

Nutrition and Natural Strategies Offer Hope Against COVID-19

Analysis by [Dr. Joseph Mercola](#)

✓ Fact Checked

November 29, 2022

STORY AT-A-GLANCE

- › The only real defense against COVID-19 is your own immune system, which works best when fed right. While changing your diet is a commonsense solution for the long term, a rapid-response strategy would be to use vitamin C
- › Vitamin C strengthens your immune system and kills pathogens, including viruses, when taken in high doses
- › Other important immune boosting nutrients are vitamin D, magnesium and zinc
- › A Korean doctor who's giving patients and hospital staff 100,000 IUs of vitamin D and 20 to 24 grams of vitamin C by IV reports virus-infected patients are getting well in a matter of days
- › If you own a sauna, now's the time to put it to regular use. By increasing your core body temperature, which is what happens when you have a fever, your body becomes more efficient at killing pathogens

In this interview, repeat guest Dr. Andrew Saul, editor-in-chief of the Orthomolecular Medicine News Service, reviews what we currently know about vitamin C (ascorbic acid) for the prevention and treatment of novel coronavirus COVID-19.

As noted by Saul, much of the information about vitamin C for the coronavirus is currently coming out of China. Meanwhile, in the U.S., a lot of nutritional advice is being censored and tagged as "fake news."

Mortality Rate Is Likely Vastly Overestimated

At the time of this interview, March 17, 2020, COVID-19 has triggered mass hysteria – in the United States at least. Countries around the world, including the U.S., are also quarantining, closing down borders, implementing curfews and generally recommending or enforcing isolation of the populace.

But this is all for the most part a preventive strategy. Are people infected? Yes. Are people dying? Yes. But we're talking about deaths in the thousands, not hundreds of thousands or millions, as in pandemics of the past (think the 1918 flu pandemic, for example, which killed tens of millions around the world).

I've spent hours each day for the past few weeks reading articles and listening to podcasts about the pandemic, and what hardly is ever mentioned – other than a tiny blurb – is that a massive part of the equation is the need for testing. Testing is the central core of a strategy aimed at flattening the curve, i.e., preventing or slowing the spread of the virus.

Why? Because testing would give you a more accurate account of how many are actually infected. At present, mortality rates simply aren't accurate, and may appear far more severe than they are. We're being told what the mortality rate is based only on confirmed or suspected cases.

When I interviewed Francis Boyle – whose background includes an undergraduate degree from the University of Chicago, a juris doctor (lawyer) degree from Harvard and a Ph.D. in political science – he said the mortality rate could be as high as 17%, whereas conventional estimates now say it's between 2% and 3%.

I believe all of these are wrong, and probably wrong by two or three orders of magnitude. The reason I say this is because there are a limited number of tests and very few people have been tested.

Hundreds of millions of tests are needed to get a real idea of how many people are infected, which would then give us a better understanding of the mortality rate, meaning

how many of those who get infected actually die. At present, they're only testing those who present symptoms, which automatically skews the mortality statistics, giving us a falsely elevated mortality rate.

As noted by Saul, "We may have a very large number of people ... that are carrying the COVID-19 virus and having no symptoms whatsoever. And I would argue that if they eat right and take their vitamins, that's going to stop it from spreading."

There is not even a micro doubt in my mind that, by the time everything is said and done, more people will have died from car accidents than will die from COVID-19 in the U.S. this year.

Natural Immunity Is Lifelong; Artificial Immunity Is Not

In my view, the media have presented a shockingly distorted view of this pandemic, creating unnecessary fear. The entire world is now rapidly heading toward economic collapse, and the question is why, seeing how the death toll doesn't seem to warrant it.

More than likely, we'll end up with a COVID-19 vaccine that will be added to the list of mandated annual inoculations. The problem with that is that even if the vaccine works well, it will only confer limited immunity to a virus that's going to mutate anyway.

Developing natural immunity is far more ideal. As noted by Saul:

"When you have natural exposure, whether you get sick or you don't, you have not only immunity to that [viral strain], but you have an applicable broad immunity to more viruses in general. There's nothing like being sick to keep you from getting sick, which sounds a little bit weird but that's the way the human body works.

When we were children we got measles, mumps, chicken pox – you name it, we got it. We were home for two weeks, we watched daytime TV, we went back to school and we have lifetime immunity ...

The fact of the matter is that natural immunity really does protect you very well, and your own immune system is the only way you fight any virus. And, the way to make your immune system strong is not, unfortunately, by vaccinating or taking a drug."

