

#### COVID-19 Vaccine Fact vs. Fiction

This information sheet was co-created by the Wellness Hub team with Dr Anju Anand (M.D., Respirology & Sleep Medicine) and Dr Samir Gupta (M.D., Respirology) to address 8 myths & misinformation about the COVID-19 vaccines. The content of this resource is based on the Wellness Hub May 2022 Vaccine Town Hall session. To watch the full session recording, please click here.

Please note: the content of this presentation is based on data from up to and including 09 May 2022. For the most up-to-date evidence on COVID-19, please consult our website (<a href="www.wellness-hub.ca">www.wellness-hub.ca</a>) or the Government of Canada's COVID-19 webpage (<a href="www.canada.ca/en.html">www.canada.ca/en.html</a>).

## 1. The vaccines don't work against the Omicron variant



- The available **COVID-19 vaccines** do an **excellent job at protecting against severe disease outcomes** (such as hospitalization & death) from COVID-19 infection, with efficacy of **95-99%** based on clinical trial data done at the time of the original strain of the virus<sup>1, 2-6</sup>. This protection is slightly lower for the Omicron variant and newer sub variants, but is still enough to provide effective protection in the range of 80%<sup>1</sup>.
- Vaccine effectiveness against symptomatic infection has decreased further since the
  arrival of the Omicron variant (and decreases as time passes since the last vaccine dose),
  but it is improved or restored with a booster dose<sup>1</sup>. This is why It is recommended to
  get a booster shot to protect yourself against COVID-19 / Omicron<sup>1</sup>



### 2. The Omicron variant is mild.



- As of May 2, 2022, there were an **estimated 2,472 new cases of COVID-19 per day**, 100% of which were **attributed to the Omicron variant**<sup>7</sup>
- Though **the Omicron variant** is less likely to cause severe illness compared to Delta, it is not mild and it is thought to be **3-4X more transmissible** than the Delta variant<sup>8</sup>
- With approximately **6 times as many people** being **infected by Omicron by May 2022**, and numbers increasing since then<sup>9</sup>, the number of severe cases and deaths are still high at a population level making the impact to our community and healthcare system severe<sup>1</sup>
- The challenge with the magnitude of people who are exposed and infected with the highly-contagious
   Omicron variant, is that many healthcare workers are becoming exposed or infected, which negatively
   impacts the ability of the healthcare system to provide care to COVID-19 and non- COVID-19
   patients<sup>1,10</sup>
- Additionally, the risk of long-term adverse or negative health outcomes, such as Long COVID-19, are still present if one is infected with Omicron<sup>1</sup>
- To watch a video explanation From Dr. Gupta, please <u>click here</u>

3. The COVID-19 vaccines are Halal/ Kosher and do not contain any meat products.



- The COVID-19 vaccines that are available in Canada are all Halal, Kosher, and do not contain any meat products<sup>1</sup>
- For a full list of ingredients found in each of the approved vaccines, please visit the <u>Health Canada</u> website
  - 4. If I got my first 2 doses, I don't need to get a 3<sup>rd</sup> dose.



• In order to maintain the best protection against COVID-19 and the Omicron variant especially, it is crucial that you stay up-to-date with your vaccines by getting a 3<sup>rd</sup> dose or even a 4<sup>th</sup> dose if you are eligible<sup>1</sup>

#### Why?

- As discussed above, over time the level of protection against COVID-19 from vaccines decreases 1
- The SARS-CoV-2 virus has mutated (or undergone changes) to become the **Omicron** variant, which is more contagious than the original strain of the virus. The Omicron variant requires a higher level of antibodies to neutralize it or fight it off<sup>1</sup>
- Though the vaccines were not originally formulated to fight Omicron, they are still able to provide sufficient protection against it as long as a booster dose (third or fourth dose) is given to increase the amount of antibodies in the body <sup>1</sup>
- A UK study evaluating vaccine effectiveness against the Omicron variant compared to the Delta variant showed that:
  - Protection against Omicron infection dropped to 40% or lower after 2-3 months\* had passed since the vaccine second dose <sup>11.</sup> With a booster dose, that protection increased back up to 75%<sup>11</sup>.
  - Protection against severe disease from Omicron was found to be approximately 60% six months after second dose, and increased back up to 90% with a 3<sup>rd</sup> dose,<sup>11</sup>
  - \*Note that this evidence is based on data from up to January 2022.
- The most important reason to get your third dose is to protect yourself against severe disease from COVID-19 and the Omicron variant<sup>1</sup>
- To watch a video explanation of this from Dr Gupta, please click here.

