

Paul stays home



Susana López
Selene Zárate
Martha Yocupicio

Illustrations:
Eva Lobatón



© Paul stays home

Susana López Charretón
Selene Zárate Guerra
Martha Yocupicio Monroy
Illustrations: Eva Lobatón

© SOCIEDAD MEXICANA DE VIROLOGÍA

First edition: May 2020

Paul stays home



LA SOCIEDAD MEXICANA DE VIROLOGÍA authorizes and recommends the reproduction and dissemination of the story «Pablo stays home» as long as its content is not altered, it is not used for profit and the source is cited.

**What's wrong
Paul?
Why are you
sad?**



I miss my friends and going out to the park to play.

I also would like to visit my grandad and my grandma, and I am tired of being in lockdown.



Why does everybody say that we have to wait for the coronavirus to go away?



What is a coronavirus?

**Why don't
we look for
answers?**



The first thing that
Paul's mom did
was to call the
school teacher.

Hi teacher!
Paul and I would
like to understand
what is going on and
everything about the
coronavirus. Could you
help us?



The teacher
answered:

Hi!, I think it is important that
somebody that knows about this
veeery well, explains it to us. Like
María my scientist friend! She made
a video that explains everything
clearly. I will send you the link!

Your teacher is right, it is important to have information from the experts.



Paul's mom played the video on her phone.

Hi!
My name is María and I am a scientist. Many people have asked for information about coronaviruses so I decided to make this short video to answer several questions.



Let's begin
at the
beginning

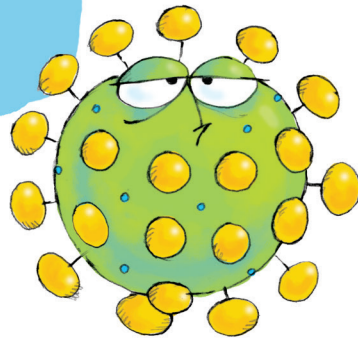
At the end of last year, in Wuhan,
a city that is in China, the doctors
started to notice several sick people
with fever and cough, and some of
them had trouble breathing.

You also
have a
cough??

There were more and more sick people, so the scientists started to search for the cause of the problem.