The reason why recovering from infection confers lifelong immunity while vaccination does not has to do with the fact that your immune system has two branches – the cellular (T-cells) and the humoral (B-cells) – and both need to be activated for long-term immunity to be secured.

When you get a vaccine, you only stimulate your humoral immunity, the B-cells. The T-cells are not stimulated. So, scary as it may sound, the best thing is to have a strong immune system to defend against this virus so you have minimal symptoms or possibly be asymptomatic.

Even Dr. Fauci admitted this virus **will not be eradicated** and would require herd immunity to be controlled. Optimizing your metabolism and immune system is good general practice, and absolutely essential for the coronavirus as it is inevitable that we will all be exposed at some point. And, as we already learned, there were no guarantees the fast-tracked vaccine would be safe or successful.

Coronavirus vaccines have been attempted previously but never proven successful. While COVID-19 is a very nasty virus that can do a lot of damage, most people, probably more than 98% of infected people, will not die or suffer long-term damage from it.

"I agree with that," Saul says, "because we're automatically going to be exposed to it and a lot of people aren't going to show symptoms. Some people will have a light case; in fact quite a few people who get it will have a very light case ... The danger is the escalation to SARS and pneumonia, and this is the biggest threat for immune-compromised people and the elderly. This is where we have the fatalities; this is the biggest concern."

A Simple Technique to Quell Fear

With everything that's currently happening, and media increasing readership and profits by blowing things out of proportion, it's very easy, even rational, to be afraid and anxious, which will dysregulate your autonomic nervous system.

A simple technique that can help activate your parasympathetic nervous system, thus calming you down, is the Neuro-Emotional Technique's First Aid Stress Tool, or NET FAST, demonstrated in the video above. Firstaidstresstool.com also provides an excellent printable summary with visuals of the technique,¹ which even a young child can do. Here is a summary of the FAST procedure:

1. While thinking about an issue that is bothering you, place your right wrist, palm up, into your left hand. Place three fingers of your left hand onto the area of your right wrist where you can feel your pulse.
2. Place your open right hand on your forehead. Gently breathe in and out several times while concentrating on feeling the issue that bothers you.
3. Switch hands and repeat Steps 1 and 2.

Saul offers another free and simple stress-reducing technique he learned from a Native American. Simply go out, sit on the ground and lean against a pine tree.

Vitamin C Boosts Immunity and Reverses Viral Pneumonia

For now, the only real defense against COVID-19 is your own immune system. There's no vaccine, and even if one is fast-tracked, there would be cause for caution, as we'd have no proof of effectiveness or safety.

"Your immune system is infinitely adaptable. This is how nature made us," Saul notes. "However, your immune system works better when it's fed right." While changing your diet is a more long-term solution, a rapid-response strategy would be to use vitamin C.

"Vitamin C is going to strengthen your immune system. This is in every nutrition textbook ever written, so we start with that," Saul says. "The RDA in the United States is about 90 milligrams; in Korea and China it's 100 mg; in the United

Kingdom it's a miserable 40 mg a day and we are sometimes not even getting that.

Studies have shown that even 200 mg of vitamin C a day will reduce the death rate in elderly people with severe pneumonia by 80%. Studies have shown babies with pneumonia, when they get 200 milligrams of vitamin C – the adult equivalent of about 2,000 to 3,000 mg – they have an improvement in their oxygen levels in less than a day. The mortality goes down and the duration and severity of the illness is less.

Now, it is not coronavirus per se that actually kills people, it is the pneumonia and the SARS, the severe acute respiratory syndrome, that can follow it. Most people that get coronavirus will have a mild case; some will have the virus and not have any symptoms at all. We don't even know how many those people are because they have no symptoms.

Those who get COVID-19 that actually are sick are going to have the flu and it's going to be a nasty flu – it's going to be miserable. People will be sick for a week or two. The people at risk of dying tend to be the elderly and those that are immune-compromised.

The media sort of skirts around this but this is where we have to start because the fear is based on dying. And when we have even a small amount of vitamin C, our risk of dying – even in the most severe cases – goes down.

It is pneumonia and SARS that kills people and vitamin C has been known to be effective against viral pneumonia since the 1940s when Dr. Frederick Robert Klenner published a series of papers and was able to reverse viral pneumonia in 72 hours. Now, Klenner was a board-certified chest physician. He was a specialist and he published over 20 papers on this. The media has been silent on this therapy."

