanoparticle vaccine - FluMos-v1.](#)

Shajahan A, Cai CX, Wolff J, Yang RS, Ivleva VB, Gowetski DB, Gall JGD, Lei QP. *Anal Methods.* 2023 Feb 16;15(7):896-900. doi: 10.1039/d2ay01890j. PMID: 36723411

[COVID arm that appeared in the contralateral upper extremity after mRNA-1273 booster inoculation.](#)

Sanomachi T, Sumiyoshi Okuma H, Yonemori K. *Int Cancer Conf J.* 2023 Feb 20:1-4. doi: 10.1007/s13691-023-00598-7. Online ahead of print. PMID: 36843626

[Evolution of increased positive charge on the SARS-CoV-2 spike protein may be adaptation to human transmission.](#)

Cotten M, Phan MVT. *iScience.* 2023 Feb 18:106230. doi: 10.1016/j.isci.2023.106230. Online ahead of print. PMID: 36845032

[Evolution of Antibody Responses in HIV-1 CRF01_AE Acute Infection: Founder Envelope V1V2 Impacts the Timing and Magnitude of Autologous Neutralizing Antibodies.](#)

Kuriakose Gift S, Wieczorek L, Sanders-Buell E, Zemil M, Molnar S, Donofrio G, Townsley S, Chenine AL, Bose M, Trinh HV, Barrows BM, Sriplienchan S, Kitsiripornchai S, Nitayapan S, Eller LA, Rao M, Ferrari G, Michael NL, Ake JA, Krebs SJ, Robb ML, Tovanabutra S, Polonis VR. J Virol. 2023 Feb 28;97(2):e0163522. doi: 10.1128/jvi.01635-22. Epub 2023 Feb 7. PMID: 36749076

[The impact of the introduction of ten- or thirteen-valent pneumococcal conjugate vaccines on antimicrobial-resistant pneumococcal disease and carriage: A systematic literature review.](#)

Reyburn R, Maher J, von Mollendorf C, Gwee A, Mulholland K, Russell F; ARI Review group. J Glob Health. 2023 Feb 17;13:05001. doi: 10.7189/jogh.13.05001. PMID: 36799235

[A micro-sized vaccine based on recombinant *Lactiplantibacillus plantarum* fights against SARS-CoV-2 infection via intranasal immunization.](#)

Li L, Hao J, Jiang Y, Hao P, Gao Y, Chen J, Zhang G, Jin N, Wang M, Li C. Acta Pharm Sin B. 2023 Feb 23. doi: 10.1016/j.apsb.2023.01.005. Online ahead of print. PMID: 36852097

[Factors Associated with Anti-SARS-CoV-2 Vaccine Acceptance among Pregnant Women: Data from Outpatient Women Experiencing High-Risk Pregnancy.](#)

Maranto M, Gullo G, Bruno A, Minutolo G, Cucinella G, Maiorana A, Casuccio A, Restivo V. Vaccines (Basel). 2023 Feb 16;11(2):454. doi: 10.3390/vaccines11020454. PMID: 36851330

[COVID-19 vaccination and household savings: An economic recovery channel.](#)

Ren H, Zheng Y. Financ Res Lett. 2023 Feb 23:103711. doi: 10.1016/j.frl.2023.103711. Online ahead of print. PMID: 36852174

[Molecular detection of mixed infection with peste des petits ruminants and retroviruses in Egyptian sheep and goats.](#)

Sobhy NM, Yousef SG, Youssef CRB, Goyal SM. Trop Anim Health Prod. 2023 Feb 27;55(2):102. doi: 10.1007/s11250-023-03504-8. PMID: 36849557

[Strategies for synthesizing and enhancing the immune response of cancer vaccines based on MUC1 glycopeptide antigens.](#)

Yin L, Zhou Y, Hong S, Ding F, Cai H. Chembiochem. 2023 Feb 24:e202200805. doi: 10.1002/cbic.202200805. Online ahead of print. PMID: 36825431

[Anti-SARS-CoV-2 cellular response after 2 and 3 doses of BNT162b2 mRNA vaccine in lymphoma patients receiving anti-CD20 antibodies.](#)

Gressens SB, Wiedemann A, Déchenaud M, Dupuis J, Gallien S, Melica G, Haioun C, Lemonnier F, Levy Y. Vaccine. 2023 Feb 24;41(9):1550-1553. doi: 10.1016/j.vaccine.2023.01.064. Epub 2023 Jan 30. PMID: 36737320

[\[Antibody production capacity after COVID-19 vaccination in immune-mediated neuromuscular diseases under immunotherapy\].](#)

Kaido M, Kajiyama Y, Sasaki S, Saitou T, Esa Y, Watanabe Y, Fujimura H, Kobayashi J. Rinsho Shinkeigaku. 2023 Feb 25. doi: 10.5692/clinicalneuro.001825. Online ahead of print. PMID: 36843085

[Prevalence of COVID-19 in Kidney Transplant Patients in Relation to Their Immune Status after Repeated Anti-SARS-CoV-2 Vaccination.](#)

Sakalauskaite S, Vaiciuniene R, Kusleikaite-Pere N, Narbutiene J, Sauseriene J, Aukstakalniene A, Valius L, Sitkauskiene B. Pathogens. 2023 Feb 19;12(2):351. doi: 10.3390/pathogens12020351. PMID: 36839623

[Correction to: Anogenital Human Papillomavirus \(HPV\) Infection, Seroprevalence, and Risk Factors for HPV Seropositivity Among Sexually Active Men Enrolled in a Global HPV Vaccine Trial.](#)

[No authors listed] Clin Infect Dis. 2023 Feb 18;76(4):778. doi: 10.1093/cid/ciac768. PMID: 36611005

[Effects of non-pharmaceutical interventions on the death rates from COVID-19 in Canada.](#)

Meek A. Soc Sci Humanit Open. 2023 Feb 20;7(1):100449. doi: 10.1016/j.ssaho.2023.100449. Online ahead of print. PMID: 36846438

[Acute pulmonary thromboembolism after messenger RNA vaccination against coronavirus disease 2019: A case report.](#)

Ishibashi Y, Takama N, Fujii T, Takizawa D, Amanai S, Kuno T, Aihara K, Koitabashi N, Ishii H. J Cardiol Cases. 2023 Feb 20. doi: 10.1016/j.jccase.2023.02.014. Online ahead of print. PMID: 36846298

[Safety, reactogenicity, and immunogenicity of Ad26.COV2.S: Results of a phase 1, randomized, double-blind, placebo-controlled COVID-19 vaccine trial in Japan.](#)

Tsuchiya Y, Tamura H, Fujii K, Numaguchi H, Toyozumi K, Liu T, Le Gars M, Cárdenas V, Eto T. Vaccine. 2023 Feb 24;41(9):1602-1610. doi: 10.1016/j.vaccine.2023.01.006. Epub 2023 Jan 5. PMID: 36732164

[Neutralizing Antibodies as Predictors of Vaccine Breakthrough Infection in Healthcare Workers Vaccinated with or without a Heterologous Booster Dose: A Cohort Study during the Third COVID-19 Wave in Peru.](#)

Hueda-Zavaleta M, Gómez de la Torre JC, Cáceres-DelAguila JA, Muro-Rojo C, De La Cruz-Escurrea N, Copaja-Corzo C, Aragón-Ayala CJ, Benites-Zapata VA. Vaccines (Basel). 2023 Feb 15;11(2):447. doi: 10.3390/vaccines11020447. PMID: 36851324

[An Unusual Case of Systemic Lymphadenopathy - Kimura's Disease.](#)

Liu Y, Liu S, Xu J, Xu X, Wang M. J Inflamm Res. 2023 Feb 18;16:701-705. doi: 10.2147/JIR.S397470. eCollection 2023. PMID: 36844253

[Knowledge and awareness of Algerian healthcare workers about human monkeypox and their attitude toward its vaccination: An online cross-sectional survey.](#)

Lounis M, Bencherit D, Abdelhadi S. Vacunas. 2023 Feb 23. doi: 10.1016/j.vacun.2022.11.003. Online ahead of print. PMID: 36852211

[The cytomegalovirus gB/MF59 vaccine candidate induces antibodies against an antigenic domain controlling cell-to-cell spread.](#)

Gomes AC, Baraniak IA, Lankina A, Moulder Z, Holenya P, Atkinson C, Tang G, Mahungu T, Kern F, Griffiths PD, Reeves MB. Nat Commun. 2023 Feb 23;14(1):1041. doi: 10.1038/s41467-023-36683-x. PMID: 36823200

[Effects of coronavirus disease 2019 vaccination on seizures in patients with epilepsy.](#)

Fang X, Qiao S, Zhang R, Yang T, Wang Z, Kong Q, Sun M, Geng J, Fang C, Chen Y, Sun Y, Zhang D, Qu L, Shang W, Wang J, Liu X. Chin Med J (Engl). 2023 Feb 28. doi: 10.1097/CM9.0000000000002558. Online ahead of print. PMID: 36848187

[Semi-synthetic terpenoids with differential adjuvant properties as sustainable replacements for shark squalene in vaccine emulsions.](#)

Fisher KJ, Kinsey R, Mohamath R, Phan T, Liang H, Orr MT, Lykins WR, Guderian JA, Bakken J, Argilla D, Ramer-Denisoff G, Larson E, Qi Y, Sivananthan S, Smolyar K, Carter D, Paddon CJ, Fox CB. NPJ Vaccines. 2023 Feb 16;8(1):14. doi: 10.1038/s41541-023-00608-y. PMID: 36797262

[Optimizing timing of adolescent vaccines: Impact of initiating HPV vaccination before Tdap or meningococcal vaccination on timely completion of the HPV vaccine series.](#)

Kajtezovic S, Morgan JR, Fiascone S, Brandt HM, Perkins RB. Hum Vaccin Immunother. 2023 Feb 16:2175541. doi: 10.1080/21645515.2023.2175541. Online ahead of print. PMID: 36798049

[Persistence of Antibodies Six Months after Three COVID-19 mRNA Vaccine Doses in Patients with Inflammatory Bowel Disease.](#)

Caldera F, Richard L, Almasry M, Phan H, Chun K, Farraye FA, Hayney MS. Inflamm Bowel Dis. 2023 Feb 15:izad019. doi: 10.1093/ibd/izad019. Online ahead of print. PMID: 36788133

[Anti-human leukocyte antigen and anti-ABO antibodies after SARS-CoV-2 mRNA vaccination in kidney transplant recipients.](#)

Nishida H, Takai S, Ito H, Fukuhara H, Nawano T, Narisawa T, Kanno H, Yagi M, Yamagishi A, Sakurai T, Naito S, Tsuchiya N. Clin Transplant. 2023 Feb 27:e14952. doi: 10.1111/ctr.14952. Online ahead of print. PMID: 36846878

[Mucous Membrane Pemphigoid Following the Administration of COVID-19 Vaccine.](#)

Rungraungrayabkul D, Rattanasiriphan N, Juengsomjit R. Head Neck Pathol. 2023 Feb 28. doi: 10.1007/s12105-023-01539-9. Online ahead of print. PMID: 36849670

[Acute multifocal placoid pigment epitheliopathy following administration of the first dose of the BNT162B2 COVID-19 vaccine.](#)

Nagaoka K, Makino S. QJM. 2023 Feb 24;116(2):127-129. doi: 10.1093/qjmed/hcac253. PMID: 36355470

[Analysis of Antibodies Induced after SARS-CoV-2 Vaccination Using Antigen Coded Bead Array Luminex Technology.](#)

Song Z, Luo Q, Wan L, Zhu Q, Liu R, Yin X, Lu X, Wei L, Xiang Z, Zou Y. Vaccines (Basel). 2023 Feb 15;11(2):442. doi: 10.3390/vaccines11020442. PMID: 36851319

[The effect of BCG vaccination on infection and antibody levels against SARS-CoV-2 - The results of ProBCG: A Multicenter Randomized Clinical Trial in Brazil.](#)

Santos AP, Werneck GL, Dalvi APR, Dos Santos CC, Tierno PFGMM, Condelo HS, Macedo B, Leung JAM, Nogueira JS, Malvão L, Galliez R, Aguiar R, Stefan R, Knackfuss SM, da Silva EC, Castineiras TMPP, Medronho RA, E Silva JRL, Alves RLR, Porto LCMS, Rodrigues LS, Kritski AL, Mello FCQ. Int J Infect Dis. 2023 Feb 23:S1201-9712(23)00065-6. doi: 10.1016/j.ijid.2023.02.014. Online ahead of print. PMID: 36841502

[Focal Crescentic Glomerulonephritis Following COVID-19 Viral Vector Vaccination.](#)

Wisnik-Rainville JM, Czyzewski R, Demola C, Czyzewski K. *Cureus*. 2023 Feb 22;15(2):e35305. doi: 10.7759/cureus.35305. eCollection 2023 Feb. PMID: 36846637

[Yellow Fever Vaccine-Related Neurotropic Disease in Brazil Following Immunization with 17DD.](#)

de Andrade Gandolfi F, Estofolete CF, Wakai MC, Negri AF, Barcelos MD, Vasilakis N, Nogueira ML. *Vaccines (Basel)*. 2023 Feb 15;11(2):445. doi: 10.3390/vaccines11020445. PMID: 36851322

[Factors associated with yellow fever vaccine failure: A systematic literature review.](#)

Fantinato FFST, Wachira VK, Porto VBG, Peixoto HM, Duarte EC. *Vaccine*. 2023 Feb 23:S0264-410X(23)00133-0. doi: 10.1016/j.vaccine.2023.02.007. Online ahead of print. PMID: 36841725

[A human antibody potently neutralizes RSV by targeting the conserved hydrophobic region of prefusion F.](#)

Yi C, Su C, Sun X, Lu X, Si C, Liu C, Yang Z, Yuan H, Huang Y, Wen J, He Y, Zhang Y, Ma L, Cong Y, Zhao G, Ling Z, Wang B, Sun B. *Sci China Life Sci*. 2023 Feb 23. doi: 10.1007/s11427-022-2250-0. Online ahead of print. PMID: 36853487

[Long-COVID in Patients with Cancer Previously Treated with Early Anti-SARS-CoV-2 Therapies in an Out-of-Hospital Setting: A Single-Center Experience.](#)

Lasagna A, Albi G, Figini S, Basile S, Sacchi P, Bruno R, Pedrazzoli P. *Cancers (Basel)*. 2023 Feb 16;15(4):1269. doi: 10.3390/cancers15041269. PMID: 36831611

[COVID-19 Booster Vaccination Bellwethers: Factors Predictive of Older Adults' Adoption of the Second Booster COVID-19 Vaccine in Israel: A Longitudinal Study.](#)

Ben-David BM, Keisari S, Regev T, Palgi Y. *J Appl Gerontol*. 2023 Feb 16:7334648221145837. doi: 10.1177/07334648221145837. Online ahead of print. PMID: 36794638

[Evaluation of ichroma™ COVID-19 interferon gamma release assay for detection of vaccine-induced immunity in healthcare workers.](#)

Lim YK, Kweon OJ, Choi Y, Kim TH, Lee MK. *Clin Chem Lab Med*. 2022 Dec 8;61(3):503-509. doi: 10.1515/cclm-2022-0914. Print 2023 Feb 23. PMID: 36476381

[Lichen planus and lichen planus pigmentosus inversus following COVID-19 vaccine in dark phototype patients.](#)

Gil-Quiñones SR, Velandia JA, Velandia F, Barrera MY. *Actas Dermosifiliogr*. 2023 Feb 24:S0001-7310(23)00155-2. doi: 10.1016/j.ad.2023.02.005. Online ahead of print. PMID: 36842475

[Nationwide Utilization of Danish Government Electronic Letter System for Increasing InFLUenza Vaccine Uptake \(NUDGE-FLU\): Study Protocol for a Nationwide Randomized Implementation Trial.](#)

Johansen ND, Vaduganathan M, Bhatt AS, Lee SG, Modin D, Claggett BL, Dueger EL, Samson S, Loiacono MM, Køber L, Solomon SD, Sivapalan P, Jensen JUS, Valentiner-Branth P, Krause TG, Biering-Sørensen T. *Am Heart J*. 2023 Feb 16:S0002-8703(23)00041-8. doi: 10.1016/j.ahj.2023.02.009. Online ahead of print. PMID: 36801265

[Proteome-wide antigenic profiling in Ugandan cohorts identifies associations between age, exposure intensity, and responses to repeat-containing antigens in *Plasmodium falciparum*.](#)

Raghavan M, Kalantar KL, Duarte E, Teyssier N, Takahashi S, Kung AF, Rajan JV, Rek J, Tetteh KKA, Drakeley C, Ssewanyana I, Rodriguez-Barrquer I, Greenhouse B, DeRisi JL. *Elife*. 2023 Feb 15;12:e81401. doi: 10.7554/eLife.81401. Online ahead of print. PMID: 36790168

[Increased incidence of immune thrombocytopenia \(ITP\) in 2021 correlating with the ongoing vaccination campaign against COVID-19 in a tertiary center - A monocentric analysis.](#)

Schaefer C, Paulsen FO, Frenzel C, Weisel K, Bokemeyer C, Seidel C. *Br J Haematol*. 2023 Feb 15. doi: 10.1111/bjh.18686. Online ahead of print. PMID: 36793157

[Assessment of the Interferon-Lambda-3 Polymorphism in the Antibody Response to COVID-19 in Older Adults Seropositive for CMV.](#)

Nardy A, Camargo CTS, Oliveira YFC, Silva FCD, Almeida MS, Monteiro FR, Silva BR, Amaral JBD, Oliveira DBL, Durigon EL, Scagion GP, Chalup VN, Candido ED, Aguiar AS, Novo NF, Shio MT, França CN, Nali LHDS, Bachi ALL. *Vaccines (Basel)*. 2023 Feb 18;11(2):480. doi: 10.3390/vaccines11020480. PMID: 36851357

[Cohort-Specific Peptide Reagents Broaden Depth and Breadth Estimates of the CD8 T Cell Response to HIV-1 Gag Potential T Cell Epitopes.](#)

