MICHIGAN MEDICINE
UNIVERSITY OF MICHIGAN

您需要了解哪些有关辉瑞和莫德纳 COVID-19 疫苗的知识

What You Need to Know about the Pfizer and Moderna COVID-19 Vaccines (Chinese)

疫苗如何发挥作用？ How do the vaccines work?

所有的 COVID-19 疫苗都会使免疫系统对引起 COVID-19 的病毒产生对应抵抗。现阶段使用的辉瑞和莫德纳生产的两种疫苗均为信使核糖核酸（mRNA）疫苗。

All COVID-19 vaccines cause the immune system to respond against the virus that causes COVID-19. The two available vaccines made by Pfizer and Moderna are both mRNA vaccines.

1. mRNA 疫苗可以为我们的细胞提供指令来制造一种无害的“棘突蛋白”。 这种棘突蛋白会出现在导致 COVID-19 的病毒表面。

   mRNA vaccines give instructions to our cells to make a harmless piece of “spike protein.” The spike protein is found on the surface of the virus that causes COVID-19.

2. 棘突蛋白制成之后，细胞会将指令（信使核糖核酸 mRNA）分解并清除。

   After the spike protein is made, the cell breaks down the instructions (mRNA) and gets rid of them.

3. 我们的身体现在意识到棘突蛋白不应该存在。它会制造免疫细胞（称为抗体），在未来如有导致 COVID-19 的病毒感染情况下，这些免疫细胞会记得如何去抵抗。

   The body now recognizes that the spike protein should not be there. It builds immune cells (called antibodies) that will remember how to fight the virus that causes COVID-19 if we are infected in the future.

重要说明：mRNA 疫苗不含活病毒，也不会对接种者引起疾病。mRNA 疫苗不会改变接种者的脱氧核醣核酸(DNA)。

Important Note: mRNA vaccines do not contain a live virus and do not cause disease in the vaccinated person. The mRNA vaccines do not change the recipient's DNA.

美国食品药品监督管理局（FDA）批准了另外一种针对 COVID-19 的疫苗。杨森（Janssen）疫苗是病毒载体疫苗。这三种疫苗均能有效预防 COVID-19 引起的严重疾病和死亡，其潜在的副作用也类似。欲了解详情，请访问：

https://www.fda.gov/emergency-preparedness-and-response/coronavirus-disease-2019-covid-19/covid-19-vaccines

The FDA approved another vaccine against COVID-19. The Janssen vaccine is a viral vector vaccine. All 3 vaccines effectively prevent serious illness and death from COVID-19 and have similar potential side effects. To learn more visit: https://www.fda.gov/emergency-preparedness-and-response/coronavirus-disease-2019-covid-19/covid-19-vaccines

我需要注射几次? How many shots am I going to need?

辉瑞疫苗需要注射 2 剂，相隔 21 天。莫德纳疫苗需要注射 2 剂，相隔 28 天。接种疫苗后，您的身体需要时间来建立保护机制。完成第二次注射接种的 1-2 周后，两种 COVID-19 疫苗才开始有保护作用。

The Pfizer vaccine requires 2 doses, 21 days apart. The Moderna vaccine requires 2 doses, 28 days apart. It takes time for your body to build protection after any vaccination. The two COVID-19 vaccines may not protect you until 1-2 weeks after your second shot.

谁应接种疫苗? Who should get vaccinated?

辉瑞疫苗建议用于 16 岁及以上人群。 莫德纳疫苗建议用于 18 岁及以上人群。

The Pfizer vaccine is recommended for people aged 16 years and older. The Moderna vaccine is recommended for people aged 18 years and older.

谁不应接种疫苗？ Who should not get vaccinated?

如果您对辉瑞或莫德纳 COVID-19 疫苗中的任何成分（例如聚乙烯二醇）有严重或即时过敏反应，则不应接种。

If you have had a severe or an immediate allergic reaction to a previous dose or any ingredient in the Pfizer or Moderna COVID-19 vaccines (such as PEG), you should not get it.

- 出现严重过敏反应（严重危及生命的系统性超敏性反应）者需要用肾上腺素或 EpiPen©自动注射肾上腺素笔治疗，或者必须去医院治疗。

  A severe allergic reaction (anaphylaxis) is when a person needs to be treated with epinephrine or EpiPen© or if they must go to the hospital.

- 即时过敏反应是指暴露后 4 小时内发生的反应，包括荨麻疹、肿胀或喘息（呼吸窘迫）等症状。

  An immediate allergic reaction means a reaction within 4 hours of exposure, including symptoms such as hives, swelling, or wheezing (respiratory distress).