On Vitamin C Dosing

More recently, Dr. Paul Marik has shown a protocol of intravenous (IV) vitamin C with hydrocortisone and thiamine (vitamin B1) dramatically improves survival rates in patients with sepsis. Since sepsis is one of the reasons people die from COVID-19 infection, Marik's vitamin C protocol may go a long way toward saving people's lives in this pandemic.

That protocol calls for 1,500 mg of ascorbic acid every six hours, and appears radically effective. However, I would recommend taking even higher doses using liposomal vitamin C if you're taking it orally. Liposomal vitamin C will allow you to take much higher dosages without getting loose stools.

You can take up to 100 grams of liposomal vitamin C without problems and get really high blood levels, equivalent to or higher than intravenous vitamin C. I view that as an acute treatment, however.

I discourage people from taking mega doses of vitamin C on a regular basis if they're not actually sick, because it is essentially a drug – or at least it works like one. Saul adds:

"What I suggest, and have for some 44 years of professional life, is to take enough vitamin C to be symptom free, and when you're well, that isn't very much. I knew one lady who would take 500 mg of vitamin C a day and she was just fine. [Another person] with multiple chemical sensitivity, she needed 35,000 mg a day. Any less and she wasn't fine ...

And, while we're [on this topic], a nice little charitable uplifting note is that Dutch State Mines or DSM of the Netherlands has donated 50 tons of vitamin C to [the city of] Wuhan [in China] – 106 million vitamin C tablets. And in China they are running three studies on using high-dose vitamin C as therapy, focusing primarily on people in intensive care.

I'm in contact with Dr. Richard Cheng. Cheng is a Chinese American physician ... He was in Shanghai for Chinese New Year visiting his family when all of this exploded.

So, Cheng has stayed in China and has been talking to hospitals and Chinese physicians who are showing tremendous interest in using vitamin C as prevention and cure. He's been so effective that the government of Shanghai has issued official recommendations that vitamin C should be used for treating COVID-19.

They are testing up to 24,000 mg a day by IV. Some of us think that's a little on the low side for people that are in the ICU. I would like to see 50,000 mg a day and there is a doctor ... who has used 50,000 mg [on] quite a few people and we're getting more reports as we go.

We can't get this into the mainstream media quite yet, but it's probably going to break and possibly by the time this report airs, it'll be all over the U.S media. Editor's note: The New York Post, the fourth-largest newspaper² in the U.S., broke this news March 24, 2020.³

I would like to see that, but real doctors are using vitamin C right now. They're also doing it in Korea. Right in the center of the outbreak in Korea we're in contact with a doctor who has a small hospital and he has given a single shot of vitamin D – a big shot of about 100,000 units to each patient and every staff member – and also about 20 to 24 grams (24,000 mg) of vitamin C by IV. And he's reporting that these people are getting well in a matter of days."

Valuable Research Resources

The Chinese researchers are also using other traditional Chinese medicines in addition to vitamin C, as well as conventional treatments you would expect to be done for anyone having breathing issues or pneumonia.

For more information, Saul suggests perusing the Shanghai government's website using an online translator (as the website is in Chinese). You can find pertinent web links on the Orthomolecular Medicine News Service website,⁴ which has published 12 reports on various research findings in the past six weeks.

"We're constantly updating and we have references to the literature and also links to the studies in China, and the names of the doctors doing this. If you go to my website, doctoryourself.com, you can click over and sign up for a free subscription to the peer-reviewed, noncommercial Orthomolecular Medicine News Service ...

We even have the Orthomolecular Medicine News Service releases on this available now in French and Italian ... and German, and some are now available in Korean and Chinese and Japanese. It's also available in Spanish. So, this information is worldwide and it's been everywhere except on the United States television set," Saul says.

High-Dose Vitamin C Kills Viruses

According to Saul, vitamin C at extremely high doses is an antiviral, it actually kills viruses, but to get that amount, you typically need an IV. So, just how does it kill viruses? Some believe vitamin C's antiviral potential is the result of its anti-inflammatory activity.

Inflammation contributes to the massive cytokine cascade that can ultimately be lethal. However, that's not the whole story. Saul explains:

"Dr. Robert Fulton Cathcart, a physician in California, is much more knowledgeable about this than I ever will be, so I always go to him. And Cathcart wrote in his papers – a number of which I have at doctoryourself.com so people can read them – [that] vitamin C is a non-rate-limited free radical scavenger ...