Michelo CM, Fiore-Gartland A, Dalel JA, Hayes P, Tang J, McGowan E, Kilembe W, Fernandez N, Gilmour J, Hunter E. *Vaccines (Basel)*. 2023 Feb 17;11(2):472. doi: 10.3390/vaccines11020472. PMID: 36851349

[Elevated risk of infection with SARS-CoV-2 Beta, Gamma, and Delta variants compared with Alpha variant in vaccinated individuals.](#)

Andeweg SP, Vennema H, Veldhuijzen I, Smorenburg N, Schmitz D, Zwagemaker F, van Gageldonk-Lafeber AB, Hahné SJM, Reusken C, Knol MJ, Eggink D; SeqNeth Molecular surveillance group† and; RIVM COVID-19 Molecular epidemiology group‡. *Sci Transl Med*. 2023 Feb 22;15(684):eabn4338. doi: 10.1126/scitranslmed.abn4338. Epub 2023 Feb 22. PMID: 35862508

[Emergent variant modeling of the serological repertoire to norovirus in young children.](#)

Lindesmith LC, Brewer-Jensen PD, Conrad H, O'Reilly KM, Mallory ML, Kelly D, Williams R, Edmunds WJ, Allen DJ, Breuer J, Baric RS. *Cell Rep Med*. 2023 Feb 23:100954. doi: 10.1016/j.xcrm.2023.100954. Online ahead of print. PMID: 36854303

[A Single Injection with Sustained-Release Microspheres and a Prime-Boost Injection of Bovine Serum Albumin Elicit the Same IgG Antibody Response in Mice.](#)

van der Kooij RS, Beukema M, Huckriede ALW, Zuidema J, Steendam R, Frijlink HW, Hinrichs WLJ. *Pharmaceutics*. 2023 Feb 16;15(2):676. doi: 10.3390/pharmaceutics15020676. PMID: 36839998

[Induction of Innate and Adaptive Immune Response against Recombinant HBsAg Protein Entrapped in Docosahexaenoic Acid Nanovesicles through Biomarkers.](#)

Bakkari MA, Moni SS, Alshammari A, Sultan MH, Madkhali OA, Almoshari Y, Alam MF, Elmobark ME. *Vaccines (Basel)*. 2023 Feb 16;11(2):457. doi: 10.3390/vaccines11020457. PMID: 36851333

[A Theoretical Qualitative Investigation Exploring Illness Perceptions and Decision-Making About COVID-19 in an Ethnically Diverse UK-Based Sample.](#)

McDonald S, Blackie LER. *Patient Prefer Adherence*. 2023 Feb 19;17:473-489. doi: 10.2147/PPA.S389660. eCollection 2023. PMID: 36844799

[Terminal hairpins improve protein expression in IRES-initiated mRNA in the absence of a cap and polyadenylated tail.](#)

Solodushko V, Fouty B. Gene Ther. 2023 Feb 24:1-8. doi: 10.1038/s41434-023-00391-4. Online ahead of print. PMID: 36828937

[Erratum to "Parental intentions to vaccinate children against COVID-19: Findings from a U.S. National Survey" \[Vaccine 41\(1\) \(2023\) 101-108\].](#)

Guerin RJ, Naeim A, Baxter-King R, Okun AH, Holliday D, Vavreck L. Vaccine. 2023 Feb 25:S0264-410X(23)00107-X. doi: 10.1016/j.vaccine.2023.01.065. Online ahead of print. PMID: 36849341

["I thought I was going to die there:" Social-political contexts and the plight of undocumented Latinx in the COVID-19 pandemic.](#)

Cleaveland C, Lee M, Gewa C. SSM Qual Res Health. 2023 Feb 19:100242. doi: 10.1016/j.ssmqr.2023.100242. Online ahead of print. PMID: 36846649

[Linked poliovirus incidents in the UK, USA and Israel: Silent transmission or missed warnings of vaccine inequity?](#)

Kasstan B, Chantler T, Marcus B, Mounier-Jack S, Saliba V, Edelstein M. Vaccine. 2023 Feb 22:S0264-410X(23)00178-0. doi: 10.1016/j.vaccine.2023.02.043. Online ahead of print. PMID: 36828717

[Immunological Findings in a Group of Individuals Who Were Poor or Non-Responders to Standard Two-Dose SARS-CoV-2 Vaccines.](#)

Zeng Q, Yang X, Lin BY, Li YZ, Huang G, Xu Y. Vaccines (Basel). 2023 Feb 16;11(2):461. doi: 10.3390/vaccines11020461. PMID: 36851338

[Transporting monovalent rotavirus vaccine efficacy estimates to an external target population: a secondary analysis of data from a randomized controlled trial in Malawi.](#)

St Jean DT, Edwards JK, Rogawski McQuade ET, Thompson P, Thomas JC, Becker-Dreps S. Epidemiol Infect. 2023 Feb 27:1-23. doi: 10.1017/S0950268823000286. Online ahead of print. PMID: 36843494

[Vaccine Decision-making in a Time of Conflicting Recommendations: A Call to Go Beyond Politics.](#)

Salmon DA, Plotkin S, Navar AM. Pediatr Infect Dis J. 2023 Feb 22:e003892. doi: 10.1097/INF.0000000000003892. Online ahead of print. PMID: 36854117

[Undocumented immigrants suffering from inequality of vaccination access in Japan: measuring the institutional barriers and exploring the associated factors.](#)

Shimada Y, Kobayashi Y. Public Health. 2023 Feb 23;217:15-21. doi: 10.1016/j.puhe.2023.01.019. Online ahead of print. PMID: 36841034

[R-DOTAP Cationic Lipid Nanoparticles Outperform Squalene-Based Adjuvant Systems in Elicitation of CD4 T Cells after Recombinant Influenza Hemagglutinin Vaccination.](#)

Henson TR, Richards KA, Gandhapudi SK, Woodward JG, Sant AJ. Viruses. 2023 Feb 15;15(2):538. doi: 10.3390/v15020538. PMID: 36851752

[Parental Decision Making Regarding COVID-19 Vaccines for Children under Age 5: Does Decision Self-Efficacy Play a Role?](#)

Allen JD, Matsunaga M, Lim E, Zimet GD, Nguyen KH, Fontenot HB. *Vaccines (Basel)*. 2023 Feb 18;11(2):478. doi: 10.3390/vaccines11020478. PMID: 36851355

[Impact of BNT162b2 Booster Dose on SARS-CoV-2 Anti-Trimeric Spike Antibody Dynamics in a Large Cohort of Italian Health Care Workers.](#)

Renna LV, Bertani F, Podio A, Boveri S, Carrara M, Pinton A, Milani V, Spuria G, Nizza AF, Basilico S, Dubini C, Cerri A, Menicanti L, Corsi-Romanelli MM, Malavazos AE, Cardani R. *Vaccines (Basel)*. 2023 Feb 17;11(2):463. doi: 10.3390/vaccines11020463. PMID: 36851340

[Renal Biopsy Diagnosis of Acute Tubular Injury after Pfizer-BioNTech COVID-19 Vaccination: A Case Report.](#)

Soma Y, Kitaji D, Hoshino K, Sunohara S, Iwano T, Kawano N. *Vaccines (Basel)*. 2023 Feb 17;11(2):464. doi: 10.3390/vaccines11020464. PMID: 36851341

[Mobilizing domestic support for international vaccine solidarity - recommendations for health crisis communication.](#)

Leuffen D, Mounchid PM, Heermann M, Koos S. *NPJ Vaccines*. 2023 Feb 28;8(1):28. doi: 10.1038/s41541-023-00625-x. PMID: 36854782

[Oral and Subcutaneous Immunization with a Plant-Produced Mouse-Specific Zona Pellucida 3 Peptide Presented on Hepatitis B Core Antigen Virus-like Particles.](#)

Ghasemian K, Broer I, Schön J, Killisch R, Kolp N, Springer A, Huckauf J. *Vaccines (Basel)*. 2023 Feb 17;11(2):462. doi: 10.3390/vaccines11020462. PMID: 36851339

[Rapidly progressive interstitial lung disease in clinically amyopathic dermatomyositis triggered by a 23-valent pneumococcal polysaccharide vaccine.](#)

Suzuki K, Akiyama M, Kondo Y, Saito S, Kikuchi J, Hanaoka H, Kaneko Y. *Autoimmun Rev*. 2023 Feb 24:103307. doi: 10.1016/j.autrev.2023.103307. Online ahead of print. PMID: 36842726

[Structure-guided stabilization improves the ability of the HIV-1 gp41 hydrophobic pocket to elicit neutralizing antibodies.](#)

Bruun TJ, Tang S, Erwin G, Deis L, Fernandez D, Kim P. *J Biol Chem*. 2023 Feb 23:103062. doi: 10.1016/j.jbc.2023.103062. Online ahead of print. PMID: 36841484

[Case Report of Serum Sickness-like Reaction following the First Dose of the Chimpanzee Adenovirus-Vectored AstraZeneca COVID-19 Vaccine, ChAdOx1.](#)

Alzaidi AA, Alzaidi AA, AlOtaibi MT, Alsheikh RM. *Vaccines (Basel)*. 2023 Feb 17;11(2):467. doi: 10.3390/vaccines11020467. PMID: 36851343

[Serological response to vaccination in post-acute sequelae of COVID.](#)

Joung S, Weber B, Wu M, Liu Y, Tang AB, Driver M, Sternbach S, Wynter T, Hoang A, Barajas D, Kao YH, Khuu B, Bravo M, Masoom H, Tran T, Sun N, Botting PG, Claggett BL, Prostko JC, Frias EC, Stewart JL, Robertson J, Kwan AC, Torossian M, Pedraza I, Sterling C, Goldzweig C, Oft J, Zabner R, Fert-Bober J, Ebinger JE, Sobhani K, Cheng S, Le CN. *BMC Infect Dis*. 2023 Feb 16;23(1):97. doi: 10.1186/s12879-023-08060-y. PMID: 36797666

[Amino acid substitutions in norovirus VP1 dictate cell tropism via an attachment process dependent on membrane mobility.](#)

Mills JT, Minogue SC, Snowden JS, Arden WKC, Rowlands DJ, Stonehouse NJ, Wobus CE, Herod MR. bioRxiv. 2023 Feb 17:2023.02.17.528071. doi: 10.1101/2023.02.17.528071. Preprint. PMID: 36824911

[Increasing the COVID-19 immunization rate through allergy testing.](#)

Bent RK, Weinbrenner J, Faihs V, Steffens S, Nau T, Vitus M, Mathes S, Darsow U, Biedermann T, Brockow K. J Eur Acad Dermatol Venereol. 2023 Feb 18. doi: 10.1111/jdv.18979. Online ahead of print. PMID: 36808753

[African Swine Fever Virus L83L Negatively Regulates the cGAS-STING-Mediated IFN-I Pathway by Recruiting Tollip To Promote STING Autophagic Degradation.](#)

Cheng M, Kanyema MM, Sun Y, Zhao W, Lu Y, Wang J, Li X, Shi C, Wang J, Wang N, Yang W, Jiang Y, Huang H, Yang G, Zeng Y, Wang C, Cao X. J Virol. 2023 Feb 28;97(2):e0192322. doi: 10.1128/jvi.01923-22. Epub 2023 Feb 13. PMID: 36779759

[COVID-19 Vaccination Status and Capsular Contracture Following Prosthetic Breast Reconstruction: A Retrospective, Multicenter Nested Case-Control Study.](#)

Berger LE, Spoer DL, Bovill JD, Huffman SS, Bell AC, Truong BN, Singh A, Fan KL, Tom LK. Aesthet Surg J. 2023 Feb 21;43(3):NP170-NP180. doi: 10.1093/asj/sjac295. PMID: 36395159

[Encephalopathy after COVID-19 vaccination during treatment with nivolumab: A case report.](#)

Takenaka M, Nakamori M, Ishikawa R, Aoki S, Maruyama H. Clin Neurol Neurosurg. 2023 Feb 15;226:107632. doi: 10.1016/j.clineuro.2023.107632. Online ahead of print. PMID: 36841006

[Digital Immunization Tracking in Long-Term Care and Assisted Living Facilities.](#)

Wilson K, Wilson LA, Rusk KT, Henry JL, Denize KM, Hsu AT, Sveistrup H. Can J Aging. 2023 Feb 16:1-4. doi: 10.1017/S0714980822000538. Online ahead of print. PMID: 36794367

[New Glucosamine-Based TLR4 Agonists: Design, Synthesis, Mechanism of Action, and In Vivo Activity as Vaccine Adjuvants.](#)

Romerio A, Gotri N, Franco AR, Artusa V, Shaik MM, Pasco ST, Atxabal U, Matamoros-Recio A, Mínguez-Toral M, Zalamea JD, Franconetti A, Abrescia NGA, Jimenez-Barbero J, Anguita J, Martín-Santamaría S, Peri F. J Med Chem. 2023 Feb 23;66(4):3010-3029. doi: 10.1021/acs.jmedchem.2c01998. Epub 2023 Feb 2. PMID: 36728697

[Nasal sprays for treating COVID-19: a scientific note.](#)

Chavda VP, Baviskar KP, Vaghela DA, Raut SS, Bedse AP. Pharmacol Rep. 2023 Feb 27:1-17. doi: 10.1007/s43440-023-00463-7. Online ahead of print. PMID: 36848033

[Prevalence of HPV and Assessing Type-Specific HPV Testing in Cervical High-Grade Squamous Intraepithelial Lesions in Poland.](#)

Przybylski M, Pruski D, Wszolek K, de Mezer M, Żurawski J, Jach R, Millert-Kalińska S. Pathogens. 2023 Feb 19;12(2):350. doi: 10.3390/pathogens12020350. PMID: 36839622

[Sentiment analysis and causal learning of COVID-19 tweets prior to the rollout of vaccines.](#)

Zhang Q, Yi GY, Chen LP, He W. PLoS One. 2023 Feb 24;18(2):e0277878. doi: 10.1371/journal.pone.0277878. eCollection 2023. PMID: 36827382

[Axillary Lymph Node Uptake on ¹⁸F-FDG PET/CT after COVID-19 Vaccination: A Direct Comparison Study with Influenza Vaccination.](#)

Otomi Y, Shinya T, Kasai H, Okada N, Matsushita T, Higashi K, Matsuzaki S, Hiroshima Y, Kubo M, Otsuka H, Harada M. Mol Imaging Radionucl Ther. 2023 Feb 23;32(1):13-19. doi: 10.4274/mirt.galenos.2022.27136. PMID: 36817634

[HIV-1 prehairpin intermediate inhibitors show efficacy independent of neutralization tier.](#)

Bell BN, Bruun TUJ, Friedland N, Kim PS. Proc Natl Acad Sci U S A. 2023 Feb 21;120(8):e2215792120. doi: 10.1073/pnas.2215792120. Epub 2023 Feb 16. PMID: 36795752

[RSV through the COVID-19 pandemic: burden, shifting epidemiology and implications for the future.](#)

Stein RT, Zar HJ. Pediatr Pulmonol. 2023 Feb 21. doi: 10.1002/ppul.26370. Online ahead of print. PMID: 36811330

[Accounting for Adverse Events Following Immunization in Economic Evaluation: Systematic Review of Economic Evaluations of Pediatric Vaccines Against Pneumococcus, Rotavirus, Human Papillomavirus, Meningococcus and Measles-Mumps-Rubella-Varicella.](#)

Doggen K, van Hoek AJ, Luyten J. Pharmacoeconomics. 2023 Feb 21. doi: 10.1007/s40273-023-01252-z. Online ahead of print. PMID: 36809673

[Streptolysin O Deficiency in Streptococcus pyogenes M1T1 covR/S Mutant Strain Attenuates Virulence in In Vitro and In Vivo Infection Models.](#)

Langshaw EL, Reynolds S, Ozberk V, Dooley J, Calcutt A, Zaman M, Walker MJ, Batzloff MR, Davies MR, Good MF, Pandey M. mBio. 2023 Feb 28;14(1):e0348822. doi: 10.1128/mbio.03488-22. Epub 2023 Feb 6. PMID: 36744883

[Continuous population-level monitoring of SARS-CoV-2 seroprevalence in a large European metropolitan region.](#)

Emmenegger M, De Cecco E, Lamparter D, Jacquat RPB, Riou J, Menges D, Ballouz T, Ebner D, Schneider MM, Morales IC, Doğançay B, Guo J, Wiedmer A, Domange J, Imeri M, Moos R, Zografou C, Batkitar L, Madrigal L, Schneider D, Trevisan C, Gonzalez-Guerra A, Carrella A, Dubach IL, Xu CK, Meisl G, Kosmoliaptsis V, Malinauskas T, Burgess-Brown N, Owens R, Hatch S, Mongkolsapaya J, Screatton GR, Schubert K, Huck JD, Liu F, Pojer F, Lau K, Hacker D, Probst-Müller E, Cervia C, Nilsson J, Boyman O, Saleh L, Spanaus K, von Eckardstein A, Schaer DJ, Ban N, Tsai CJ, Marino J, Schertler GFX, Ebert N, Thiel V, Gottschalk J, Frey BM, Reimann RR, Hornemann S, Ring AM, Knowles TPJ, Puhon MA, Althaus CL, Xenarios I, Stuart DI, Aguzzi A. iScience. 2023 Feb 17;26(2):105928. doi: 10.1016/j.isci.2023.105928. Epub 2023 Jan 4. PMID: 36619367

[Using Social Marketing to Promote COVID-19 Vaccination Uptake: A Case Study from the "AUBe Vaccinated" Campaign.](#)

Bardus M, Assaf SA, Sakr CJ. Vaccines (Basel). 2023 Feb 16;11(2):459. doi: 10.3390/vaccines11020459. PMID: 36851336

[Ionizable drug delivery systems for efficient and selective gene therapy.](#)

Zhang YQ, Guo RR, Chen YH, Li TC, Du WZ, Xiang RW, Guan JB, Li YP, Huang YY, Yu ZQ, Cai Y, Zhang P, Ling GX. *Mil Med Res.* 2023 Feb 27;10(1):9. doi: 10.1186/s40779-023-00445-z. PMID: 36843103