查看 COVID-19 疫苗的成分清单，请访问： https://www.cdc.gov/vaccines/covid-19/info-by-product/clinical-considerations.html#Appendix-C

To see a list of ingredients of COVID-19 vaccines visit: https://www.cdc.gov/vaccines/covid-19/info-by-product/clinical-considerations.html#Appendix-C

疫苗有效率如何？ How effective is the vaccine?

在临床试验中，显示辉瑞和莫德纳疫苗在预防冠状病毒引起的疾病方面有效率大约为 95%。

In clinical trials, the Pfizer and Moderna vaccines were shown to be about 95% effective at preventing illness caused by the coronavirus.

我们如何知道 COVID-19 疫苗是否安全?

How do we know if COVID-19 vaccines are safe?

COVID-19 疫苗已经在成千上万的人群中进行了大型临床试验测试。这样做是为了确保它们符合安全性标准，并了解疫苗如何为不同年龄、种族和族裔以及有不同疾病的人们提供保护。临床试验中未发现明显的安全隐患。试验中至少收集了 8 周的安全性数据。疫苗接种后出现副作用的时间超过 8 周并不常见。

COVID-19 vaccines were tested in large clinical trials that included tens of thousands of people. This is done to make sure they meet safety standards and see how the vaccines offer protection to people of different ages, races, and ethnicities, as well as those with different medical conditions. No significant safety concerns were identified in the clinical trials. At least 8 weeks of safety data were gathered in the trials. It is unusual for side effects to appear more than 8 weeks after vaccination.

重要提示：在保持所有安全性标准的同时，对这些疫苗的研发进行了加速。这并非将传统疫苗研发时间表中的步骤进行省略，而是几个步骤同时进行，例如，在收集安全性和有效性数据的同时扩大生产规模。

Important note: The development of these vaccines has been accelerated while maintaining all safety standards. Rather than eliminating steps from traditional vaccine development timelines, steps were happening at the same time, such as scaling up manufacturing while safety and efficacy data are collected.

疫苗有哪些副作用? What are the side effects of the vaccine?

在疫苗的临床试验中，大多数人接种疫苗后并未出现严重问题。症状通常会在一周内自行消失。有些人报告说接种疫苗时会头疼或发烧。这些副作用表明您的免疫系统正在发挥其应有的作用。它正在努力建立对您的保护，以抵抗疾病。

更多的人不是在接种第一剂，而是在第二剂后出现这些副作用。如果您没有出现任何副作用，请放心，该疫苗有同等效用。

In the vaccine clinical trials, most people did not have serious problems after being vaccinated. The symptoms usually went away on their own within a week. Some people reported getting a headache or fever when getting a vaccine. These side effects are a sign that your immune system is doing exactly what it is supposed to do. It is working to build up protection against disease.
More people experienced these side effects after getting the second dose than the first one. If you do not experience any side effects, be assured that the vaccine is just as effective.

对于孕妇以及因患病或服用药物而免疫系统低下的人，此疫苗是否安全?

Is the vaccine safe for pregnant women and people with conditions or medications that can weaken the immune system?

早期疫苗临床试验并未在这类人群中进行测试，但根据当前数据，在该人群中接种 COVID-19 疫苗的获益大于罹患 COVID-19 的风险。**与您的医疗保健提供者谈谈基于您的特定情况接种疫苗的潜在风险和获益。**

The early clinical trials did not test the vaccines in these populations but based on the current data, the benefit of receiving the COVID-19 vaccine is greater than the risks of getting COVID-19 in this population. **Talk to your health care provider about the potential risks and benefits of the vaccine in your specific situation.**

我曾患有 COVID-19 并已康复。我还需要接种疫苗吗?

是，无论您是否已经感染过 COVID-19，都应接种疫苗。那是因为专家们还不知道从 COVID-19 康复后受到保护避免再次生病的时效有多长。如果您治疗 COVID-19 时使用了单克隆抗体或恢复期血浆，则应等待 90 天后方可接种 COVID-19 疫苗。如果您不确定所接受的治疗方法，或者对接种 COVID-19 疫苗有更多疑问，请与您的医疗保健提供者联系。

I already had COVID-19 and recovered. Do I still need to get vaccinated?

Yes, you should be vaccinated regardless of whether you already had COVID-19. That's because experts do not yet know how long you are protected from getting sick again after recovering from COVID-19. If you were treated for COVID-19 with monoclonal antibodies or convalescent plasma, you should wait 90 days before getting a COVID-19 vaccine. Talk to your health care provider if you are unsure what treatments you received or if you have more questions about getting a COVID-19 vaccine.