He and Dr. Thomas E. Levy also emphasize ... that vitamin C is donating electrons and reducing free radicals, and this is primarily what's going on. Now, there are exceptions to that. When vitamin C gets into a cancer cell, it actually acts as if it were a pro-oxidant and that's because of the Fenton reaction. Checked; it is.

And vitamin C will kill a cancer cell because cancer cells are different. They absorb vitamin C because it's very similar to glucose, it's almost the same size ... With viruses, it's the same idea. Cathcart's view is that you simply push in vitamin C to provide the electrons to reduce the free radicals, and this is the way Cathcart and Levy look at vitamin C's function (at very high doses) as an antiviral.

At modest doses, normal supplemental doses ... vitamin C strengthens the immune system because the white blood cells need it to work. White blood cells carry around in them a lot of vitamin C ... So, vitamin C is very well-known to directly beef up the immune system through the white blood cells."

Boosting NADPH Is Also Important

Personally, I don't think this is the whole story, either, as vitamin C is a relatively weak electron donor. In my view, the top electron donor of the body is NADPH.

So, boosting your NAD⁺ and NADPH levels is really important for health, as is inhibiting NADH oxidase (known as NOX). You can learn more about this in "[Glycine Quells Oxidative Damage by Inhibiting NOX and Boosting NADPH.](#)"

NOX is what the enzyme in your lysosomes inside your white blood cells use to generate chemicals that actually kill viruses and bacteria. In the process, NADPH is being used up, so while inhibiting NOX is useful, increasing NADPH is key.

If you have a genetic disorder known as G6PD deficiency, it means the pathway your body uses to make NADPH is impaired and, in this case, you have to be careful taking high-dose vitamin C.

"At the Riordan Clinic, founded by Dr. Hugh Riordan, one of my mentors some years ago, they do screen for this," Saul says.

"And the Riordan clinic has actually said in their protocol – which I have in its entirety as a free download at doctoryourself.com, that People who have G6PD

[deficiency syndrome] can take some vitamin C, and they have had safe success at around 15,000 mg a day. Dr. Suzanne Humphries, a nephrologist and internist, has also said that for short periods of time it's not an issue."

The Importance of Vitamin D

Another crucial nutrient that may be even more important than vitamin C is vitamin D. The required dosage will vary from person to person here as well, and largely has to do with how much sun exposure you get on a regular basis.

I've not taken oral vitamin D for over a decade, yet my level is right around 70 nanograms per milliliter, thanks to daily walks in the sun wearing nothing but a hat and shorts. So, the best way to determine your personal dosage is to get tested and to take whatever dosage you need to maintain a vitamin D level between 60 ng/mL and 80 ng/mL year-round.

In the video above, pulmonologist Dr. Roger Seheult discusses the importance of vitamin D for the prevention of COVID-19. While there are no clinical trials investigating vitamin D for coronavirus specifically, there's plenty of data showing it's an important component in the prevention and treatment of influenza⁵ and upper respiratory tract infections.⁶

As noted by Seheult, while vitamin D does not appear to have a direct effect on the virus itself, it strengthens immune function, thus allowing the host body to combat the virus more effectively.⁷ It also suppresses inflammatory processes. Taken together, this might make vitamin D quite useful against COVID-19.

As explained by Seheult, robust immune function is required for your body to combat the virus, but an overactivated immune system is also responsible for the cytokine storm we see in COVID-19 infection that can lead to death.

"What we want is a smart immune system – an immune system that takes care of the virus but doesn't put us into an inflammatory condition that could put us on a ventilator," Seheult says.

He goes on to cite research⁸ published in 2017 – a meta-analysis of 25 randomized controlled trials – which confirmed that vitamin D supplementation helps protect against acute respiratory infections.

Studies have also shown there's an apparent association between low vitamin D levels and susceptibility to viral infections such as influenza. In one GrassrootsHealth analysis,⁹ those with a vitamin D level of at least 40 ng/mL reduced their risk of colds by 15% and flu by 41%, compared to those with a level below 20 ng/mL.

Magnesium Calms Nerves and Boosts Immune Function

Magnesium is another important immune booster. In addition to taking oral magnesium or eating lots of vegetables that contain it, another way to increase your magnesium level is to take Epsom salt (magnesium sulfate) baths.

"This is a wonderful way to relax," Saul says. "At the end of the day, have a nice hot Epsom salts bath. You do get absorption through the skin. Plus, it feels good, calms you down, it's inexpensive, and no one can tell you that you're going to overdose on Epsom salt [through bathing] ... So, an Epsom salts bath is a very pleasant way to get some magnesium."