[Immunity to fungi in the lung.](#)

Heung LJ, Wiesner DL, Wang K, Rivera A, Hohl TM. *Semin Immunol.* 2023 Feb 23;66:101728. doi: 10.1016/j.smim.2023.101728. Online ahead of print. PMID: 36841146

[Actinobacillus pleuropneumoniae encodes multiple phase-variable DNA methyltransferases that control distinct phasevarions.](#)

Nahar N, Tram G, Jen FE, Phillips ZN, Weinert LA, Bossé JT, Jabbari JS, Gouil Q, Du MRM, Ritchie ME, Bowden R, Langford PR, Tucker AW, Jennings MP, Turni C, Blackall PJ, Attack JM. *Nucleic Acids Res.* 2023 Feb 25:gkad091. doi: 10.1093/nar/gkad091. Online ahead of print. PMID: 36840716

[Biophysical Correlates of Enhanced Immunogenicity of a Stabilized Variant of the Receptor Binding Domain of SARS-CoV-2.](#)

Kanjo K, Chattopadhyay G, Malladi SK, Singh R, Jayatheertha S, Varadarajan R. *J Phys Chem B.* 2023 Feb 15:acs.jpcc.2c07262. doi: 10.1021/acs.jpcc.2c07262. Online ahead of print. PMID: 36790910

[Cervical Cancer in SAARC Countries.](#)

Parikh PM, Mullapally SK, Hingmire S, Kamal Uddin AFM, Thinn MM, Shahi A, Tshomo U, Mohan I, Kaur S, Ghadyalpatil N. *South Asian J Cancer.* 2023 Feb 25;12(1):1-8. doi: 10.1055/s-0043-1764227. eCollection 2023 Jan. PMID: 36851937

[CRISPR/Cas advancements for genome editing, diagnosis, therapeutics, and vaccine development for Plasmodium parasites, and genetic engineering of Anopheles mosquito vector.](#)

Nourani L, Mehrizi AA, Pirahamdi S, Pourhashem Z, Asadollahi E, Jahangiri B. *Infect Genet Evol.* 2023 Feb 24:105419. doi: 10.1016/j.meegid.2023.105419. Online ahead of print. PMID: 36842543

[Understanding the Impact of COVID-19 on Chronic Lymphocytic Leukemia \(CLL\) Caregiving and Related Resource Needs.](#)

Bagautdinova D, Bacharz KC, Bylund CL, Sae-Hau M, Weiss ES, Rajotte M, Lincoln G, Vasquez TS, Parker ND, Wright KB, Fisher CL. *J Clin Med.* 2023 Feb 18;12(4):1648. doi: 10.3390/jcm12041648. PMID: 36836183

[Maternal SARS-CoV-2 vaccination and infant protection against SARS-CoV-2 during the first six months of life.](#)

Zerbo O, Ray GT, Fireman B, Layefsky E, Goddard K, Lewis E, Ross P, Omer S, Greenberg M, Klein NP. *Nat Commun.* 2023 Feb 28;14(1):894. doi: 10.1038/s41467-023-36547-4. PMID: 36854660

[Spatiotemporal Trends in Norovirus Outbreaks in the United States, 2009-2019.](#)

Kambhampati AK, Calderwood L, Wikswa ME, Barclay L, Mattison CP, Balachandran N, Vinjé J, Hall AJ, Mirza SA. *Clin Infect Dis.* 2023 Feb 18;76(4):667-673. doi: 10.1093/cid/ciac627. PMID: 35913377

[Defining species-specific and conserved interactions of apical membrane protein 1 during erythrocyte invasion in malaria to inform multi-species vaccines.](#)

Drew DR, Wilson DW, Weiss GE, Yeoh LM, G Henshall I, Crabb BS, Dutta S, Gilson PR, Beeson JG. Cell Mol Life Sci. 2023 Feb 27;80(3):74. doi: 10.1007/s00018-023-04712-z. PMID: 36847896

[Occupation and SARS-CoV-2 seroprevalence studies: a systematic review.](#)

Boucher E, Cao C, D'Mello S, Duarte N, Donnici C, Duarte N, Bennett G; SeroTracker Consortium; Adishes A, Arora R, Kodama D, Bobrovitz N. BMJ Open. 2023 Feb 28;13(2):e063771. doi: 10.1136/bmjopen-2022-063771. PMID: 36854599

[Comparative pharmacological efficacy of COVID-19 vaccines against the variants of concerns \(VOCs\) of SARS-CoV-2: Recent clinical Studies on Booster dose.](#)

Zhao D, Wang X, Liu J, Au C, Basavaraj V, Devi Sri C, Nikolenko VN, Beeraka NM, Sivaprakash P, Fan R. Curr Pharm Biotechnol. 2023 Feb 27. doi: 10.2174/1389201024666230227115329. Online ahead of print. PMID: 36843370

[Erroneous Consonance. How inaccurate beliefs about physician opinion influence COVID-19 vaccine hesitancy.](#)

Motta M, Callaghan T, Lunz-Trujillo K, Lockman A. Vaccine. 2023 Feb 20:S0264-410X(23)00195-0. doi: 10.1016/j.vaccine.2023.02.052. Online ahead of print. PMID: 36822967

[Novel Epitopes Mapping of African Swine Fever Virus CP312R Protein Using Monoclonal Antibodies.](#)

Hagoss YT, Shen D, Zhang Z, Li F, Bu Z, Zhao D. Viruses. 2023 Feb 17;15(2):557. doi: 10.3390/v15020557. PMID: 36851771

[Internet of Everything and Digital Twin enabled Service Platform for Cold Chain Logistics.](#)

Wu W, Shen L, Zhao Z, Harish AR, Zhong RY, Huang GQ. J Ind Inf Integr. 2023 Feb 16:100443. doi: 10.1016/j.jii.2023.100443. Online ahead of print. PMID: 36820130

[Covid-19 vaccination and pregnancy: a systematic review of maternal and neonatal outcomes.](#)

Kontovazainitis CG, Katsaras GN, Gialamprinou D, Mitsiakos G. J Perinat Med. 2023 Feb 17. doi: 10.1515/jpm-2022-0463. Online ahead of print. PMID: 36800343

[Adaptive behaviors and vaccination on curbing COVID-19 transmission: Modeling simulations in eight countries.](#)

Li Z, Zhao J, Zhou Y, Tian L, Liu Q, Zhu H, Zhu G. J Theor Biol. 2023 Feb 21;559:111379. doi: 10.1016/j.jtbi.2022.111379. Epub 2022 Dec 7. PMID: 36496185

[CD4 + Count: a Variable to Be Considered to Prioritize COVID-19 Vaccination in PLHIV.](#)

Mounika VL, Kumar VU, Dhingra S, Ravichandiran V, Pandey K, Parihar VK, Murti K. Curr Pharmacol Rep. 2023 Feb 22:1-8. doi: 10.1007/s40495-023-00312-4. Online ahead of print. PMID: 36844431

[Newborn BCG vaccination induces robust infant IFN \$\gamma\$ -expressing NK cell responses to mycobacteria.](#)

Murphy M, Suliman S, Briel L, Veldtsman H, Khomba N, Africa H, Steyn M, Snyders CI, van Rensburg IC, Walzl G, Chegou NN, Hatherill M, Hanekom WA, Scriba TJ, Nemes E. Int J Infect Dis. 2023 Feb 24:S1201-9712(23)00069-3. doi: 10.1016/j.ijid.2023.02.018. Online ahead of print. PMID: 36842756

[Mycobacterium bovis BCG increase the selected determinants of monocyte/macrophage activity, which were diminished in response to gastric pathogen Helicobacter pylori.](#)

Gonciarz W, Chyb M, Chmiela M. Sci Rep. 2023 Feb 22;13(1):3107. doi: 10.1038/s41598-023-30250-6. PMID: 36813949

[COVID Vaccination Status and Operative Outcomes after Kidney Transplantation.](#)

Kushner BS, Doyle MB, Khan AS, Lin Y, Alhamad T, Yu J, Chapman WC, Wellen JR. J Am Coll Surg. 2023 Feb 17:e000657. doi: 10.1097/XCS.0000000000000657. Online ahead of print. PMID: 36799500

[Whole-Genome Analysis of Influenza A\(H3N2\) and B/Victoria Viruses Detected in Myanmar during the COVID-19 Pandemic in 2021.](#)

Chon I, Saito R, Kyaw Y, Aye MM, Setk S, Phyu WW, Wagatsuma K, Li J, Sun Y, Otaguro T, Win SMK, Yoshioka S, Win NC, Ja LD, Tin HH, Watanabe H. Viruses. 2023 Feb 20;15(2):583. doi: 10.3390/v15020583. PMID: 36851797

[GPApred: The first computational predictor for identifying proteins with LPXTG-like motif using sequence-based optimal features.](#)

Malik A, Shoombuatong W, Kim CB, Manavalan B. Int J Biol Macromol. 2023 Feb 28;229:529-538. doi: 10.1016/j.ijbiomac.2022.12.315. Epub 2022 Dec 31. PMID: 36596370

[Efficacy, Safety and Immunogenicity of Anti-SARS-CoV-2 Vaccines in Patients with Cirrhosis: A Narrative Review.](#)

Toutoudaki K, Dimakakou M, Androutsakos T. Vaccines (Basel). 2023 Feb 16;11(2):452. doi: 10.3390/vaccines11020452. PMID: 36851329

[Development and application of an indirect ELISA for the serological detection of bovine viral diarrhea virus infection based on the protein E2 antigen.](#)

Wang J, Yin JH, Wang SH, Ding CZ, Wang JF. Mol Biol Rep. 2023 Feb 27. doi: 10.1007/s11033-022-08226-y. Online ahead of print. PMID: 36849860

[Monitoring Temporal Changes in SARS-CoV-2 Spike Antibody Levels and Variant-Specific Risk for Infection, Dominican Republic, March 2021-August 2022.](#)

Nilles EJ, de St Aubin M, Dumas D, Duke W, Etienne MC, Abdalla G, Jarolim P, Oasan T, Garnier S, Iihoshi N, Lopez B, de la Cruz L, Puello YC, Baldwin M, Roberts KW, Peña F, Durski K, Sanchez IM, Gunter SM, Kneubehl AR, Murray KO, Lino A, Strobel S, Baez AA, Lau CL, Kucharski A, Gutiérrez EZ, Skewes-Ramm R, Vasquez M, Paulino CT. Emerg Infect Dis. 2023 Feb 27;29(4). doi: 10.3201/eid2904.221628. Online ahead of print. PMID: 36848869

[Mathematical modeling of pneumococcal transmission dynamics in response to PCV13 infant vaccination in Germany predicts increasing IPD burden due to serotypes included in next-generation PCVs.](#)

Horn M, Theilacker C, Sprenger R, von Eiff C, Mahar E, Schiffner-Rohe J, Pletz MW, van der Linden M, Scholz M. PLoS One. 2023 Feb 15;18(2):e0281261. doi: 10.1371/journal.pone.0281261. eCollection 2023. PMID: 36791091

[FTIR microscopy evaluation of the immunogenicity of eco-friendly \$\gamma\text{Fe}_2\text{O}_3@Ag@Cs\$ nanocomposite as a platform for the discovery and screening of vaccine adjuvants.](#)

Salman A, Lupi S, Vaccari L, Piccirilli F, Eid MM. Spectrochim Acta A Mol Biomol Spectrosc. 2023 Feb 15;287(Pt 2):122087. doi: 10.1016/j.saa.2022.122087. Epub 2022 Nov 9. PMID: 36417818

[Design, Development, and Deployment of an Electronic Immunization Registry: Experiences From Vietnam, Tanzania, and Zambia.](#)

Carnahan E, Nguyen L, Dao S, Bwakya M, Mtenga H, Duong H, Mwansa FD, Bulula N, Dang H, Rivera M, Nguyen T, Ngo T, Nguyen D, Werner L, Nguyen N. *Glob Health Sci Pract.* 2023 Feb 28;11(1):e2100804. doi: 10.9745/GHSP-D-21-00804. Print 2023 Feb 28. PMID: 36853635

[Seroprotection against tetanus in southern Vietnam.](#)

Thwaites CL, Thanh TT, Ny NTH, Nguyet LA, Nhat NTD, Thuy CT, Thanh NTL, Dung NT; OUCRU Sero-surveillance Network; Campbell J, Thai PQ, Tan LV, Choisy M, Boni MF. *Vaccine.* 2023 Feb 25:S0264-410X(23)00171-8. doi: 10.1016/j.vaccine.2023.02.036. Online ahead of print. PMID: 36849339

[The infection rates of HBV and HCV decreased significantly in Zhejiang Province, China: a comparative study based on the data of two sero-epidemiological surveys in 1992 and 2020.](#)

Zhou Y, Zhao B, Shi W, Ding X, Shen L, Zhou X, He H. *J Viral Hepat.* 2023 Feb 20. doi: 10.1111/jvh.13820. Online ahead of print. PMID: 36807422

[Assessment of a COVID-19 vaccination protocol for unhoused patients in the emergency department.](#)

Ford JS, Rouleau SG, Wagner JL, Adams CB, May LS, Parikh AK, Holmes JF. *Vaccine.* 2023 Feb 24;41(9):1611-1615. doi: 10.1016/j.vaccine.2022.12.063. Epub 2023 Jan 2. PMID: 36732166

[A Time to Get Vaccinated? The Role of Time Perspective, Consideration of Future Consequences, Conspiracy Beliefs, Religious Faith, Gender, and Race on Intention to Vaccinate for COVID-19 in the United States.](#)

Olivera-Figueroa LA, Unger A, Papastamatelou J, Zimbardo PG. *Int J Environ Res Public Health.* 2023 Feb 17;20(4):3625. doi: 10.3390/ijerph20043625. PMID: 36834320

[Incidence of sinus thrombosis with thrombocytopenia-A nation-wide register study.](#)

Hovi P, Palmu AA, Nieminen TA, Artama M, Jokinen J, Ruokokoski E, Lassila R, Nohynek H, Kilpi T. *PLoS One.* 2023 Feb 24;18(2):e0282226. doi: 10.1371/journal.pone.0282226. eCollection 2023. PMID: 36827275

[Metabotropic glutamate receptor 5-related autoimmune encephalitis with reversible splenic lesion syndrome following SARS-CoV-2 vaccination.](#)

Zhang Y, Lian B, Yang S, Huang X, Zhou Y, Cao L. *Medicine (Baltimore).* 2023 Feb 17;102(7):e32971. doi: 10.1097/MD.00000000000032971. PMID: 36800591

[Study of the effects of in-person attendance at academic conferences on the health of the attendees under COVID-19 pandemic.](#)

Yahata H, Kato K, Shimokawa M, Kawamura K, Shimono N, Kawana K, Okamoto A, Aoki D, Kimura T. *J Obstet Gynaecol Res.* 2023 Feb 22. doi: 10.1111/jog.15626. Online ahead of print. PMID: 36812688

[Interaction mode of hydroxypropyl- \$\beta\$ -cyclodextrin with vaccine adjuvant components Tween 80 and Triton X-100 revealed by fluorescence increasing-quenching analysis.](#)

Kurosawa Y, Goto S, Mitsuya K, Otsuka Y, Yokoyama H. *Phys Chem Chem Phys.* 2023 Feb 22;25(8):6203-6213. doi: 10.1039/d3cp00094j. PMID: 36753064

[Exploration of novel hexahydropyrrolo\[1,2-e\]imidazol-1-one derivatives as antiviral agents against ZIKV and USUV.](#)

Chen R, Francese R, Wang N, Li F, Sun X, Xu B, Liu J, Liu Z, Donalisio M, Lembo D, Zhou GC. Eur J Med Chem. 2023 Feb 15;248:115081. doi: 10.1016/j.ejmech.2022.115081. Epub 2023 Jan 3. PMID: 36623328

[Adverse Events to SARS-CoV-2 \(COVID-19\) Vaccines and Policy Considerations that Inform the Funding of Safety Surveillance in Low- and Middle-Income Countries: A Mixed Methods Study.](#)

Ogar CK, Quick J, Gilbert HN, Vreman RA, Mantel-Teeuwisse AK, Mugunga JC. Drug Saf. 2023 Feb 22:1-14. doi: 10.1007/s40264-023-01279-3. Online ahead of print. PMID: 36811813

[Genomic characterization of Lumpy Skin Disease virus \(LSDV\) from India: Circulation of Kenyan-like LSDV strains with unique kelch-like proteins.](#)

Kumar A, Venkatesan G, Kushwaha A, Poulinlu G, Saha T, Ramakrishnan MA, Dhar P, Kumar GS, Singh RK. Acta Trop. 2023 Feb 15;241:106838. doi: 10.1016/j.actatropica.2023.106838. Online ahead of print. PMID: 36796571

[Evaluation and Comparison of Four Quantitative SARS-CoV-2 Serological Assays in COVID-19 Patients and Immunized Healthy Individuals, Cancer Patients, and Patients with Immunosuppressive Therapy.](#)

Chan A, Martinez-Cajas J, Yip PM, Kulasingam V, Garland J, Holland D, Khaled Shamseddin M, Gong Y. Clin Biochem. 2023 Feb 25:S0009-9120(23)00039-5. doi: 10.1016/j.clinbiochem.2023.02.010. Online ahead of print. PMID: 36849050

[Lung cancer immunotherapy: progress, pitfalls, and promises.](#)

Lahiri A, Maji A, Potdar PD, Singh N, Parikh P, Bisht B, Mukherjee A, Paul MK. Mol Cancer. 2023 Feb 21;22(1):40. doi: 10.1186/s12943-023-01740-y. PMID: 36810079

[Assessing the Relationship Between Motherhood and Cervical Cancer Screening and Prevention Behaviors.](#)

Ginocchi A, Rogan EM, Conley CC. J Womens Health (Larchmt). 2023 Feb 24. doi: 10.1089/jwh.2022.0388. Online ahead of print. PMID: 36827467

[Increased rates of idiopathic inflammatory myopathies during the COVID-19 pandemic: a single-centre experience.](#)