如果我已接种 2 剂疫苗，是否还需要戴口罩并避免与他人密切接触?

在全剂量共需两剂的疫苗（如辉瑞和莫德纳疫苗）的第二剂注射完两周后，或全剂量仅需单剂的疫苗（如杨森）注射完 2 周后，您将被视为完成了全剂量的疫苗接种。

完成了全剂量疫苗接种的人可以开始做因疫情大流行而停止做的事情。在专家们更多地了解 COVID-19 疫苗在现实情况中所提供保护作用的同时，美国疾控中心（CDC）将会经常更新指南。

查看有关完成全剂量疫苗接种的人可以做的事情的最新指南，请访问：

https://www.cdc.gov/coronavirus/2019-ncov/vaccines/fully-vaccinated.html

Do I need to wear a mask and avoid close contact with others if I have received 2 doses of the vaccine?

You are considered fully vaccinated 2 weeks after the second dose in a 2-dose series like the Pfizer or Moderna vaccine or 2 weeks after the single-dose vaccine like the Janssen vaccine.

People who have been fully vaccinated can start to do some things that they had stopped doing because of the pandemic. While experts learn more about the protection that COVID-19 vaccines provide under real-life conditions, the CDC will update its guidelines frequently.

Please visit: https://www.cdc.gov/coronavirus/2019-ncov/vaccines/fully-vaccinated.html to see the most current guidelines about what fully-vaccinated people can do.

何处可了解更多有关 COVID-19 疫苗的信息?

Where can I learn more about the COVID-19 Vaccines?

有关当前 COVID-19 疫苗的准确信息，请访问：

- 密西根医学部：COVID-19 疫苗信息及更新：
  https://www.uofmhealth.org/coronavirus/vaccine-info-update
- 美国疾控中心（CDC）：COVID-19 疫苗：
  https://www.cdc.gov/coronavirus/2019-ncov/vaccines 中文版
  https://chinese.cdc.gov/coronavirus/2019-ncov/vaccines/index.html
- 美国食品药品监督管理局（FDA）辉瑞-生物科技 COVID-19 疫苗常见问题
  https://tinyurl.com/yaqwyjam
- 美国食品药品监督管理局（FDA）莫德纳 COVID-19 疫苗常见问题
  https://tinyurl.com/7w3t7pp8

For current and accurate information about the COVID-19 vaccines visit:

- Michigan Medicine: COVID-19 Vaccine Information and Update:
  https://www.uofmhealth.org/coronavirus/vaccine-info-update
- CDC: COVID-19 Vaccines: https://www.cdc.gov/coronavirus/2019-ncov/vaccines
- FDA Pfizer-BioNTech COVID-19 vaccine Frequently-Asked-Questions
  https://tinyurl.com/yaqwyjam
- FDA Moderna COVID-19 vaccine Frequently-Asked-Questions
  https://tinyurl.com/7w3t7pp8

免责声明：本文件所包含的信息和/或教学材料是由密西根医学部为与您病情类似的典型患者所撰写的。文中的链接可能连接到并非由密西根医学部所创建的网络内容，密西根医学部对此内容不承担责任。本文件不可取代您的医疗保健提供者的医疗咨询，因为您的情况可能和典型患者有所不同。如果您对此文件、您的病情或治疗方案有任何疑问，请与您的医疗保健提供者商谈。

Disclaimer: This document contains information and/or instructional materials developed by Michigan Medicine for the typical patient with your condition. It may include links to online content that was not created by Michigan Medicine and for which Michigan Medicine does not assume responsibility. It does not replace medical advice from your health care provider because your experience may differ from that of the typical patient. Talk to your health care provider if you have any questions about this document, your condition or your treatment plan.

改编自：

美国疾控中心（CDC）：COVID-19 疫苗。摘自：https://www.cdc.gov/coronavirus/2019-ncov/vaccines

核准：COVID19 疫苗患者教育/交流工作组

Adapted from: CDC: COVID-19 Vaccines. Access at: https://www.cdc.gov/coronavirus/2019-ncov/vaccines

Approved by: COVID19 Vaccine Patient Education/Communication Workgroup

翻译：密西根医学部翻译服务　Translation: Michigan Medicine Interpreter Services

密西根医学部 病患教育是由 Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International Public License. 授权许可。最后修订日期 3/11/2021

Patient Education by Michigan Medicine is licensed under a Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International Public License. Last Revised 3/11/2021