Yet another little-known way to get magnesium is through molecular hydrogen tablets. The tablets contain metallic magnesium and when you put them in water, they dissociate into ionic elemental magnesium and form molecular hydrogen gas (which you then drink).

You can get about 80 mg of ionic elemental magnesium from each tablet, which is a considerable amount. For comparison, taking 400 mg of an oral magnesium supplement might only give you 40 mg due to their poor absorption. Magnesium oxide has the lowest absorption rate at only 5% or so, which is why Saul recommends avoiding this form of magnesium.

Zinc Lozenges to Treat Sore Throat and Colds

Chances are, you know zinc lozenges are recommended when you have a cold or sore throat.

"Just last night – again, this is the 17th of March – CBS Evening News in Chicago, Illinois, had a short segment on nutritional prevention of coronavirus, recommending you take vitamin D, vitamin C and zinc. So, we have finally, after seven weeks, gotten past the accusation of false information and fake news, and now it is on CBS."

Remarkably, prominent physicians have been paraded in the media saying it's impossible to strengthen your immune system to beat this virus. It's hard to fathom this kind of ignorance still pervades our medical system – and that they can get away with criticizing people who offer proof to the contrary.

Simulating Fever Can Help Kill Viruses

Aside from nutrients, if you own a sauna, now's the time to put it to regular use. By increasing your core body temperature, which is what happens when you have a fever, your body becomes more efficient at killing pathogens.

So, by taking a daily sauna, you can preventatively treat any lingering pathogens in your system. That's a very useful strategy and something I do pretty much every day I am home. Saul agrees, saying:

"Nearly 100 years ago, Jethro Kloss, who wrote 'Back to Eden,' one of the early health nut books, recommended artificial fevers. They would bundle people up and put them in a hot bath ... because fever can be that beneficial."

Or you can do what the native Americans did and do ... a sweat lodge, kind of the genuine American version of a sauna. Just one suggestion. When you pick the rocks that you're going to superheat, make sure they are all igneous rocks and not sedimentary rocks, because if they have the layered sediment, they will explode, and that is bad!

So, make sure you have volcanic rocks, igneous rocks ... they glow a nice red. It takes a long time to get the glow going, but then it lasts a long time as well. And while they are heating, you can build the lodge. This is a group activity. You're going to need help to build the lodge."

If you're in the market for an electric sauna, do your research, as many (if not most) emit very high electromagnetic fields (EMFs). Unfortunately, many advertised as low-EMF saunas still have high magnetic fields, which are just as bad.

More Information

I agree with Saul when he says "We have to get the word out to people that prevention is working; vitamin C is working and we haven't heard about it." For example, in Korea, where the death rate for the COVID-19 virus is below 1%, they've disseminated information about vitamin C.

So, part of your preventive measures is to educate yourself about simple measures you can take from the comfort of your own home. Resources where you can find more information include Saul's website, doctoryourself.com, which is free, noncommercial and peer-reviewed.

"It's been up for 21 years now," Saul says. "Doctoryourself.com has a very good search engine and it is not a Google search engine. You can use it as a site search and find whatever you're looking for. Without even scrolling down, the screen will show you a series of articles on COVID-19 – nutritional protocols with references to the doctors and the parts of the world where this is being used successfully right now.

You can also go to Andrewsaul.com which is my commercial site. That's where I have my tuition-based courses that I offer, called the Megavitamin Formula Course. And you can go to the Orthomolecular Medicine News Service ... and sign up free of charge.

This is peer-reviewed, and I'm happy to say that Dr. Mercola is a member of our 42-member editorial review board. So, when I say peer-reviewed, we really mean it and I love having association with doctors who use, recommend and live good nutrition."

Sources and References

- ¹ Firstaidstresstool.com
- ² [24/7 Wall Street](#) January 24, 2017
- ³ [New York Post](#) March 24, 2020
- ⁴ [Orthomolecular Medicine News Service](#)
- ⁵ [Can Fam Physician](#). 2015 Jun; 61(6): 50
- ⁶ [Endocr Pract](#). 2009 Jul-Aug; 15(5): 438-449
- ⁷ [Clinical Therapeutics](#) 2017; 39(5): 930-945 (PDF)
- ⁸ [The BMJ](#) 2017;356:i6583
- ⁹ [GrassrootsHealth.net](#), Vitamin D Reduces Colds and Flu