Kharouf F, Kenig A, Bohbot E, Rubin L, Peleg H, Shamriz O. Clin Exp Rheumatol. 2023 Feb 23. doi: 10.55563/clinexp Rheumatol/970881. Online ahead of print. PMID: 36826786

[Myocarditis and coronavirus disease 2019 vaccination: A systematic review and meta-summary of cases.](#)

Saputra PBT, Kurniawan RB, Trilistyoti D, Farabi MJA, Susilo H, Alsagaff MY, Oktaviono YH, Sutanto H, Gusnanto A, Dyah Kencono Wungu C. Biomol Biomed. 2023 Feb 20. doi: 10.17305/bb.2022.8779. Online ahead of print. PMID: 36803547

[COVID-19 endgame: From pandemic to endemic? Vaccination, reopening and evolution in low- and high-vaccinated populations.](#)

Are EB, Song Y, Stockdale JE, Tupper P, Colijn C. J Theor Biol. 2023 Feb 21;559:111368. doi: 10.1016/j.jtbi.2022.111368. Epub 2022 Nov 24. PMID: 36436733

[Management of COVID-19 and vaccination in Nepal: A qualitative study.](#)

Karki A, Rijal B, Koirala B, Makai P, Kc P, Adhikary P, Joshi S, Basnet S, Bhattarai S, Karki J. Health Expect. 2023 Feb 16. doi: 10.1111/hex.13732. Online ahead of print. PMID: 36797845

[Cytoplasmic Tail Truncation Stabilizes S1-S2 Association and Enhances S Protein Incorporation into SARS-CoV-2 Pseudovirions.](#)

Zhang L, Hom N, Ojha A, Lovendahl KN, Mou H, Lee KK, Choe H. J Virol. 2023 Feb 15:e0165022. doi: 10.1128/jvi.01650-22. Online ahead of print. PMID: 36790205

[Assessing the patient experience of respiratory syncytial virus infection: development of a patient-reported outcome measure.](#)

Romano CD, Finelli L, Lewis S, Williams V, Martin E, Phillips M, Saretsky TL, Norquist J. Health Qual Life Outcomes. 2023 Feb 28;21(1):20. doi: 10.1186/s12955-022-02066-x. PMID: 36855175

[A sugar modified amphiphilic cationic nano-adjuvant ceased tumor immune suppression and rejuvenated peptide vaccine induced antitumor immunity in cervical cancer.](#)

Mohapatra A, Rajendrakumar SK, Cherukula K, Park MS, Padmanaban S, Vasukuty A, Mohanty A, Lee JY, Bae WK, Park IK. Biomater Sci. 2023 Feb 28;11(5):1853-1866. doi: 10.1039/d2bm01715f. PMID: 36655902

[Synthesis, X-ray crystal structure, Hirshfeld surface analysis and computational investigation into the potential inhibitory action of novel 6-\(p-tolyl\)-2-\(\(p-tolyl\)thio\)methyl-7H-\[1.2.4\]triazolo\[5,1-b\]\[1,3.4\]thiadiazine inhibits the main protease of COVID-19.](#)

Mohamed SK, Anouar EH, Ahmad S, Abbady MS, Abdel-Wadood FK, Qahtan MQM, Mague JT, El Bakri Y. J Biomol Struct Dyn. 2023 Feb 16:1-10. doi: 10.1080/07391102.2023.2180432. Online ahead of print. PMID: 36794735

[Live-virus neutralization of the omicron variant in children and adults 14 months after SARS-CoV-2 wild-type infection.](#)

Stich M, Benning L, Speer C, Garbade SF, Bartenschlager M, Kim H, Jeltsch K, Tabatabai J, Niesert M, Janda A, Renk H, Elling R, Hoffmann GF, Kräusslich HG, Müller B, Bartenschlager R, Tönshoff B. J Med Virol. 2023 Feb 16. doi: 10.1002/jmv.28582. Online ahead of print. PMID: 36794653

[Burden of Shigella in South Asia: a systematic review and meta-analysis.](#)

Muzembo BA, Kitahara K, Mitra D, Ohno A, Khatiwada J, Dutta S, Miyoshi SI. J Travel Med. 2023 Feb 18;30(1):taac132. doi: 10.1093/jtm/taac132. PMID: 36331282

[Policies for life sciences and healthcare in the global health framework.](#)

Huttin CC. Technol Health Care. 2023 Feb 16. doi: 10.3233/THC-220609. Online ahead of print. PMID: 36847031

[Chaperonin TRiC/CCT Participates in Mammarenavirus Multiplication in Human Cells via Interaction with the Viral Nucleoprotein.](#)

Sakabe S, Witwit H, Khafaji R, Cubitt B, de la Torre JC. J Virol. 2023 Feb 28;97(2):e0168822. doi: 10.1128/jvi.01688-22. Epub 2023 Jan 19. PMID: 36656012

[Factors associated with the duration of SARS-CoV-2 infection in healthcare professionals at a second-level public hospital in the Community of Madrid \(Spain\) during the sixth wave.](#)

de San Segundo Reyes M, Granizo Martínez JJ, Veiga Crespo MC, Sanchís Ruiz A, Camacho Muñoz I, Sánchez-Uriz MÁ. Rev Esp Salud Publica. 2023 Feb 15;97:e202302012. PMID: 36794790

[Tenofovir.](#)

[No authors listed] 2023 Feb 15. Drugs and Lactation Database (LactMed®) [Internet]. Bethesda (MD): National Institute of Child Health and Human Development; 2006-. PMID: 30000609

[Real-world experience of tixagevimab-cilgavimab pre-exposure prophylaxis in orthotopic heart transplant recipients.](#)

Ordaya EE, Higgins EM, Vergidis P, Razonable RR, Beam E. Transpl Infect Dis. 2023 Feb 27:e14040. doi: 10.1111/tid.14040. Online ahead of print. PMID: 36847413

[Frequency evaluation and molecular characterization of HHV-6 and HHV-7 among children under five years with fever and skin rash.](#)

Keshavarz M, Ghasemi S, Arjeini Y, Namdari H, Maleki H, Mousavi N, Mokhtari-Azad T, Rezaei F. J Med Virol. 2023 Feb 23. doi: 10.1002/jmv.28608. Online ahead of print. PMID: 36815506

[Cox regression using a calendar time scale was unbiased in simulations of COVID-19 vaccine effectiveness & safety.](#)

Lund LC, Støvring H, Pottegård A, Andersen M, Hallas J. J Clin Epidemiol. 2023 Feb 16:S0895-4356(23)00033-1. doi: 10.1016/j.jclinepi.2023.02.012. Online ahead of print. PMID: 36806733

[Evaluation of a biotin-based surrogate virus neutralization test for detecting postvaccination antibodies against SARS-CoV-2 variants in sera.](#)

Ahn MJ, Kang JA, Hong SM, Lee KS, Kim DH, Song D, Jeong DG. Biochem Biophys Res Commun. 2023 Feb 26;646:8-18. doi: 10.1016/j.bbrc.2023.01.052. Epub 2023 Jan 19. PMID: 36696754

[CRISPR/Cas9-based Engineering of Immunoglobulin Loci in Hybridoma Cells.](#)

Gall CLM, Fennemann FL, Van Der Schoot JMS, Scheeren FA, Verdoes M. Bio Protoc. 2023 Feb 20;13(4):e4613. doi: 10.21769/BioProtoc.4613. eCollection 2023 Feb 20. PMID: 36845533

[Optimization of 5'UTR to evade SARS-CoV-2 Nonstructural protein 1-directed inhibition of protein synthesis in cells.](#)

Chen SC, Xu CT, Chang CF, Chao TY, Lin CC, Fu PW, Yu CH. Appl Microbiol Biotechnol. 2023 Feb 27:1-18. doi: 10.1007/s00253-023-12442-2. Online ahead of print. PMID: 36843199 F

[The immunogenicity of an extended dosing interval of BNT162b2 against SARS-CoV-2 Omicron variant among healthy school-aged children, a randomized controlled trial.](#)

Chantasrisawad N, Techasaensiri C, Kosalaraksa P, Phongsamart W, Tangsathapornpong A, Jaru-Ampornpan P, Sophonphan J, Suntarattiwong P, Puthanakit T; KIDSVAX study team. Int J Infect Dis. 2023 Feb 23:S1201-9712(23)00066-8. doi: 10.1016/j.ijid.2023.02.017. Online ahead of print. PMID: 36841501

[Early Treatment, Inflammation and Post-COVID Conditions.](#)

Gebo KA, Heath SL, Fukuta Y, Zhu X, Baksh S, Abraham AG, Habtehyimer F, Shade D, Ruff J, Ram M, Laeyendecker O, Fernandez RE, Patel EU, Baker OR, Shoham S, Cachay ER, Currier JS, Gerber JM,

Meisenberg B, Forthal DN, Hammitt LL, Huaman MA, Levine A, Mosnaim GS, Patel B, Paxton JH, Raval JS, Sutcliffe CG, Anjan S, Gniadek T, Kassaye S, Blair JE, Lane K, McBee NA, Gawad AL, Das P, Klein SL, Pekosz A, Casadevall A, Bloch EM, Hanley D, Tobian AAR, Sullivan DJ. medRxiv. 2023 Feb 16:2023.02.13.23285855. doi: 10.1101/2023.02.13.23285855. Preprint. PMID: 36824860

[A Novel Cell-based Luciferase Reporter Platform for the Development and Characterization of T-Cell Redirecting Therapies and Vaccine Development.](#)

Grailer J, Cheng ZJ, Hartnett J, Slater M, Fan F, Cong M. J Immunother. 2023 Feb 20. doi: 10.1097/CJI.0000000000000453. Online ahead of print. PMID: 36809225

[SARS-CoV-2 omicron variants are susceptible in vitro to Artemisia annua hot water extracts.](#)

Nair MS, Huang Y, Wang M, Weathers PJ. J Ethnopharmacol. 2023 Feb 18;308:116291. doi: 10.1016/j.jep.2023.116291. Online ahead of print. PMID: 36804200

[Incidence and Associated Factors of SARS-CoV-2 Infection Post-mRNA-1273 Booster Vaccination in Health-Care Workers.](#)

Hasibuan AS, Koesnoe S, Widhani A, Muhadi M, Shatri H, Ginanjar E, Yuniastuti E, Soewondo P, Aman Nasution S, Djauzi S, Dina Liastuti L, Koento T, Sumariyono S, Mulyantini A. Vaccines (Basel). 2023 Feb 19;11(2):481. doi: 10.3390/vaccines11020481. PMID: 36851358

["Saving lives with nirmatrelvir/ritonavir one transplant patient at a time".](#)

Belden KA, Yeager S, Schulte J, Cantarin MPM, Moss S, Royer T, Coppock D. Transpl Infect Dis. 2023 Feb 27:e14037. doi: 10.1111/tid.14037. Online ahead of print. PMID: 36847419

[An optimized flow cytometry protocol for simultaneous detection of T cell activation induced markers and intracellular cytokines: Application to SARS-CoV2 immune individuals.](#)

Altosole T, Rotta G, Uras CRM, Bornheimer SJ, Fenoglio D. J Immunol Methods. 2023 Feb 24:113443. doi: 10.1016/j.jim.2023.113443. Online ahead of print. PMID: 36842524

[Adjuvant Vaccination with Allogenic Dendritic Cells Significantly Prolongs Overall Survival in High-Grade Gliomas: Results of a Phase II Trial.](#)

Lepski G, Bergami-Santos PC, Pinho MP, Chauca-Torres NE, Evangelista GCM, Teixeira SF, Flatow E, de Oliveira JV, Fogolin C, Peres N, Arévalo A, Alves VAF, Barbuto JAM. Cancers (Basel). 2023 Feb 15;15(4):1239. doi: 10.3390/cancers15041239. PMID: 36831580

[Clinical features, management and outcomes of peritoneal dialysis patients during Delta and Omicron waves of COVID-19 infections.](#)

Htay H, Foo MWY, Jayaballa M, Johnson DW, Oei EL, Tan BH, Wang W, Wu SY, Tan CS. Int Urol Nephrol. 2023 Feb 23:1-7. doi: 10.1007/s11255-023-03496-2. Online ahead of print. PMID: 36820945

[Factors influencing COVID-19 health protective behaviours in Zambian university students with symptoms of low mood.](#)

Ncheka JM, Menon JA, Davies EB, Paul R, Mwaba SOC, Mudenda J, Wharrad H, Toutouchi P, Glazebrook C. BMC Public Health. 2023 Feb 15;23(1):336. doi: 10.1186/s12889-023-15073-4. PMID: 36793103

[Effectiveness of COVID-19 Convalescent Plasma \(CCP\) During the Pandemic Era: A Literature Review.](#)

Kandula UR, Tuji TS, Gudeta DB, Bulbula KL, Mohammad AA, Wari KD, Abbas A. J Blood Med. 2023 Feb 22;14:159-187. doi: 10.2147/JBM.S397722. eCollection 2023. PMID: 36855559

[Evaluation of a Mobile-Based Immunization Decision Support System for Scheduling Age-Appropriate Vaccine Schedules for Children Younger Than 2 Years in Pakistan and Bangladesh: Lessons From a Multisite, Mixed Methods Study.](#)

Siddiqi DA, Ali RF, Shah MT, Dharma VK, Khan AA, Roy T, Chandir S. JMIR Pediatr Parent. 2023 Feb 17;6:e40269. doi: 10.2196/40269. PMID: 36800221

[Newcastle Disease Virus Manipulates Mitochondrial MTHFD2-Mediated Nucleotide Metabolism for Virus Replication.](#)

Tang N, Chen P, Zhao C, Liu P, Tan L, Song C, Qiu X, Liao Y, Liu X, Luo T, Sun Y, Ding C. J Virol. 2023 Feb 16:e0001623. doi: 10.1128/jvi.00016-23. Online ahead of print. PMID: 36794935

[Increase of invasive pneumococcal disease in children temporally associated with RSV outbreak in Quebec: a time-series analysis.](#)

Ouldali N, Deceuninck G, Lefebvre B, Gilca R, Quach C, Brousseau N, Tapiero B, De Wals P. Lancet Reg Health Am. 2023 Feb 15;19:100448. doi: 10.1016/j.lana.2023.100448. eCollection 2023 Mar. PMID: 36852331

[Immune cell landscape in symptomatic and asymptomatic SARS-CoV-2 infected adults and children in urban Dhaka, Bangladesh.](#)

Akhtar E, Mily A, Sarker P, Chanda BC, Haque F, Kuddusi RU, Haq MA, Lourda M, Brighenti S, Raqib R. Immunobiology. 2023 Feb 18;228(2):152350. doi: 10.1016/j.imbio.2023.152350. Online ahead of print. PMID: 36822063

[Using *Entamoeba muris* To Model Fecal-Oral Transmission of *Entamoeba* in Mice.](#)

Mendoza Cavazos C, Heredia MY, Owens LA, Knoll LJ. mBio. 2023 Feb 28;14(1):e0300822. doi: 10.1128/mbio.03008-22. Epub 2023 Feb 6. PMID: 36744962

[Cost-effectiveness of monoclonal antibody and maternal immunization against respiratory syncytial virus \(RSV\) in infants: Evaluation for six European countries.](#)

Getaneh AM, Li X, Mao Z, Johannesen CK, Barbieri E, van Summeren J, Wang X, Tong S, Baraldi E, Phijffer E, Rizzo C, van Wijhe M, Heikkinen T, Bont L, Willem L, Jit M, Beutels P, Bilcke J; for Respiratory Syncytial Virus Consortium in Europe (RESCEU) investigators. Vaccine. 2023 Feb 24;41(9):1623-1631. doi: 10.1016/j.vaccine.2023.01.058. Epub 2023 Feb 1. PMID: 36737318

[Minimal Antigenic Evolution after a Decade of Norovirus GII.4 Sydney 2012 Circulation in Humans.](#)

Parra GI, Tohma K, Ford-Siltz LA, Eguino P, Kendra JA, Pilewski KA, Gao Y. J Virol. 2023 Feb 28;97(2):e0171622. doi: 10.1128/jvi.01716-22. Epub 2023 Jan 23. PMID: 36688654

[Emergence and Potential Extinction of Genetic Lineages of Human Metapneumovirus between 2005 and 2021.](#)

Groen K, van Nieuwkoop S, Meijer A, van der Veer B, van Kampen JJA, Fraaij PL, Fouchier RAM, van den Hoogen BG. mBio. 2023 Feb 28;14(1):e0228022. doi: 10.1128/mbio.02280-22. Epub 2022 Dec 12. PMID: 36507832

[Risk of Underlying Diseases and Effectiveness of Drugs on COVID-19 Inpatients Assessed Using Medical Claims in Japan: Retrospective Observational Study.](#)

Mitsushima S, Horiguchi H, Taniguchi K. Int J Gen Med. 2023 Feb 21;16:657-672. doi: 10.2147/IJGM.S394413. eCollection 2023. PMID: 36851998

[Post COVID-19 condition after Wildtype, Delta, and Omicron SARS-CoV-2 infection and prior vaccination: Pooled analysis of two population-based cohorts.](#)

Ballouz T, Menges D, Kaufmann M, Amati R, Frei A, von Wyl V, Fehr JS, Albanese E, Puhan MA. PLoS One. 2023 Feb 22;18(2):e0281429. doi: 10.1371/journal.pone.0281429. eCollection 2023. PMID: 36812215

[An Alternative Splicing Variant of the Mixed-Lineage Leukemia 5 Protein Is a Cellular Adhesion Receptor for ScaA of *Orientia tsutsugamushi*.](#)

Nguyen YTH, Kim C, Kim HI, Kim Y, Lee SE, Chang S, Ha NY, Cho NH. mBio. 2023 Feb 28;14(1):e0154322. doi: 10.1128/mbio.01543-22. Epub 2022 Dec 21. PMID: 36541760

[Structural Analyses of a Dominant *Cryptosporidium parvum* Epitope Presented by H-2K^b Offer New Options To Combat Cryptosporidiosis.](#)

Wang Y, Gao M, Li X, Zhu W, Zhao M, Li J, Liu X, Cao L, Li S, Zhang S, Zhang L, Fan S. mBio. 2023 Feb 28;14(1):e0266622. doi: 10.1128/mbio.02666-22. Epub 2023 Jan 5. PMID: 36602309