5. Even though I was infected with COVID-19, I still need to get 3 doses to protect myself against future infection.



- While you do get some immunity or protection from getting COVID-19 (i.e. natural immunity), it is not known how robust or lasting that natural immunity is, and it varies from person to person<sup>1</sup>
- A **stronger early level of protection** or immunity comes **from vaccines** compared to natural immunity, particularly in some groups.<sup>12</sup>
- For those aged 18+, it is recommended that you get your next dose 6 months after your last dose or 3
  months after infection with COVID-19 (from date of symptom onset or date of first positive test result)
- To watch a video explanation on this with Dr. Anand, please <u>click here</u>.
- 6. If I am thinking of getting pregnant or if I am pregnant, I should not get vaccinated.



#### For those who are pregnant:

- There is ample evidence on the safety of COVID-19 vaccines for those who are/ are trying to get pregnant, and organizations such as the Society of Obstetricians and Gynecologists of Canada (SOGC), National Advisory Committee on Immunization (NACI), the Canadian Fertility and Andrology Society and the Centre for Disease Control (CDC) all advise that this group should get vaccinated <sup>14-21</sup>
  - For example, in a study that researched 40,000 pregnant women, there were no negative effects to the pregnant person or developing fetus that could be attributed to the COVID-19 vaccines <sup>19</sup>
- Pregnant individuals who get infected with COVID-19 are at an increased risk of developing severe
  outcomes, making vaccination all the more important in this group <sup>14</sup>
  - For example, risk of premature birth is around 4X higher in pregnant people who have COVID-19<sup>18</sup>
- If a pregnant person gets vaccinated against COVID-19, some protection or immunity is passed on to the fetus. This protection was found to last up to 6 months after birth in those cases<sup>21</sup>
- For additional information regarding pregnancy and the COVID-19 vaccine, please seethe <u>BORN Ontario</u> webpage "COVID-19 and Pregnancy: Information at your fingertips"

#### For those who are concerned about fertility:

- In a study that followed 2,000 couples and compared those who were vaccinated (one or both partners) versus those who were not, the chances of conceiving were the same or unaffected by vaccines<sup>22</sup>
- A study following people undergoing IVF (in-vitro fertilization) treatments, vaccinated and unvaccinated participants had the same level of ovarian function, indicating that no negative effects from vaccines were observed<sup>23</sup>

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- In fact, COVID-19 virus and disease is associated with increased risk of erectile dysfunction, which negatively impacts male fertility<sup>14</sup>
- Therefore, the best way to protect pregnant individuals or those who are trying to get pregnant or protect their fertility, is to get vaccinated against the COVID-19 virus and prevent infection<sup>1</sup>
  - Following vaccination, menstrual periods may be noted to be heavier, lighter, or longer for a period of 1-2 months but not impact fertility for those who menstruate<sup>14</sup>
- To watch The Feed With Dr G Does the COVID-19 Vaccine Affect Fertility? click here
- To watch a video explanation of this myth from Dr Gupta, please click here.



7. Since I have bad allergies or asthma, I should NOT get the COVID-19 vaccine.



- Having asthma or allergies (food, environmental, medication, etc.) does not mean you should not get the COVID-19 vaccine<sup>1</sup>
- If you are allergic to one of the vaccine components, like polyethylene glycol (PEG) or polysorbate, it is recommended that you consult an allergist regarding getting vaccinated against COVID-19<sup>1</sup>
  - They may be able to arrange for you to get what is called a graded vaccine administration, where the vaccine is given in smaller doses spread out over time<sup>1</sup>
- To watch a video explanation of this from Dr. Anand, please <u>click here</u>.
  - 8. It is recommended that I get my COVID-19 vaccines as well as my flu shot



- Yes. It is recommended that you get vaccinated against COVID-19 as well as the flu<sup>24-27</sup>
- SARS-CoV-2 (aka COVID-19) and influenza (aka the flu) are two different viruses that require different vaccines to adequately protect you against them<sup>1</sup>

Can I get my flu shot at the same time as my COVID-19 shot?

- For children aged 12 and under, NACI recommends separating the COVID-19 and flu vaccines by 2 weeks <sup>24-27</sup>
- For those aged 12+, you are able to get both vaccines at the same time without concerns 24-27
- For more information on the flu shot, please see the <u>Wellness Hub 1-pager on</u> the Flu Shot
- To watch a video explanation of this from Dr. Gupta, please <u>click here</u>.



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