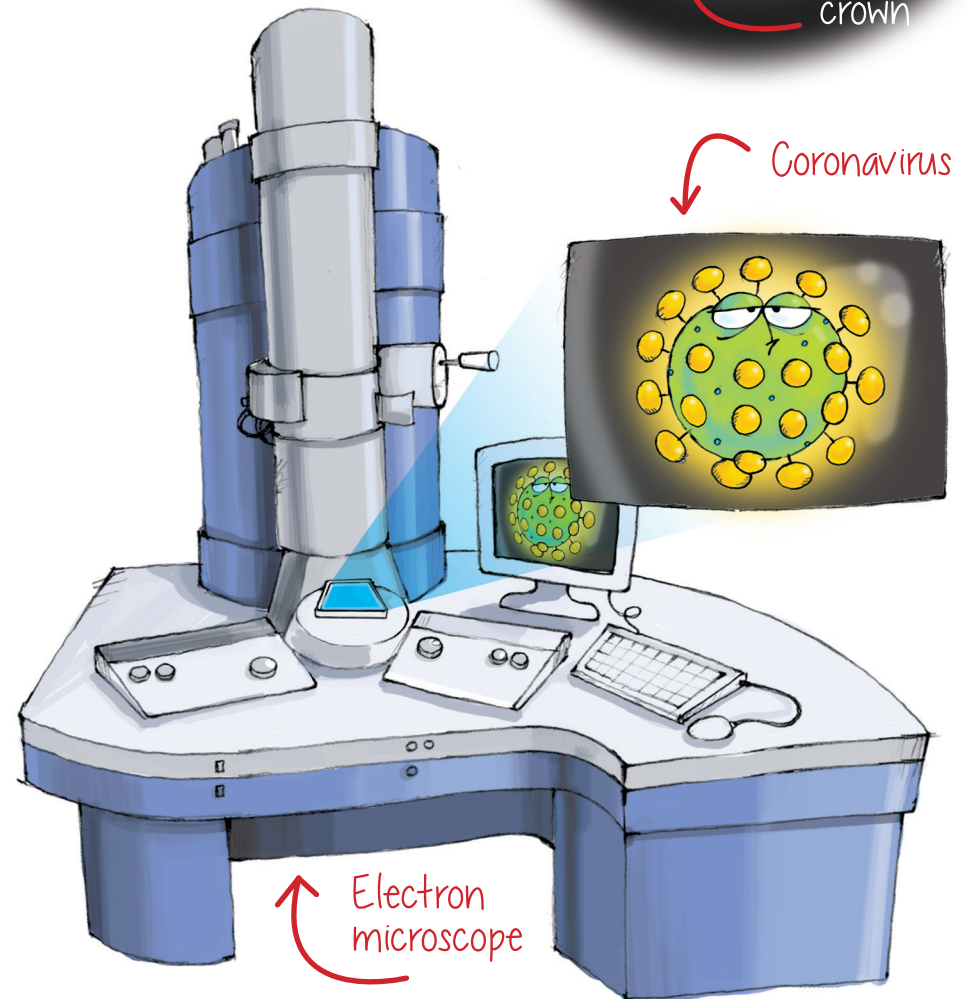
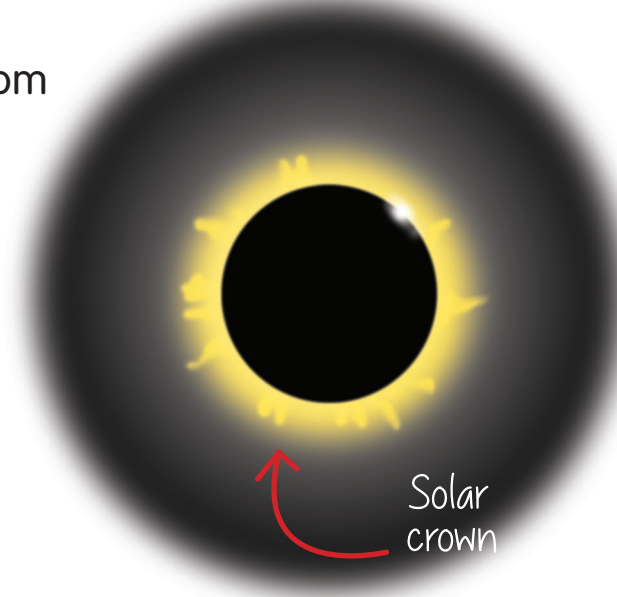
They found out that the cause of the disease was a coronavirus, that was in the airway of the sick people, for example in their lungs.

Coronaviruses are a large family of viruses that can infect either people or animals



And as with every virus, they are very small!

Their name comes from their appearance under the electron microscope, since their shape resembles the solar crown in an eclipse (corona means crown in latin).



It is believed that some wild animals, that are not usually in contact with humans, could have spread the coronavirus to people. This could have happened when hunting these animals.

The virus present in one of these animals could have jumped to a person, infecting him or her.



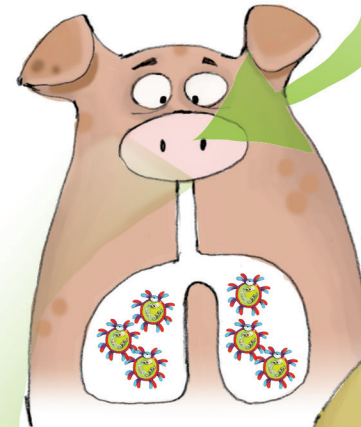
We still do not know for sure which animal spread the virus to people.

The jumps between viruses that infect animals and humans are called zoonotic events, and are more or less common.

Virus

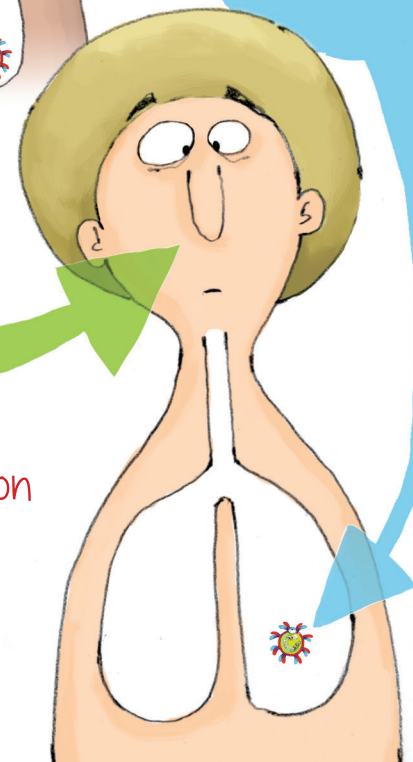


Animal



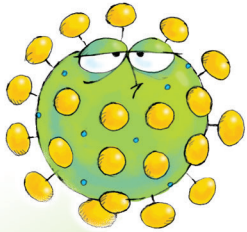
However most of the time the viruses cannot multiply in the infected person, and the problem ends there.