[Use of an Integrated Multi-Omics Approach To Identify Molecular Mechanisms and Critical Factors Involved in the Pathogenesis of *Leptospira*.](#)

Kavela S, Vyas P, Cp J, Kushwaha SK, Majumdar SS, Faisal SM. Microbiol Spectr. 2023 Feb 28:e0313522. doi: 10.1128/spectrum.03135-22. Online ahead of print. PMID: 36853003

[Influenza Vaccination as a Prevention Therapy for Stable Coronary Artery Disease and Acute Coronary Syndrome: A Meta-Analysis of Randomized Trials.](#)

Mara Dos Santos Barbeta L, Correia ETO, Gismondi RAOC, Mesquita ET. Am J Med. 2023 Feb 19:S0002-9343(23)00094-3. doi: 10.1016/j.amjmed.2023.02.004. Online ahead of print. PMID: 36809811

[The Role of Immunity in the Pathogenesis of SARS-CoV-2 Infection and in the Protection Generated by COVID-19 Vaccines in Different Age Groups.](#)

Abdulla ZA, Al-Bashir SM, Alzoubi H, Al-Salih NS, Aldamen AA, Abdulazeez AZ. Pathogens. 2023 Feb 15;12(2):329. doi: 10.3390/pathogens12020329. PMID: 36839601

[Non-pharmaceutical interventions and risk of COVID-19 infection: survey of U.K. public from November 2020 - May 2021.](#)

Francis NA, Becque T, Willcox M, Hay AD, Lown M, Clarke R, Stuart B, Yardley L, Moore M, Houriet J, Little P. BMC Public Health. 2023 Feb 24;23(1):389. doi: 10.1186/s12889-023-15209-6. PMID: 36829127

[Long COVID symptoms in Israeli children with and without a history of SARS-CoV-2 infection: a cross-sectional study.](#)

Adler L, Israel M, Yehoshua I, Azuri J, Hoffman R, Shahar A, Mizrahi Reuveni M, Grossman Z. BMJ Open. 2023 Feb 21;13(2):e064155. doi: 10.1136/bmjopen-2022-064155. PMID: 36810170

[Novel Intravenous Immunoglobulin Therapy for the Prevention and Treatment of Candida auris and Candida albicans Disseminated Candidiasis.](#)

Xin H, Rosario-Colon JA, Eberle K. mSphere. 2023 Feb 21;8(1):e0058422. doi: 10.1128/msphere.00584-22. Epub 2023 Jan 23. PMID: 36688668

[Dynamics of Different Classes and Subclasses of Antibody Responses to Severe Acute Respiratory Syndrome Coronavirus 2 Variants after Coronavirus Disease 2019 and CoronaVac Vaccination in Thailand.](#)

Poolchanuan P, Matsee W, Sengye S, Siripoon T, Dulsuk A, Phunpang R, Pisutsan P, Piyaphanee W, Luvira V, Chantratita N. mSphere. 2023 Feb 21;8(1):e0046522. doi: 10.1128/msphere.00465-22. Epub 2023 Jan 23. PMID: 36688637

[A retrospective evaluation of seroconversion after COVID-19 during the early Omicron wave in fully vaccinated multiple sclerosis patients receiving anti-CD20 therapies.](#)

Stoll S, Desai S, Levit E. Mult Scler Relat Disord. 2023 Feb 15;71:104574. doi: 10.1016/j.msard.2023.104574. Online ahead of print. PMID: 36827874

[Effect of Higher-Dose Ivermectin for 6 Days vs Placebo on Time to Sustained Recovery in Outpatients With COVID-19: A Randomized Clinical Trial.](#)

Naggie S, Boulware DR, Lindsell CJ, Stewart TG, Slandzicki AJ, Lim SC, Cohen J, Kavtaradze D, Amon AP, Gabriel A, Gentile N, Felker GM, Jayaweera D, McCarthy MW, Sulkowski M, Rothman RL, Wilson S, DeLong A, Remaly A, Wilder R, Collins S, Dunsmore SE, Adam SJ, Thicklin F, Hanna GJ, Ginde AA, Castro M, McTigue K, Shenkman E, Hernandez AF; Accelerating Covid-19 Therapeutic Interventions and Vaccines (ACTIV)-6 Study Group and Investigators. JAMA. 2023 Feb 20:e231650. doi: 10.1001/jama.2023.1650. Online ahead of print. PMID: 36807465

Patentes registradas en Patentscope

Estrategia de búsqueda: *Vaccine in the title or abstract AND 20230215:20230228 as the publication date 80 records*

1. [202111015216](#) LIVE ATTENUATED CANINE PARVOVIRUS VACCINE CANDIDATE
IN - 17.02.2023

Clasificación Internacional [A61K](#) / N° de solicitud 202111015216 Solicitante Indian Council of Agricultural Research Inventor/a Vishal Chander

The present invention discloses a modified live attenuated canine parvovirus vaccine strain comprising a new CPV 2a antigen of Indian origin for protection against parvoviral enteritis infections, and a method of developing the desired vaccine candidate thereof. The invention, particularly, provides a successful cell culture adapted live CPV 2a vaccine candidate using the new CPV 2a field isolate, the most prevalent antigenic type in India. 10 The vaccine strain demonstrates better safety and immunogenicity as evaluated in the natural host (dog), with restricted viraemia and limited faecal shedding of the virus post-vaccine inoculation. The vaccine composition is safe and effective.

2. [202331009997](#) A Multi-Epitope Vaccine for the Human Respiratory Syncytial Virus and Method Thereof
IN - 17.02.2023

Clasificación Internacional [A61K](#) / N° de solicitud 202331009997 Solicitante Debanjan Mitra Inventor/a Debanjan Mitra

The present invention discloses a multi-epitope vaccine for human respiratory syncytial virus and a method of preparing the multi-epitope vaccine. The multi-epitope vaccine comprises of an amino acid sequence of SEQ No: 1, wherein the amino acid comprises at least one of 4CTL, 4HTL and 4LBL epitopes linked by at least one of linkers comprising EAAAK, AAY, KK, CPGPG, KK and GG. The method comprises of screening and selecting at least of the epitopes comprising CTL, HTL and LBL epitopes, concatenating the selected epitopes to create a single peptide chain using immunological filters, joining the epitopes and an adjuvant using at least one of appropriate linkers EAAAK, AAY, GPGPG, KK and GG. Further using the EAAAK linker to provide adjuvant to the vaccine's N-terminus to improve separation and reduce interaction with the other vaccine domains and integrating the linked epitopes and adjuvant to form the multi-epitope vaccine comprising amino acid sequence of SEQ No: 1.

3. [WO/2023/018384](#)A VACCINE COMPOSITION AGAINST CORONAVIRUS INFECTION
WO - 16.02.2023

Clasificación Internacional [A61K 31/7115](#) N° de solicitud PCT/TH2022/050002 Solicitante CHULALONGKORN UNIVERSITY Inventor/a RUXRUNGTHAM, Kiat

The present disclosure includes a vaccine composition against infection of Coronavirus in a subject. Particularly, the vaccine composition comprises a plurality copy of a mRNA having polynucleotide sequence as setting forth in SEQ ID No. 1, a lipid nanoparticles mixture used for encapsulating the pluralities copies of the mRNA forming a colloidal dispersion of the mRNA-lipid particles thereto, one or more buffering agent for stabilizing the colloidal dispersion, wherein the lipid nanoparticles and the plurality copies of the mRNA are in a predetermined weight ratio of 12-36: 1.

4. [WO/2023/015710](#)RABIES VIRUS VACCINE AND PREPARATION METHOD THEREFOR
WO - 16.02.2023

Clasificación Internacional [A61K 39/205](#) N° de solicitud PCT/CN2021/122958 Solicitante SOOCHOW UNIVERSITY Inventor/a DONG, Chunsheng

Disclosed in the present invention are a rabies virus vaccine and a preparation method therefor. The rabies virus vaccine of the present invention replaces the envelope protein G of vesicular stomatitis virus with the envelope protein RABVG of the rabies virus. In the present invention, by means of molecular biology technology, the VSV envelope protein was replaced by the rabies virus envelope protein RABVG on the plasmid encoding the vesicular stomatitis virus genome, a VSV reverse genetics system was used to package in 293T cells a vaccine expressing RABVG with VSV as a vector, and mice were immunised with the vaccine by intranasal drops, proving that neutralising antibodies against rabies virus in mice can be effectively induced, significantly improving the ability of immunised mice to resist viral infection, and having application value and potential as a novel rabies virus vaccine.

5. [WO/2023/022954](#)UNDIRECTED MUTATED MRNA VACCINE
WO - 23.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/US2022/040272 Solicitante BURTON, Dennis R. Inventor/a BURTON, Dennis R.

We claim vaccines and a method of making vaccines targeted against diseases caused by viruses, including influenza virus and SARS CoV-2, against cancer, and diseases caused by bacteria, fungi, and other biomaterials/diseases that are combatted with an immune response. The mRNA vaccine is injected into the body whereupon the injected mRNA hijacks the translational machinery of the cells to produce an antigen such as a virus spike protein or surface protein (or part thereof) and stimulates an immune response. The mRNA in the vaccine is a mixture of mRNAs and where at least one or more of the RNAs are undirected mutant variants of the parent mRNA. The vaccine is a poly vaccine and provides protection against multiple variants. The vaccine may comprise mRNA species encoding several random undirected mutations directed against unknown variants.

6. [20230048144](#) HPV VACCINE

US - 16.02.2023

Clasificación Internacional [A61K 39/39](#) N° de solicitud 17817382 Solicitante Merck Sharp & Dohme LLC
Inventor/a Andrew Bett

The present disclosure provides, among other things, a single-dose vaccine composition that includes a chitosan adjuvant and HPV virus-like particles (VLPs) of at least one type of human papillomavirus (HPV) selected from the group consisting of HPV types: 6, 11, 16, 18, 26, 31, 33, 35, 39, 45, 51, 52, 53, 55, 56, 58, 59, 66, 68, 73, and 82, where the single-dose vaccine composition provides enhanced or comparable HPV vaccine response in comparison to a similar multiple-dose vaccine formulated without such chitosan adjuvant.

7. [202311008970](#) METHOD FOR DIAGNOSING ANTIBODY-NONRESPONSE TO HEPATITIS B VACCINE

IN - 17.02.2023

Clasificación Internacional [A61K /](#) N° de solicitud 202311008970 Solicitante Dr.Siddharth Vats Inventor/a Dr.Siddharth Vats

The present invention relates to the method for diagnosing antibody-nonresponse to hepatitis B vaccine by a new single nucleotide polymorphism site. associated with the antibody - silence about the hepatitis B vaccine. The polynucleotide or its complementary nucleotide selected from the group consisting of the polynucleotide (b) according to the present invention, (c), and (f) and (g) over one can be usefully used for the diagnosis of the antibody - silence about the hepatitis B vaccine. The polynucleotide or the primer or the probe and polynucleotide or its complementary nucleotide kit consisting of its complementary nucleotide can be usefully used for the diagnosis of the antibody - silence about the hepatitis B vaccine. The developed method may effectively diagnose the antibody - silence about the hepatitis B vaccine.

8. [20230052315](#) VACCINE ADJUVANT COMPRISING AN INVERSE MICROLATEX

US - 16.02.2023

Clasificación Internacional [A61K 39/39](#) N° de solicitud 17801224 Solicitante SOCIÉTÉ D'EXPLOITATION DE PRODUITS POUR LES INDUSTRIES CHIMIQUES-SEPPIC Inventor/a Dorothee PLISZCZAK

Disclosed is a vaccine adjuvant including at least one inverse microlatex, the inverse microlatex including at least one oil, at least one surfactant, at least one polymer such as, for example, a polyacrylate that is totally or partially neutralized in the form of alkali metal salts or ammonium salt, the vaccine adjuvant being entirely sterilizable by filtration or by passing through the heat of an autoclave and emulsifiable in one step with the aqueous phase including only a vaccine antigen.

9. [WO/2023/019000](#) IPSC-BASED VACCINE AS A PROPHYLACTIC AND THERAPEUTIC TREATMENT FOR CANCER

WO - 16.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud PCT/US2022/040273 Solicitante KHLORIS BIOSCIENCES, INC. Inventor/a KOOREMAN, Nigel

In one embodiment, the application discloses a method for the treatment of cancer in a patient, the method comprises a vaccination of the patient with a vaccine, wherein the vaccine comprises an effective amount of mammalian pluripotent stem cells obtained from an embryonic source or obtained by reprogramming of somatic cells from the patient, wherein the vaccination comprising the step of administering a mammalian pluripotent stem cells to the patient in need thereof; and vaccine formulations for use in the treatment of cancer.

10. [WO/2023/015352](#) VACCINE ANTIGEN

WO - 16.02.2023

Clasificación Internacional [C12N 7/00](#) N° de solicitud PCT/AU2022/050880 Solicitante MACFARLANE BURNET INSTITUTE FOR MEDICAL RESEARCH AND PUBLIC HEALTH LIMITED Inventor/a POUMBOURIOS, Pantelis

The field of the specification relates broadly to SARS-CoV-2 vaccine spike protein antigens and methods of using and manufacturing these antigens. The invention also relates to vectors and polynucleotides encoding the SARS-CoV-2 vaccine antigens and vaccines, kits, devices and strips comprising the coronavirus vaccine antigen. The spike protein from SARS-CoV-2 has prolines substituted at positions 986, 987 (2P or S-2P) and additional alanine cavity filling mutations at positions A1016 and A1020.

11. [WO/2023/015332](#) VACCINE ANTIGEN

WO - 16.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud PCT/AU2022/050429 Solicitante MACFARLANE BURNET INSTITUTE FOR MEDICAL RESEARCH AND PUBLIC HEALTH LIMITED Inventor/a POUMBOURIOS, Pantelis

The field of the specification relates broadly to SARS-CoV-2 vaccine spike protein antigens and methods of using and manufacturing these antigens. The invention also relates to vectors and polynucleotides encoding the SARS-CoV-2 vaccine antigens and vaccines, kits, devices and strips comprising the coronavirus vaccine antigen. The spike protein from SARS-CoV-2 has prolines substituted at positions 986, 987 (2P or S-2P) and additional alanine cavity filling mutations at positions A1016 and A1020.

12. [4135764](#) PAN-CORONAVIRUS-IMPFFSTOFFZUSAMMENSETZUNGEN MIT MEHREREN EPITOPEN EP - 22.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 21788911 Solicitante UNIV CALIFORNIA Inventor/a BENMOHAMED LBACHIR

Multi-epitope, pan-coronavirus recombinant vaccine compositions featuring a combination of highly conserved B cell epitopes, highly conserved CD4+ T cell epitopes, and highly conserved CD8+ T cell epitopes, at least one of which is derived from a non-spike protein. The present invention describes using several immuno-informatics and sequence alignment approaches as well as multiple immunological assays in vitro using human blood and saliva samples from COVID patients and healthy patients to identify several human B cell, CD4+ and CD8+ T cell epitopes that are highly conserved and antigenic in vitro. The invention also used an in vivo unique mouse model of ACE2/HLA-A0201/HLA-DR triple transgenic mouse model to test the immunogenicity and the protective efficacy against SARS-CoV-2 infection and COVID-Like symptoms, of the identified B and T cell epitopes as well as of the resulting multi-epitope-pan-Coronavirus vaccine candidates. The vaccine compositions herein have the potential to provide long-lasting B and T cell immunity regardless of Coronaviruses mutations.

13. [WO/2023/019309](#) VACCINE COMPOSITIONS

WO - 23.02.2023

Clasificación Internacional [A61K 9/00](#) N° de solicitud PCT/AU2022/050912 Solicitante MONASH UNIVERSITY Inventor/a AL-WASSITI, Hareth Basim Ali

The invention relates to vaccine compositions for inducing an immune response to a coronavirus in a subject, and uses thereof. In particular, the vaccine comprises of a chimeric or fusion protein comprising a) a N-terminal secretion signal peptide; b) an amino acid sequence of the receptor binding domain (RBD) of a spike protein of a coronavirus; and c) a C-terminal domain comprising a transmembrane region and a cytoplasmic region. In a preferred embodiment, the signal peptide, RBD, transmembrane region, and cytoplasmic region are derived from SARS-CoV-2, and that the vaccine composition is formulated as a lipid nanoparticle (LNP).

14. [WO/2023/016572](#) MODIFIED VACCINIA VIRUS AND APPLICATION THEREOF

WO - 16.02.2023

Clasificación Internacional [C12N 15/86](#) N° de solicitud PCT/CN2022/112550 Solicitante SHENZHEN HUA YAO KANG MING BIOPHARMACEUTICAL CO., LTD. Inventor/a YUAN, Ming

Provided is a modified vaccinia virus, containing a gene encoding one or more chemokines, a gene encoding one or more T-cell growth factors, and/or a gene encoding one or more T-cell activation factors. Also provided is a pharmaceutical composition containing the modified vaccinia virus and an immune cell. Further provided are preparation methods for and uses of the modified vaccinia virus and the pharmaceutical composition.

15.[4132565](#)INDIVIDUALISIERTER THERAPEUTISCHER IMPFSTOFF GEGEN KREBS
EP - 15.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 21719082 Solicitante NYKODE THERAPEUTICS ASA Inventor/a FREDRIKSEN AGNETE BRUNSVIK

The present invention relates to an individualized therapeutic anticancer vaccine, methods of treatment of cancer wherein such an anticancer vaccine is used as well as methods for producing the vaccine.

16.[202311008963](#)DNA VECTOR AND IMMUNITY ANTICANCER CELL VACCINE
IN - 17.02.2023

Clasificación Internacional [A61K /](#) N° de solicitud 202311008963 Solicitante Dr.Siddharth Vats Inventor/a Dr.Siddharth Vats

The present invention relates to the preparation of immunity anti- cancer vaccine, and more specifically it relates to preparation of innovative cell vaccine in which it makes the interleukin 12 with coactivation factor (B7.1) to one vector. The different pico base gene of the interleukin 12 was remixed and it organized on one gene with first. This mode comprises the interleukin 12 of the ecology intrinsic is the pico base gene of 2. The interleukin 12 and B7.1 were positioned on the single vector using IRES and it became the transcriptional control by the identical promoter and the mode in which the relative modulation of the protein expression was possible was adopted with second. In conclusion, 3 genes (one gene and 2 pico base genes) were introduced to one vector and these genes are simultaneously expressed with one promoter and it has advantage of the protein expression amount artificially controlling.

17.[WO/2023/023371](#)FORMULATIONS CONTAINING AMINO ACIDS FOR STABILIZING LIPID ENVELOPED VIRAL AND NON-VIRAL VECTORS
WO - 23.02.2023

Clasificación Internacional [A61K 9/19](#) N° de solicitud PCT/US2022/040956 Solicitante VACCINE STABILIZATION INSTITUTE Inventor/a CHANG, Byeong Seon

Provided are stable virus formulations that contain three amino acids, a protein, a carbohydrate and a salt. In certain embodiments, the amino acids are proline, threonine and glutamic acid, each at a concentration of 0.5 - 1% w/w. The protein can be albumin at 2% w/w and the salt can be 100 mM sodium chloride. By virtue of inclusion of the amino acids, an enveloped virus or lipid enveloped non-viral vector in the formulations is physically and biologically stable both in liquid and dry powder state. In further embodiments, by virtue of inclusion of the amino acids, an enveloped virus or lipid enveloped non-viral vector in the formulations is physically and biologically stable during lyophilization process. In further embodiments, by virtue of inclusion of the amino acids, an enveloped virus or lipid enveloped non-viral vector in the formulations is physically and biologically stable during storage in both liquid and lyophilized states.

18.[4135765](#)PAN-CORONAVIRUS-IMPFSTOFFZUSAMMENSETZUNGEN
EP - 22.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 21789197 Solicitante UNIV CALIFORNIA Inventor/a BENMOHAMED LBACHIR

Pan-coronavirus recombinant vaccine compositions featuring whole proteins or sequences of proteins encompassing all mutations in variants of human and animal Coronaviruses (e.g., 36 mutations in spike protein) or a combination of mutated B cell epitopes, mutated combination of B cell epitopes, mutated CD4+ T cell epitopes, and mutated CD8+ T cell epitopes, at least one of which is derived from a non-spike protein. The mutated epitopes may comprise one or more mutations. The present invention also describes using several immuno-informatics and sequence alignment approaches to identify several human B cell, CD4+ and CD8+ T cell epitopes that are highly mutated. The vaccine compositions herein have the potential to provide long-lasting B and T cell immunity regardless of human and animal Coronaviruses mutations.

19. [20230054318](#) PERSONALIZED TUMOR VACCINE AND USE THEREOF FOR CANCER IMMUNOTHERAPY

US - 23.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 17783866 Solicitante NE1 Inc. Inventor/a Zhengping Zhuang

Disclosed herein is a personalized tumor vaccine comprising attenuated cancer cells and a method of using said personalized tumor vaccine to treat cancer.

20. [4135664](#) INDUKTION DER PRODUKTION VON ANTI-OLIGOMANNOSE-ANTIKÖRPERN

EP - 22.02.2023

Clasificación Internacional [A61K 9/08](#) N° de solicitud 21787830 Solicitante STANFORD RES INST INT Inventor/a WANG DENONG

Example methods comprise administering an immunogenic vaccine composition to a subject, the immunogenic vaccine composition comprising a glycoconjugate. The method can further comprise, in response to the administration of the immunogenic vaccine composition, inducing production of anti-oligomannose antibodies in the subject and thereby eliciting an immune response to a viral pathogen in the subject.

21. [4132573](#) NATÜRLICHE ANTIKÖRPER ZUR PROPHYLAXE UND THERAPIE

EP - 15.02.2023

Clasificación Internacional [A61K 39/04](#) N° de solicitud 21717449 Solicitante VANUDIS GMBH Inventor/a ÜBELHART RUDOLF

Described is a human or humanized natural IgM and/or IgA antibody recognizing oxidized phospholipids and/or oxidation-specific epitopes for use in a method of treating or preventing a disorder or a disease associated with/related to/caused by a natural IgM/IgA antibody deficiency (NAD) in a subject. Moreover, described is a vaccine comprising a compound that induces the generation of natural IgM and/or IgA antibodies for use in a method of reducing or preventing the clinical signs or disease associated with/related to/caused by natural IgM/IgA antibody deficiency (NAD) in a subject, wherein said vaccine comprises a pharmaceutically acceptable carrier or excipient. Further, described is such a vaccine for use in a method of reducing or preventing the clinical signs or disease associated with/related to/caused by natural IgM/IgA antibody deficiency (NAD) in a subject, wherein said compound induces human natural IgM and/or IgA antibody recognizing oxidized phospholipids and/or oxidation-specific epitopes.

22. [WO/2023/021056](#) VACCINE DESIGN PIPELINE

WO - 23.02.2023

Clasificación Internacional [G16B 35/10](#) N° de solicitud PCT/EP2022/072895 Solicitante INTOMICS A/S Inventor/a LUNDEGAARD, Claus

Herein are provided computer implemented methods for designing sets of peptides, such as for use in a vaccine. Also provided are computer-readable media, computer program products and sets of propagated

signals for designing sets of peptides, such as for use in a vaccine. Further provided are methods of treatment, uses and kits comprising peptides designed according to the computer implemented methods.

23. [4136460](#) VERFAHREN UND KITS ZUM NACHWEIS ODER ZUR BESTIMMUNG EINER MENGE EINES ANTI-B-CORONAVIRUS-ANTIKÖRPERS IN EINER PROBE

EP - 22.02.2023

Clasificación Internacional [G01N 33/68](#) N° de solicitud 21726240 Solicitante ABBOTT LAB Inventor/a MUERHOFF A SCOTT

Disclosed herein are methods, kits, systems, algorithms and improvements for detecting the presence of or determining an amount, quantity, concentration and/or level of an antibody against at least one type of β -coronavirus, such as, for example, an antibody against SARS-CoV or SARS-CoV-2, in one or more samples obtained from a subject. In some aspects, the methods, kits and systems relate to detecting the presence of or determining an amount, quantity, concentration and/or level of at least one type of anti- β -coronavirus antibody, such as an IgG and/or IgM antibody, in one or more samples obtained from a subject. The methods, kits systems, algorithms and improvements can also be used to monitor a subject's response and/or treatment to a β -coronavirus, determine whether or not a subject will develop or experience a cytokine storm, predict outcome in a subject, determine whether a subject can be administered a vaccine for a β -coronavirus, monitoring antibody response in individuals that have received a β -coronavirus vaccine (such as a SARS-CoV-2 vaccine), and/or determine the immune status of a subject.

24. [WO/2023/016336](#) RECOMBINANT VIRUS CONTAINING DEGRON, PREPARATION METHOD THEREFOR, AND APPLICATION THEREOF

WO - 16.02.2023

Clasificación Internacional [C12N 7/01](#) N° de solicitud PCT/CN2022/110258 Solicitante SHENZHEN INSTITUTES OF ADVANCED TECHNOLOGY CHINESE ACADEMY OF SCIENCES Inventor/a SI, Longlong

A recombinant virus containing a degran, a preparation method therefor, and an application thereof. At least one viral protein of the recombinant virus containing the degran contains at least one degran capable of being recognized by a protein degradation system of a host cell, wherein the degran comprises any one of or a combination of at least two of an amino acid sequence, a polypeptide, or a structural motif. Further provided are a nucleic acid molecule, a recombinant vector, a preparation method for the recombinant virus containing the degran, a preparation system for the recombinant virus containing the degran, a vaccine, an oncolytic virus, and a drug. The recombinant virus containing the degran can be recognized and degraded by the protein degradation system in the host cell, the replication capability is weakened or even removed, and after a corresponding vaccine, oncolytic virus or drug is prepared, a good effect and practical application value are achieved.

25. [WO/2023/018817](#) TRUNCATED INFLUENZA NEURAMINIDASE AND METHODS OF USING THE SAME

WO - 16.02.2023

Clasificación Internacional [C07K 14/11](#) N° de solicitud PCT/US2022/039980 Solicitante SANOFI PASTEUR INC. Inventor/a BARRO, Maro

Provided are modified influenza virus subtype 2 neuraminidase molecules lacking all or substantially all of the stalk region that form active, soluble tetrameric neuraminidase when expressed in host cells and vaccine compositions comprising the tetrameric neuraminidase or a nucleic acid encoding the modified monomeric influenza virus subtype 2 neuraminidase molecules that forms tetrameric NA when expressed in a cell. Also provided are methods of using the vaccine compositions to vaccinate or immunize a subject against influenza virus.

26. [WO/2023/023466](#) SARS-COV-2 MULTITOPE PEPTIDE/PROTEIN VACCINE FOR THE PREVENTION AND TREATMENT OF CORONAVIRUS DISEASE, 2019 (COVID-19)

WO - 23.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud PCT/US2022/074904 Solicitante VAXXINITY, INC. Inventor/a GUIRAKHOO, Farshad

The present disclosure is directed to high-precision, site-directed peptide immunogen constructs for the prevention of infection by SARS-CoV-2; receptor-based antiviral therapies for the treatment of the disease in infected patients; and designer protein vaccine containing S1-RBD-sFc. The disclosed invention utilizes amino acid sequences from SARS-CoV-2 proteins as well as human receptors for the design and manufacture of optimal SARS-CoV-2 antigenic peptides, peptide immunogen constructs, CHO-derived protein immunogen constructs, long-acting CHO-derived ACE2 proteins, and formulations thereof, as diagnostics, vaccines, and antiviral therapies for the detection, prevention, and treatment of COVID-19.

27. [4135847](#) CORONAVIRUS-IMPFSTOFF

EP - 22.02.2023

Clasificación Internacional [A61P 31/14](#) N° de solicitud 21788260 Solicitante VLP THERAPEUTICS INC Inventor/a SMITH JONATHAN F

Provided herein is an isolated polynucleotide, which encodes alphavirus non-structural proteins nsp1, nsp2, nsp3 and nsp4 and a polypeptide comprising a coronavirus protein fused to a signal sequence and/or transmembrane domain. The coronavirus protein may be the receptor binding domain of the S1 subunit of coronavirus spike (S) protein. The polynucleotide such as RNA is useful for as a vaccine against coronavirus infection, especially, COVID-19 infection.

28. [4137506](#) IMPFSTOFFZUSAMMENSETZUNG GEGEN AFRIKANISCHE SCHWEINEPEST

EP - 22.02.2023

Clasificación Internacional [C07K 14/005](#) N° de solicitud 21788370 Solicitante PLUMBLINE LIFE SCIENCES INC Inventor/a KIM EUN JIN

The present invention relates to a polypeptide, a polynucleotide, a plasmid and a vaccine composition comprising the same, which are involved in eliciting immune responses to African Swine Fever. And also, it relates to a method of eliciting immune responses to African Swine Fever in a subject. In addition, it relates to a pharmaceutical composition for treating or preventing African Swine Fever comprising a polypeptide, a polynucleotide or a plasmid, which is involved in eliciting immune responses to African Swine Fever. Also, it relates to a method of treating or preventing African Swine Fever in a subject.

29. [20230058789](#) SARS-COV-2 CHIMERIC VLP VACCINE COMPOSITION, EXPRESSING VECTOR AND USE THEREOF

US - 23.02.2023

Clasificación Internacional [C07K 14/005](#) N° de solicitud 17816495 Solicitante National Tsing Hua University Inventor/a SUH CHIN WU

The present invention provides a SARS-CoV-2 chimeric VLP vaccine composition and an expressing vector and use thereof. The chimeric SARS-CoV-2 VLP comprises a VLP skeleton formed by the M1 protein and the M2 protein of influenza virus, and the chimeric spike protein of SARS-CoV-2, expressed on the surface of the VLP skeleton, the transmembrane domain of which is replaced by the transmembrane domain of a HA of influenza virus. The present invention also provides a recombinant vector expressing the chimeric SARS-CoV-2 VLP, and the use of the chimeric SARS-CoV-2 VLP for eliciting an immune response against SARS-CoV-2 variants.

30. [WO/2023/023674](#) CORONAVIRUS VACCINE FORMULATIONS INCORPORATING PRIME AND BOOST

WO - 23.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud PCT/US2022/075291 Solicitante CORONAVAX, LLC Inventor/a LYDAY, Bruce

Disclosed herein are vaccine components for prevention of Coronavirus infection through a combination Prime-Boost design. The prime components are viral vectors of the Alphavirus family carrying a transgene coding for the receptor-binding domain (RBD), of a coronavirus. The boost components are modified proteins coding for Coronavirus Spike (S) proteins from various strains, mixed with an adjuvant.

31. [WO/2023/020637](#) ANTIGENOS QUIMERICOS PARA EL CONTROL DE CORONAVIRUS Y COMPOSICIONES QUE LOS COMPRENDEN

WO - 23.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/CU2022/050009 Solicitante CENTRO DE INGENIERIA GENETICA Y BIOTECNOLOGIA Inventor/a ESTRADA GARCÍA, Mario, Pablo

Antígenos quiméricos que comprenden un segmento que consiste en el dominio de unión al receptor de la proteína S1 o en la proteína N de dicho virus y el segmento extracelular de la proteína CD154 humana, así como composiciones vacunales contra el coronavirus SARS-CoV2 que comprenden al menos uno de esos antígenos y un adyuvante. Uso de los antígenos quiméricos para la fabricación de una composición vacunal contra SARS-CoV2. Método para la inducción de respuesta inmune contra el SARS-CoV2 en un individuo que lo necesita donde se administra una cantidad farmacéuticamente efectiva de al menos un antígeno quimérico que comprende el dominio de unión al receptor de la proteína S1 o la proteína N de dicho virus y el segmento extracelular de la proteína CD154 humana.

32. [20230045943](#) ATTENUATED HISTOMONAS MELEAGRIDIS STRAIN AND VACCINE

US - 16.02.2023

Clasificación Internacional [C12N 1/10](#) N° de solicitud 17851692 Solicitante VETERINÄRMEDIZINISCHE UNIVERSITÄT WIEN Inventor/a Michael HESS

A *Histomonas meleagridis* strain having at least one of the following attenuating features (a) an inactivation of a gene, wherein the gene has the sequence identified by SEQ ID NO: 1 or a sequence with at least 90% sequence identity thereto, (b) an inactivation of a gene, wherein the gene has the sequence identified by SEQ ID NO: 2 or a sequence with at least 90% sequence identity thereto, (c) a truncating mutation in the coding sequence of a gene, wherein the gene has the unmutated coding sequence identified by SEQ ID NO: 3 or an unmutated coding sequence with at least 95% sequence identity thereto, and (d) a truncating mutation in the coding sequence of a gene, wherein the gene has the unmutated coding sequence identified by SEQ ID NO: 4 or an unmutated coding sequence with at least 95% sequence identity thereto. An anti-histomonosis vaccine containing the strain.

33. [WO/2023/021168](#) METHOD OF PRODUCING A FOOT AND MOUTH DISEASE VIRUS VIRUS-LIKE PARTICLE

WO - 23.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/EP2022/073144 Solicitante INTERVET INTERNATIONAL B.V. Inventor/a VAN DEN BORN, Erwin

The invention concerns a method of producing a foot and mouth disease virus (FMDV) virus-like particle (VLP) in a baculovirus expression system, the method comprising the steps of (i) infecting an insect cell with a baculovirus expression vector, (ii) culturing the insect cell in cell culture medium for 4 days or more post infection, (iii) separating the insect cells from the cell culture to obtain cell-free cell culture medium, and (iv) harvesting the FMDV VLP from the cell-free cell culture medium. The invention further relates to a vaccine for use in the protection of a subject against an infection with FMDV, the vaccine being obtainable by the method of the invention.

34. [20230057428](#) CORONAVIRUS DISEASE (COVID-19) VACCINE

US - 23.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 17817708 Solicitante Thomas Jefferson University Inventor/a Matthias Johannes SCHNELL

The present invention includes a vaccine comprising a SARS-CoV-2 spike protein (S) or portion thereof, and methods of use thereof.

35. [WO/2023/021167](#) METHOD OF PRODUCING A FOOT AND MOUTH DISEASE VIRUS VIRUS-LIKE PARTICLE

WO - 23.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/EP2022/073143 Solicitante INTERVET INTERNATIONAL B.V. Inventor/a VAN DEN BORN, Erwin

The invention concerns a method of producing a foot and mouth disease virus (FMDV) virus-like particle (VLP) in a baculovirus expression system, the method comprising the steps of (i) infecting an insect cell with a baculovirus expression vector, (ii) culturing the insect cell in cell culture medium for 5 days or more post infection and (iii) harvesting the FMDV VLP from the cell culture medium. The invention further relates to a vaccine for use in the protection of a subject against an infection with FMDV, the vaccine being obtainable by the method of the invention.

36. [WO/2023/023332](#) MONOPHOSPHORYL LIPID ADJUVANT (MPLA) COMPOSITIONS, VACCINE COMPOSITIONS THEREOF, AND METHODS OF PREPARING AND USING THE SAME

WO - 23.02.2023

Clasificación Internacional [A61K 39/39](#) N° de solicitud PCT/US2022/040897 Solicitante THOMAS JEFFERSON UNIVERSITY Inventor/a SCHNELL, Matthias, Johannes

The present invention relates, in part, to an oil-in-water emulsion comprising an emulsifying agent, an aqueous phase, an oil phase comprising squalene, and a monophosphoryl lipid adjuvant (MPLA), and methods of preparing and using the same. The present invention further relates to a vaccine composition comprising the emulsion of the present invention and an antigen and/or antigenic composition, and methods using the same.