Person

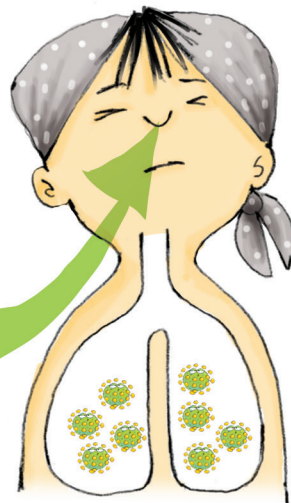


However, sometimes viruses are able to multiply in a person very well. This is what happened in the case of this new coronavirus, that has been named by the scientists as:

Coronavirus SARS-CoV-2

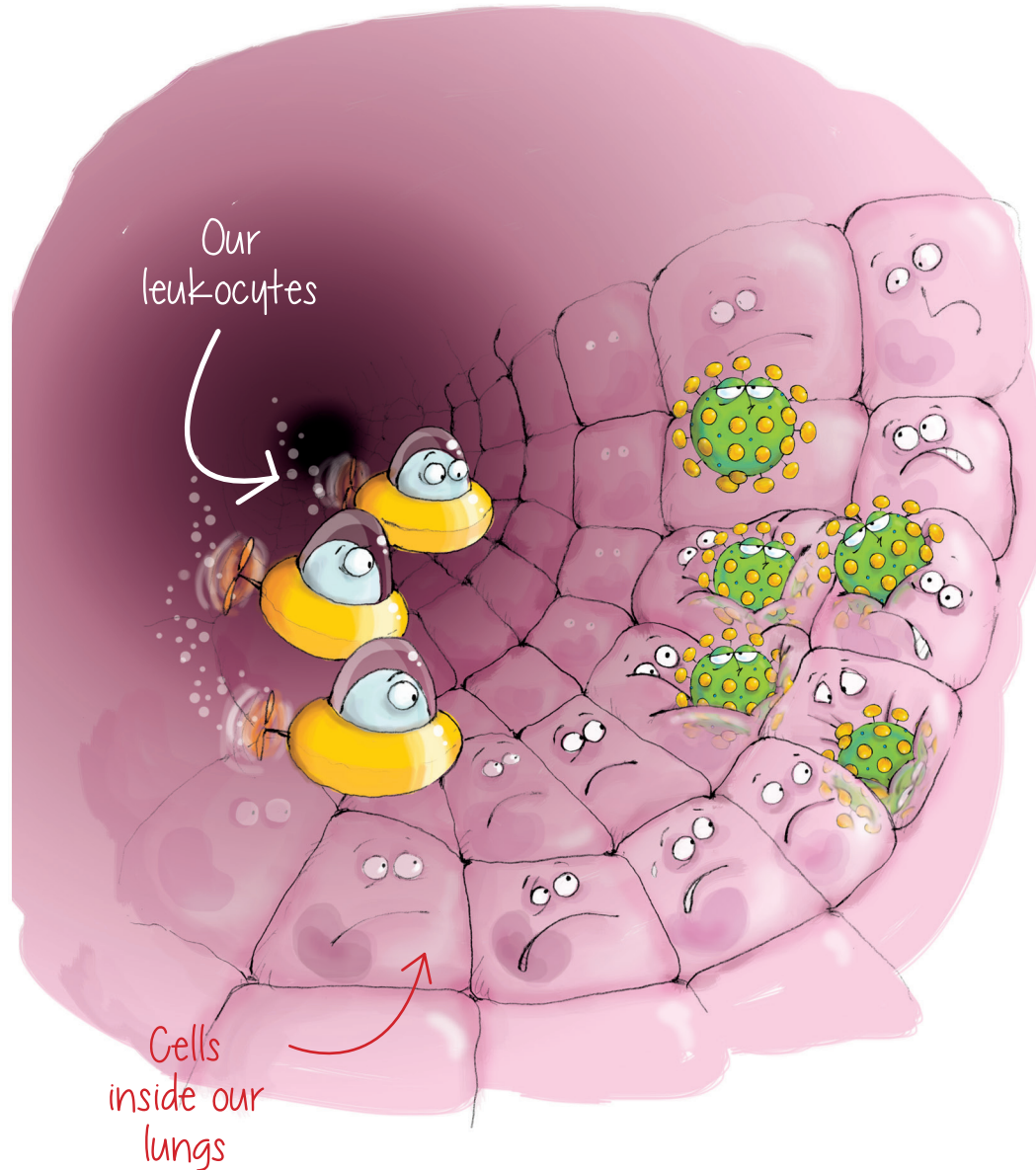


Animal
(Still don't know which one)