37. [202111013086](#) A NOVEL PESTE-DES-PETITS-RUMINANTS (PPR) VIRAL VECTOR BASED ON THE INDIAN VACCINE STRAIN SUNGRI/96

IN - 17.02.2023

Clasificación Internacional [A61K /](#) N° de solicitud 202111013086 Solicitante Indian Council of Agricultural Research Inventor/a Mageswary Chandra Sekar

The present invention discloses a viral vector rescue of Indian PPRV Sungri/96 strain through three helper cDNA cassettes for the Nucleoprotein (N), phosphoprotein (P), Large polymerase (L), and a modified genome length PPRV cDNA, wherein, the said modifications include an additional PPRV regulated expression cassette with translation enhancing elements and unique restriction enzyme sites within the cassette to facilitate direct cloning of foreign genes in a single-step. The ability of this vector to generate recombinant PPR virus, expressing foreign antigens in host cells has been verified using a GFP (green fluorescent protein) marker.

38. [WO/2023/023520](#) MEMBRANE FUSION AND IMMUNE EVASION BY THE SPIKE PROTEIN OF SARS-COV-2 DELTA VARIANT

WO - 23.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud PCT/US2022/075027 Solicitante CHILDREN'S MEDICAL CENTER CORPORATION Inventor/a CHEN, Bing

Provided herein, in some aspects, are methods for using the receptor-binding domain (RBD) of the SARS-CoV-2 S protein, including the the RBD-1, RBD-2, and/or RBD-3 regions, to identify therapeutics for the treatment of SARS-CoV-2, developing a vaccine for the treatment or prevention of SARS-CoV-2, and identifying a patient as being in need for a treatment for SARS-CoV-2.

39. [WO/2023/021195](#) mRNA VACCINES COMPRISING IL-4 AND/OR IL-13 RNA AND USES THEREOF
WO - 23.02.2023

Clasificación Internacional [A61K 38/20](#) N° de solicitud PCT/EP2022/073222 Solicitante NEOVACS
Inventor/a DROUET, Beatrice

The present invention relates to an mRNA vaccine comprising at least one RNA molecule encoding at least one cytokine (preferably IL-4, IL-13 or fragments thereof) and at least one T cell epitope, for treating or preventing disorders associated with aberrant IL-4 and/or IL-13 expression or activity, in particular asthma, atopic dermatitis and allergic disorders.

40. [WO/2023/016454](#) MATERIALS AND METHODS TO COMPREHENSIVELY DEFINE ADAPTIVE IMMUNE RESPONSES

WO - 16.02.2023

Clasificación Internacional [C12N 15/10](#) N° de solicitud PCT/CN2022/111160 Solicitante THE UNIVERSITY OF HONG KONG Inventor/a SUN, Ren

Methods for detecting adaptive immune responses to pathogens or self-antigens by antibody or B cell or T cell binding to antigenic epitopes have been established. The methods inform functional and structural interactions between immune receptors and antigens, identify potential therapeutic targets and guide vaccine development. The methods employ high throughput modified mRNA-display or variations of droplet display to determine single epitope-specific antibody and B- and T- cell receptor sequences at the genomic scale at single epitope and single amino acid resolution. In some forms, the methods collect and integrate the data to provide a database of an adaptive immunity profile for a human or animal subject. In some forms, the methods identify and record changes in an immunity profile over different time points to reflect immunological responses in a subject. The methods provide high resolution immunity profiles of immune responses at the genomic level for diagnostic, prophylactic, and therapeutic applications.

41. [202227066291](#) VACCINE ADJUVANTS

IN - 17.02.2023

Clasificación Internacional [A61K 31/437](#) N° de solicitud 202227066291 Solicitante VIROVAX LLC
Inventor/a DAVID, Sunil, Abraham

A compound comprising a structure of Compound 1, or prodrug thereof, salt thereof, or tautomer, polymorph, solvate, or combination thereof, can be used as an adjuvant in vaccines. The Compound 1 can be used in: methods of performing a vaccination; methods of agonizing a TLR 7 and/or TLR 8; and/or methods of activating an immune system.

42. [20230048677](#) AFRICAN SWINE FEVER VIRUS CHIMERIC PROTEIN, VACCINE COMPOSITION, PREPARATION METHOD AND USE THEREOF

US - 16.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud 17758182 Solicitante PULIKE BIOLOGICAL ENGINEERING, INC. Inventor/a Kegong Tian

Provided is an African swine fever virus chimeric protein. The chimeric protein comprises: (1) an African swine fever virus p72 domain I; (2) an African swine fever virus p72 domain II; (3) an African swine fever virus p72 domain III; and (4) an African swine fever virus antigenic protein. By using African swine fever virus p72 protein as a skeleton, the chimeric protein provided in the present invention will exhibit antigenic epitopes of African swine fever virus antigenic proteins p54, p30, CD2v, and p12, achieve a good immune effect, and can produce significant humoral and cell-mediated immune response.

43. [20230053680](#) Multivalent Plant Immune Fusion Protein, Production Method Thereof and Its Use

US - 23.02.2023

Clasificación Internacional [C07K 14/27](#) N° de solicitud 17503356 Solicitante Suzhou Yishuimo Biological Technology Co., LTD Inventor/a Aiyun Sun

The present invention belongs to the field of biotechnology, in particular to a multivalent fusion protein AB-NAC-189, method for producing the same, and uses thereof. The protein AB-NAC-189 is a fusion of a polypeptide segment AB, nascent polypeptide-associated complex (NAC), and a protein 189 corresponding to amino acids 1-189 from the N-terminal of protein HarpinEa. The fusion has the properties of a multivalent plant immune protein, thus it can effectively stimulate the hypersensitive response of tobacco leaves and has good thermal stability. While stimulating the immune response of plants, it can also improve the disease resistance of plants and promote plant growth. The AB-NAC-189 multivalent vaccine shows higher activity per unit concentration, and greater ability to promote growth of wheat and tobacco; meanwhile it can significantly promote chlorophyll synthesis in Goji berry, thereby improving the yield and quality of Goji berries.

44. [20230049012](#) VACCINE IN COMBINATION WITH AN IMMUNE CHECKPOINT INHIBITOR FOR USE IN TREATING CANCER

US - 16.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 17818584 Solicitante Ultimovacs AS Inventor/a Gustav Gaudernack A polypeptide for use in medicine is provided. The polypeptide is administered simultaneously, separately or sequentially with an immune checkpoint inhibitor. The polypeptide comprises at least one polypeptide comprising a region of at least 12 amino acids of a self-antigen or a sequence having at least 80% identity to the region. The polypeptide is less than 100 amino acids in length.

45. [4132613](#) SYSTEME UND VERFAHREN FÜR VORGEFÜLLTE MEDIZINISCHE ABGABEVORRICHTUNGEN

EP - 15.02.2023

Clasificación Internacional [A61M 5/28](#) N° de solicitud 21783754 Solicitante KOSKA FAMILY LTD Inventor/a KOSKA MARC ANDREW

A pre-filled medical delivery assembly assembled and configured to allow delivery of a single dose of a therapeutic agent (e.g., vaccine, drug, medicament, etc.) from a Blow-Fill-Seal (BFS) vial to a patient. The delivery assembly generally includes a modular design consisting of separately constructed components cooperatively arranged and coupled to one another.

46. [WO/2023/019131](#) VIRUS-LIKE PARTICLE VACCINE FOR RESPIRATORY SYNCYTIAL VIRUS

WO - 16.02.2023

Clasificación Internacional [C07K 14/135](#) N° de solicitud PCT/US2022/074699 Solicitante ICOSAVAX, INC. Inventor/a KANESA-THASAN, Niranjan

The present disclosure relates to targeting Respiratory Syncytial Virus (RSV), and methods of using such vaccines to treat infections with RSV, in particular, lower respiratory tract infections (LRTIs).

47. [20230055706](#) NEW USE OF BCG IMMUNOGENIC FORMULATION EXPRESSING A RESPIRATORY SYNCYTIAL VIRUS PROTEIN AGAINST hMPV

US - 23.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud 17757972 Solicitante PONTIFICIA UNIVERSIDAD CATOLICA DE CHILE Inventor/a Alexis KALERGIS

The invention relates to the novel use of an immunogenic formulation containing the *bacillus* Calmette-Guérin (BCG) strain at a concentration between 10⁴-10⁹ bacteria, expressing at least one protein or immunogenic fragment of respiratory syncytial virus (RSV, Human orthopneumovirus), in a pharmaceutically acceptable saline buffer solution because it serves to prepare a vaccine useful to prevent, treat, or attenuate human metapneumovirus (hMPV) infections.

48. [WO/2023/018782](#) METHODS TO DETERMINE CD4+ MEMORY T CELL RESPONSES TO SARS-COV-2 INFECTION OR VACCINATION

WO - 16.02.2023

Clasificación Internacional [C07K 14/165](#) N° de solicitud PCT/US2022/039932 Solicitante ST. JUDE CHILDREN'S RESEARCH HOSPITAL, INC. Inventor/a THOMAS, Paul

Disclosed are methods for identifying or determining whether a subject exhibits a CD4+ memory T cell response to SARS-CoV-2 infection or vaccination, assessing the efficacy of a SARS-CoV-2 vaccine, and developing personalized SARS-CoV-2 treatment plans by detecting the presence and/or quantity of a particular T cell receptor a chain that recognizes a specific Spike protein epitope.

49. [WO/2023/019217](#) DRY LIPOSOME ADJUVANT-CONTAINING VACCINES AND RELATED METHODS THEREOF

WO - 16.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/US2022/074857 Solicitante BOARD OF REGENTS, THE UNIVERSITY OF TEXAS SYSTEM Inventor/a CUI, Zhengrong

Described herein are dry powder compositions of liposomes, liposomal adjuvant or liposomal adjuvanted vaccines. Formulations containing a cryoprotectant can be converted to dry powders using, e.g., thin-film freeze-drying (TFFD). The composition may comprise a liposomal adjuvant, such as AS01B adjuvant, or also including an antigen, i.e., AS01B- adjuvanted vaccine compositions.

50. [WO/2023/021421](#) LOW-DOSE LYOPHILIZED RNA VACCINES AND METHODS FOR PREPARING AND USING THE SAME

WO - 23.02.2023

Clasificación Internacional [A61K 9/127](#) N° de solicitud PCT/IB2022/057663 Solicitante GLAXOSMITHKLINE BIOLOGICALS SA Inventor/a LODAYA, Rushit

Compositions and methods are provided for stabilization of RNA encapsulated by lipid nanoparticles during lyophilization. The compositions and methods involve the use of empty lipid nanoparticles to stabilize the lyophilized composition. These techniques may be used to prevent the need for cold chain storage and may also simplify the procedure at the clinic for reconstituting the vaccine to prepare an injectable composition.

51. [WO/2023/021241](#) ENCAPSULATED BIOMOLECULES FOR INTRACELLULAR DELIVERY

WO - 23.02.2023

Clasificación Internacional [A61K 9/48](#) N° de solicitud PCT/FI2022/050532 Solicitante ÅBO AKADEMI Inventor/a ZHANG, Hongbo

According to an example aspect of the present invention, there are provided biomolecules encapsulated with Metal Organic Frameworks (MOFs) for use in intracellular delivery and controlled release of the biomolecules within cells, in vitro and in vivo. The invention also discloses the use of MOFs in combination with biomolecules for gene editing, cancer therapy and vaccine development.

52. [WO/2023/020738](#) FMDV VIRUS-LIKE PARTICLE WITH DOUBLE STABILIZING MUTATION

WO - 23.02.2023

Clasificación Internacional [A61K 39/135](#) N° de solicitud PCT/EP2022/067889 Solicitante THE PIRBRIGHT INSTITUTE Inventor/a PORTA, Claudine

The invention concerns a modified recombinant foot and mouth disease virus (FMDV) VP2 protein and further concerns an FMDV capsid precursor protein P1 comprising the modified VP2 protein. In a specific aspect, the present invention concerns a VP2 protein or a capsid precursor protein P1 comprising the VP2 protein, wherein the amino acid sequence of the VP2 protein is modified to improve the stability of FMDV capsids. The invention further relates to an isolated nucleic acid molecule and an expression vector comprising the nucleic acid molecule for recombinant expression of the modified VP2 protein or a capsid precursor protein P1 comprising the VP2 protein. In further aspects, the invention relates to a

virus-like particle (VLP) obtained from the modified capsid precursor protein P1 and a vaccine for use in the protection of a subject against an infection with FMDV produced from the VLP.

53. [WO/2023/017154](#)[1,2,4]TRIAZOLO[4,3-A]PYRIMIDIN-7(8H)-ONE AS MITOCHONDRIAL PYRUVATE CARRIER INHIBITORS FOR USE IN THE TREATMENT OF CANCER

WO - 16.02.2023

Clasificación Internacional [A61K 31/425](#) N° de solicitud PCT/EP2022/072681 Solicitante MPC THERAPEUTICS SA Inventor/a PERRY, Benjamin

The present invention is related to compounds, methods, compositions and uses that are able to inhibit mitochondrial pyruvate carrier (MPC) activity and which are useful for immunotherapy, in particular T-cell therapies, immune check point inhibitors or anti-cancer vaccine.

54. [WO/2023/018984](#)GENETICALLY ENGINEERED CELL-DERIVED VACCINES

WO - 16.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud PCT/US2022/040243 Solicitante THE REGENTS OF THE UNIVERSITY OF CALIFORNIA Inventor/a KWON, Young, Jik

The disclosure provides for compositions and methods comprising cell-derived vesicles induced from cells that have been genetically engineered or infected to express specific antigen(s), and uses thereof, including as a cell-free, cell-like vaccine.

55. [WO/2023/019194](#)DRY POWDER COMPOSITIONS OF OIL-IN-WATER (O/W) EMULSION ADJUVANTED VACCINES

WO - 16.02.2023

Clasificación Internacional [A61K 39/39](#) N° de solicitud PCT/US2022/074813 Solicitante BOARD OF REGENTS, THE UNIVERSITY OF TEXAS SYSTEM Inventor/a CUI, Zhengrong

Described herein is the use of thin film freeze drying methods with oil-in-water adjuvants to produce improved vaccine compositions. This approach solves several major problems associated with the emulsion-adjuvanted vaccines. Additionally, the developed dry powder compositions have the potential to be administered via non-invasive routes (such as intranasal, pulmonary, transcutaneous with or without microneedles) and be stored at ambient temperatures which significantly reduce the costs of vaccination programs.

56. [WO/2023/019181](#)SARS-COV-2 LIPID NANOPARTICLE VACCINE FORMULATIONS

WO - 16.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud PCT/US2022/074780 Solicitante MODERNATX, INC. Inventor/a SMITH, Michael, H.

Stabilized formulations of lipids and nucleic acids, including lipid nanoparticle formulations which encapsulate nucleic acids encoding a SARS-CoV-2 prefusion stabilized spike (S) protein are disclosed herein. Methods of using the formulations are also provided.

57. [4132950](#)ZUSAMMENSETZUNGEN MIT DREI OSPA-FUSIONSPROTEINEN ZUR MEDIZINISCHEN VERWENDUNG

EP - 15.02.2023

Clasificación Internacional [C07K 14/20](#) N° de solicitud 21720149 Solicitante VALNEVA AUSTRIA GMBH Inventor/a BÉZAY NICOLE

The present invention relates to a composition comprising the OspA fusion protein of SEQ ID NO: 1 (LipSIDI-S2DI), the OspA fusion protein of SEQ ID NO: 2 (Lip-S4D1- SShybD1) and the OspA fusion protein of SEQ ID NO: 3 (Lip-S5D1-S6D1) for use in a vaccine or for use in a method for eliciting an immune response in a human against Lyme disease.

58. [4135762](#)PAN-CORONAVIRUS IMPFSTOFFZUSAMMENSETZUNGEN MIT GROSSER SEQUENZ

EP - 22.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 21787613 Solicitante UNIV CALIFORNIA
Inventor/a BENMOHAMED LBACHIR

Pan-coronavirus vaccines for inducing efficient, powerful and long-lasting protection against all Coronaviruses infections and diseases, comprising multiple highly conserved large sequences which may comprise one or more conserved B, CD4 and CDS T cell epitopes that help provide multiple targets for the body to develop an immune response for preventing a Coronavirus infection and/or disease. In certain embodiments, the large sequences are conserved proteins or large sequences, e.g., sequences that are highly conserved among human coronaviruses and/or animal coronaviruses (e.g., coronaviruses isolated from animals susceptible to coronavirus infections).

59.[202347009726](#)MULTIVALENT BETA-CORONAVIRUS VACCINES, THEIR DESIGN AND USES
IN - 17.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 202347009726 Solicitante GREFFEX, INC.
Inventor/a STAERZ, Uwe, D.

A multivalent vaccine for preventing CoV infection includes more than one protein antigen derived from antigens encoded within a CoV genome. At least one of the more than one protein antigen derived from antigens encoded within a CoV genome is a protein antigen, RNA- encoded genetic information, DNA- encoded genetic information, or genetic information within a genetic vector.

60.[4135714](#)PHOSPHOLIPIDE UND PHOSPHOLIPID-METABOLITEN ZUR BEHANDLUNG VON
VIRALEN UND BAKTERIELLEN LUNGENENTZÜNDUNGEN UND SEPSIS
EP - 22.02.2023

Clasificación Internacional [A61K 31/685](#) N° de solicitud 21718135 Solicitante HETTICH ANDREAS
GMBH & CO KG Inventor/a MASSING ULRICH

Die Erfindung betrifft Lyso-Phosphatidylcholin (LysoPC), oder ein geeigneter Vorläufer oder Derivat desselben, oder eine Zusammensetzung enthaltend LysoPC und/oder einen oder mehrere geeignete Vorläufer oder Derivate desselben, zur Verwendung in der Behandlung und Nachbehandlung von Entzündungskrankheiten des Menschen, die mit einer Erniedrigung des LysoPC Spiegels einhergehen, einschließlich der Behandlung, Vorbeugung bzw. Unterstützung der Behandlung sowie der Nachbehandlung von viralen und bakteriellen Lungenentzündungen und Sepsis, einschließlich der Lungenentzündung und Sepsis in Folge von Influenza, Covid-19, ARDS, Krebs, zur Unterstützung der Immuntherapie bei Krebs hinsichtlich der Wirksamkeit und zur Verminderung von Nebenwirkungen wie Pneumonitis, Kolitis oder Hepatitis sowie zur Verminderung von Impfreaktionen. Die Erfindung betrifft weiterhin alpha-Glycerophosphocholin (alpha-GPC) oder eine Variante desselben, oder eine Zusammensetzung enthaltend alpha-GPC und/oder eine oder mehrere Varianten desselben, zur Verwendung in der Behandlung und Nachbehandlung von Krebserkrankungen und Tumorkachexie.

61.[4135763](#)VERFAHREN ZUR HERSTELLUNG UND VERWENDUNG EINES IMPFSTOFFS GEGEN
CORONAVIRUS
EP - 22.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud 21788574 Solicitante MASSACHUSETTS EYE &
EAR INFIRMARY Inventor/a VANDENBERGHE LUC H

Provided herein are vaccines against coronavirus that utilize adeno-associated virus (AAV) for delivery.

62.[WO/2023/023654](#)METHODS AND COMPOSITIONS FOR TREATING FIBROTIC DISEASES
WO - 23.02.2023

Clasificación Internacional [C07K 16/44](#) N° de solicitud PCT/US2022/075226 Solicitante SIWA
CORPORATION Inventor/a GRUBER, Lewis, S.

A method of treating or preventing the onset of a fibrotic disease comprises administering to a subject a composition comprising an anti-AGE antibody. The anti- AGE antibody binds an AGE antigen comprising

at least one protein or peptide that exhibits AGE modifications selected from the group consisting of FFI, pyrrolidine, AFGP, ALI, carboxymethyllysine, carboxyethyllysine and pentosidine. A method of treating or preventing the onset of a fibrotic disease comprises administering to a subject a vaccine comprising an AGE antigen.

63. [20230059675](#) TUMOR-SPECIFIC POLYPEPTIDE SEQUENCE AND USE THEREOF

US - 23.02.2023

Clasificación Internacional [C07K 7/08](#) N° de solicitud 17774873 Solicitante SHENZHEN GINO BIOTECHNOLOGY CO., LTD. Inventor/a Bo LI

Provided are a tumor-specific polypeptide sequence and use thereof. The polypeptide includes at least one polypeptide in a first peptide group, and optionally, at least one polypeptide in a second peptide group, the first peptide group includes polypeptides having amino acid sequences set forth in SEQ ID NO: 1 to SEQ ID NO: 4, the second peptide group includes derivative peptides of the amino acid sequences set forth in SEQ ID NO: 1 to SEQ ID NO: 4, the derivative peptide includes a front peptide segment, a middle peptide segment, and a back peptide segment that are connected in sequence. Further provided are a nucleic acid, a construct, an expression vector, a pharmaceutical composition, an antigen-presenting cell, an immune effector cell, a tumor vaccine, use of the polypeptide in the preparation of drugs for preventing or treating tumors, and a method for treating a patient suffering from tumors.

64. [WO/2023/023164](#) VACCINE ASSESSMENT AND COMPLIANCE TESTING METHODS AND SYSTEMS

WO - 23.02.2023

Clasificación Internacional [A61K 9/00](#) N° de solicitud PCT/US2022/040612 Solicitante INNOVAR SCIENTIFIC, INC. Inventor/a GILSTRAP, Richard, A.

Various methods and corresponding systems for evaluating potency-correlated material states of a state dependent pharmaceutical product are disclosed. The method may include the steps of creating a data representation of material state specifications for a pharmaceutical product using data gathered from at least one sensor. The method may include correlating a minimum viable potency of the pharmaceutical product and communicating the data representation to at least one participant of a supply chain. The method may include the steps of generating a specimen representation of a material state of a sample of the pharmaceutical product using data gathered from at least one sensor acting on the sample and evaluating the specimen representation of the material state of the sample. The method may include the step of determining whether the specimen representation of the material state of the sample exhibits a material state change greater than the maximum allowable material state change.

65. [WO/2023/017945](#) FORMULATION OF CORONA VIRUS VACCINE

WO - 16.02.2023

Clasificación Internacional [A61K 39/215](#) N° de solicitud PCT/KR2022/004186 Solicitante SK BIOSCIENCE CO., LTD. Inventor/a YOON, Il-Sub

The present invention relates to: a composition for preparing a formulation having an improved adsorption rate of a SARS-coronavirus-2 antigenic polypeptide to an aluminum salt adjuvant; a method for improving an adsorption rate; and a method for preparing a formulation having an improved adsorption rate.

66. [20230046543](#) NOVEL PEPTIDES AND COMBINATION OF PEPTIDES FOR USE IN IMMUNOTHERAPY AGAINST LUNG CANCER, INCLUDING NSCLC, SCLC AND OTHER CANCERS

US - 16.02.2023

Clasificación Internacional [C07K 14/47](#) N° de solicitud 17934673 Solicitante Immatics Biotechnologies GmbH Inventor/a Colette SONG

The present invention relates to peptides, proteins, nucleic acids and cells for use in immunotherapeutic methods. In particular, the present invention relates to the immunotherapy of cancer. The present

invention furthermore relates to tumor-associated T-cell peptide epitopes, alone or in combination with other tumor-associated peptides that can for example serve as active pharmaceutical ingredients of vaccine compositions that stimulate anti-tumor immune responses, or to stimulate T cells ex vivo and transfer into patients. Peptides bound to molecules of the major histocompatibility complex (MHC), or peptides as such, can also be targets of antibodies, soluble T-cell receptors, and other binding molecules.

67. [4132574](#) IMMUNOGENE ZUSAMMENSETZUNG MIT ANTIGENER UND LIPOSOMALER FORMULIERUNG, HERSTELLUNGSVERFAHREN DAFÜR, MEDIKAMENT DARAUS
EP - 15.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud 21715932 Solicitante INNOMEDICA HOLDING AG
Inventor/a HALBHERR STÉFAN JONATHAN

The present invention concerns an immunogenic composition comprising (a) an antigenic moiety, preferably an antigenic moiety being or comprising an amino acid sequence corresponding to a surface protein domain of SARS-CoV-2 virus; and (b) a liposomal formulation as an adjuvant. More specifically, the antigenic moiety preferably is either the receptor binding domain RBD of Spike protein S of SARS-CoV-2 virus, or the HR domain of S₂ subunit of spike protein S of SARS-CoV-2 virus; or an immunogenic fragment thereof. The invention further relates to a method of producing an immunogenic composition and the use of such composition as a medicament.

68. [4133097](#) VERBESSERTE VERFAHREN ZUR HERSTELLUNG EINES LIPIDIERTEN PROTEINS
EP - 15.02.2023

Clasificación Internacional [C12P 21/02](#) N° de solicitud 21716471 Solicitante VALNEVA AUSTRIA GMBH
Inventor/a SCHLEGL ROBERT

The present invention relates to method of producing a lipidated protein, a pharmaceutical composition comprising the protein of any of SEQ ID NOs: 1, 2, and/or 3 and/or the lipidated form of a protein comprising the protein of SEQ ID NO: 7 (C-TAB.G5) and/or SEQ ID NO: 8 (C-TAB.G5.1), especially the protein of SEQ ID NO: 12 (Lip-C- TAB.G5.1), and/or a lipidated form of a protein comprising the protein of SEQ ID NO: 15 (Spike protein of SARS-CoV-2) and/or a lipidated form of a protein comprising the any of the proteins of SEQ ID NOs: 16-22 (hMPV F protein), and the pharmaceutical composition for use as a medicament, particularly a vaccine and/or for use in a method for eliciting an immune response in a human against Lyme disease, a disease caused by *Clostridium difficile* or hMPV and/or of SARS-CoV-2 (COVID-19).

69. [20230051523](#) NOVEL PEPTIDES AND COMBINATION OF PEPTIDES FOR USE IN IMMUNOTHERAPY AGAINST LUNG CANCER, INCLUDING NSCLC, SCLC AND OTHER CANCERS
US - 16.02.2023

Clasificación Internacional [C07K 14/47](#) N° de solicitud 17877535 Solicitante Immatics Biotechnologies GmbH Inventor/a Colette SONG

The present invention relates to peptides, proteins, nucleic acids and cells for use in immunotherapeutic methods. In particular, the present invention relates to the immunotherapy of cancer. The present invention furthermore relates to tumor-associated T-cell peptide epitopes, alone or in combination with other tumor-associated peptides that can for example serve as active pharmaceutical ingredients of vaccine compositions that stimulate anti-tumor immune responses, or to stimulate T cells ex vivo and transfer into patients. Peptides bound to molecules of the major histocompatibility complex (MHC), or peptides as such, can also be targets of antibodies, soluble T-cell receptors, and other binding molecules.

70. [WO/2023/020298](#) POLYPEPTIDE FOR RESISTING NOVEL CORONAVIRUS AND APPLICATION THEREOF
WO - 23.02.2023

Clasificación Internacional [C07K 14/165](#) N° de solicitud PCT/CN2022/110464 Solicitante INSTITUTE OF MICROBIOLOGY, CHINESE ACADEMY OF SCIENCES Inventor/a GAO, Fu

The present application relates to a polypeptide for preventing or treating a novel coronavirus and an application thereof. The polypeptide is P3 polypeptide and at least one of P3-1 polypeptide, P3-2 polypeptide, P3-3 polypeptide, P3-4 polypeptide, and P3-5 polypeptide derived from the P3 polypeptide. The amino acid sequences of the P3 polypeptide, the P3-1 polypeptide, the P3-2 polypeptide, the P3-3 polypeptide, the P3-4 polypeptide, and the P3-5 polypeptide are respectively as shown in SEQ ID NOs: 1-6. The polypeptide of the present application has a strong inhibitory effect on original strains and a plurality of variant strains of the novel coronavirus, and can be used for preparing a drug or a vaccine for preventing and/or treating diseases caused by the novel coronavirus. The polypeptide is expected to also have the potential of preventing and/or treating new variant strains appearing in the future and sarbecovirus.

71. [20230053634](#) Therapeutic Vaccine for Hepatitis B Virus (HBV) using the HBV PreS1 and/or PreS2, and/or S-HBsAg regions of the HBV envelope protein
US - 23.02.2023

Clasificación Internacional [A61K 39/29](#) N° de solicitud 17810480 Solicitante University of Washington Inventor/a Edward A. CLARK

Compositions including a CD180 binding ligand and a linked Hepatitis B antigen and their use are disclosed. The Hepatitis B antigen includes Hepatitis B virus pre-S1 and/or pre-S2 region of the HBV envelope protein (HBVpre S1/S2Ag), L-HBsAg, MHBsAg, S-HBsAg, or antigenic fragments or mutants thereof.

72. [20230051035](#) NOVEL PEPTIDES AND COMBINATION OF PEPTIDES FOR USE IN IMMUNOTHERAPY AGAINST PANCREATIC CANCER AND OTHER CANCERS
US - 16.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 17937268 Solicitante IMMATICS BIOTECHNOLOGIES GMBH Inventor/a Toni WEINSCHENK

The present invention relates to peptides, proteins, nucleic acids and cells for use in immunotherapeutic methods. In particular, the present invention relates to the immunotherapy of cancer. The present invention furthermore relates to tumor-associated T-cell peptide epitopes, alone or in combination with other tumor-associated peptides that can for example serve as active pharmaceutical ingredients of vaccine compositions that stimulate anti-tumor immune responses, or to stimulate T cells ex vivo and transfer into patients. Peptides bound to molecules of the major histocompatibility complex (MHC), or peptides as such, can also be targets of antibodies, soluble T-cell receptors, and other binding molecules.

73. [4137578](#) MODIFIZIERTE VACCINIA-VEKTOREN
EP - 22.02.2023

Clasificación Internacional [C12N 15/863](#) N° de solicitud 22175898 Solicitante OTTAWA HOSPITAL RES INST Inventor/a BELL JOHN

The disclosure relates to modified vaccinia virus vectors derived from the Copenhagen strain of vaccinia virus, as well as methods of using the same for the treatment of various cancers. The disclosure provides modified Copenhagen-derived vaccinia virus vectors that exhibit various beneficial therapeutic activities, including enhanced oncolytic activity, spread of infection, immune evasion, tumor persistence, capacity for incorporation of exogenous DNA sequences, amenability for large scale manufacturing, and safety.

74. [2610070](#) Coronavirus vaccine formulations
GB - 22.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud 202212336 Solicitante NOVAVAX INC Inventor/a GALE SMITH

Disclosed herein are coronavirus Spike (S) proteins and nanoparticles comprising the same, which are suitable for use in vaccines. The nanoparticles present antigens from pathogens surrounded to and associated with a detergent core resulting in enhanced stability and good immunogenicity. Dosages, formulations, and methods for preparing the vaccines and nanoparticles are also disclosed.

75. [20230045939](#) STABLE VACCINE AGAINST CLOSTRIDIUM DIFFICILE

US - 16.02.2023

Clasificación Internacional [C07H 17/04](#) N° de solicitud 17296194 Solicitante IDORSIA

PHARMACEUTICALS LTD Inventor/a Madhu EMMADI

The present invention relates to a synthetic saccharide of general formula (I) that is related to *Clostridium difficile* PS-II cell-surface polysaccharide and conjugate thereof. Said synthetic saccharide, said conjugate and pharmaceutical composition containing said synthetic saccharide or said conjugate are useful for prevention and/or treatment of diseases associated with *Clostridium difficile*. Furthermore, the synthetic saccharide of general formula (I) is useful as marker in immunological assays for detection of antibodies against *Clostridium difficile* bacteria.

76. [20230046501](#) POLYPEPTIDES COMPRISING MUTATED FORMS OF HUMAN VEGF-A WITH REARRANGEMENTS OF DISULFIDE BONDS AND COMPOSITIONS CONTAINING SAME

US - 16.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 17788833 Solicitante Centro de Ingeniería

Genética y Biotecnología Inventor/a Monica BEQUET ROMERO

Polypeptides comprising functional mutants of an isoform of the human vascular endothelial growth factor A (VEGF-A) folded in a non-natural re-arrangement, where the second and fourth cysteine of the mutant's polypeptide chain is only forming intramolecular bridges, while the seventh and eighth are only part of intermolecular bonds. The invention further comprises antigenic preparations containing at least one of these polypeptides, and the pharmaceutical compositions comprising such antigenic preparations and vaccine adjuvants. The antigenic preparations according to the invention are used in the manufacturing of a drug, for the treatment of diseases related to the increment of angiogenesis, inflammation, and immunosuppression, as well as for the restoration of the immune system.

77. [4132575](#) VERWENDUNG VON VIRALEN VEKTOREN ZUR HERSTELLUNG VON CORONAVIRUS-IMPfstoffen

EP - 15.02.2023

Clasificación Internacional [A61K 39/12](#) N° de solicitud 21720662 Solicitante 4MVAC LLC Inventor/a

BRIDGES CHARLES R

Provided herein are compositions that includes AAVs and AAV vectors that include a sequence encoding a SARS-CoV-2 polypeptide or a fragment thereof. Also provided herein are methods and materials for making and using AAVs and AAV vectors to generate immunity to a coronavirus in a subject.

78. [4136261](#) PROGNOSTISCHE WEGE FÜR VIRUSINFEKTIONEN

EP - 22.02.2023

Clasificación Internacional [C12Q 1/6883](#) N° de solicitud 21717480 Solicitante INNOSIGN B V Inventor/a

VAN DE STOLPE ANJA

The invention relates to a method for determining whether a subject with an infection has a viral infection. The invention further relates to method for determining the cellular immune response to a viral infection or a vaccine. The methods may be performed on a blood sample obtained from a subject, and is based on the finding that specific cellular signaling pathways are active. The invention further relates to components for performing the methods and use of those components in a method of diagnosis.

79. [4135757](#) PSMA- UND STEAP1-IMPfstoffe und ihre Verwendungen

EP - 22.02.2023

Clasificación Internacional [A61K 39/00](#) N° de solicitud 21719734 Solicitante JANSSEN BIOTECH INC
Inventor/a GOTTARDIS MARCO

Disclosed herein are PSMA and/or STEAP1 polynucleotides, polypeptides, vectors, viruses, vaccines, and vaccine combinations, and their uses.

80. [WO/2023/020737](#) FMDV VIRUS-LIKE PARTICLE WITH STABILIZING MUTATION
WO - 23.02.2023

Clasificación Internacional [A61K 39/135](#) N° de solicitud PCT/EP2022/067888 Solicitante INTERVET INTERNATIONAL B.V. Inventor/a VAN DEN BORN, Erwin

The present invention provides a recombinant foot and mouth disease virus (FMDV) capsid precursor protein comprising a modified VP1 protein and optionally further comprising a modified VP4 protein. The invention further relates to an isolated nucleic acid molecule and an expression vector comprising the nucleic acid molecule for recombinant expression of the modified capsid precursor protein. In further aspects, the invention relates to a virus-like particle (VLP) obtained from the modified capsid precursor protein and a vaccine for use in the protection of a subject against an infection with FMDV produced from the VLP.

NOTA ACLARATORIA: Las noticias y otras informaciones que aparecen en este boletín provienen de sitios públicos, debidamente referenciados mediante vínculos a Internet que permiten a los lectores acceder a las versiones electrónicas de sus fuentes originales. Hacemos el mayor esfuerzo por verificar de buena fe la objetividad, precisión y certeza de las opiniones, apreciaciones, proyecciones y comentarios que aparecen en sus contenidos, pero este boletín no puede garantizarlos de forma absoluta, ni se hace responsable de los errores u omisiones que pudieran contener. En este sentido, sugerimos a los lectores cautela y los alertamos de que asumen la total responsabilidad en el manejo de dichas informaciones; así como de cualquier daño o perjuicio en que incurran como resultado del uso de estas, tales como la toma de decisiones científicas, comerciales, financieras o de otro tipo.

Edición: Annia Ramos Rodríguez aramos@finlay.edu.cu

Ma. Victoria Guzmán Sánchez mguzman@finlay.edu.cu

Randelys Molina Castro rmolina@finlay.edu.cu

Irina Crespo Molina icrespo@finlay.edu.cu

Yamira Puig Fernández yamipuig@finlay.edu.cu

Rolando Ochoa Azze ochoa@finlay.edu.cu



FINLAY EDICIONES