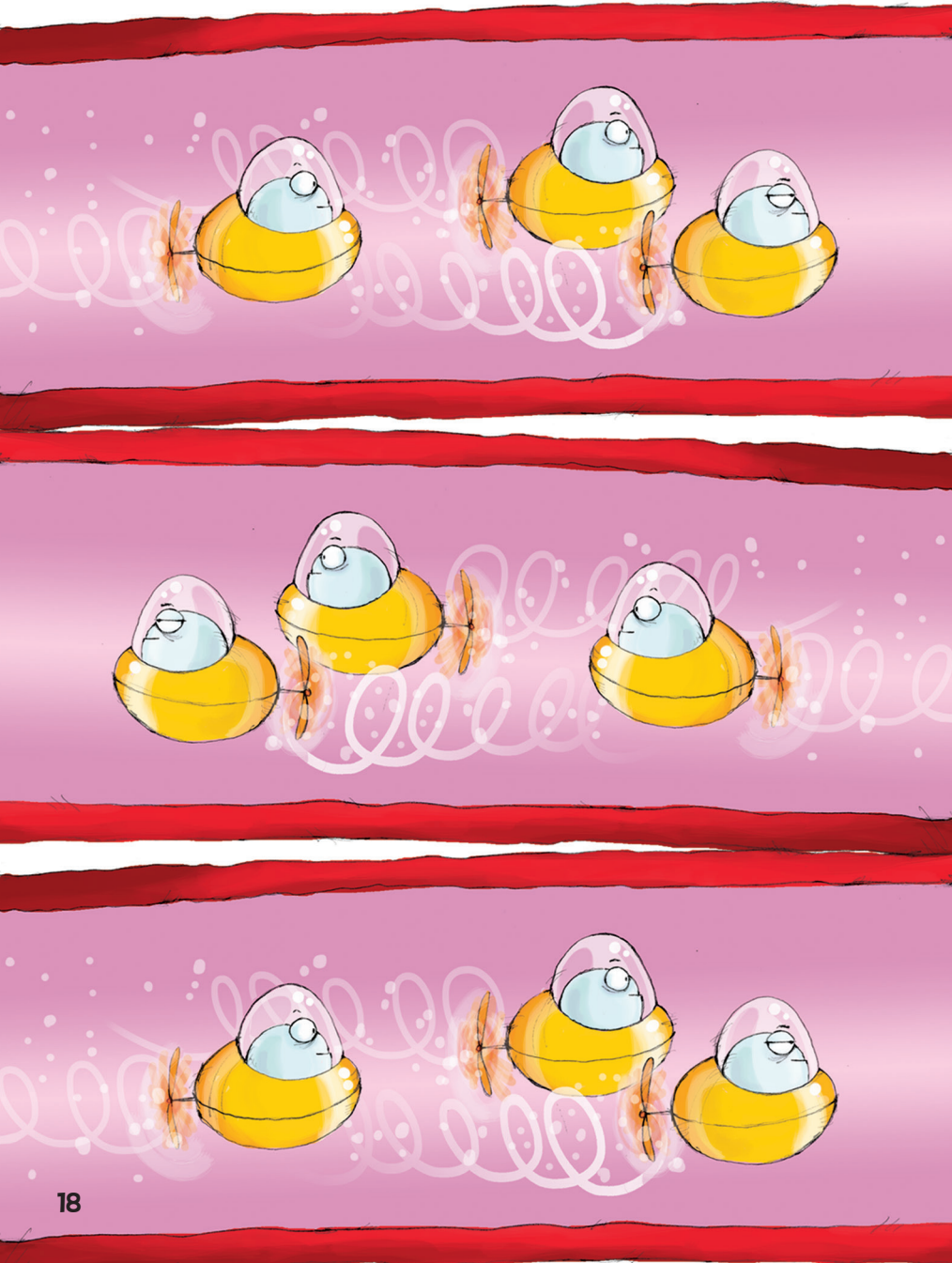


Person

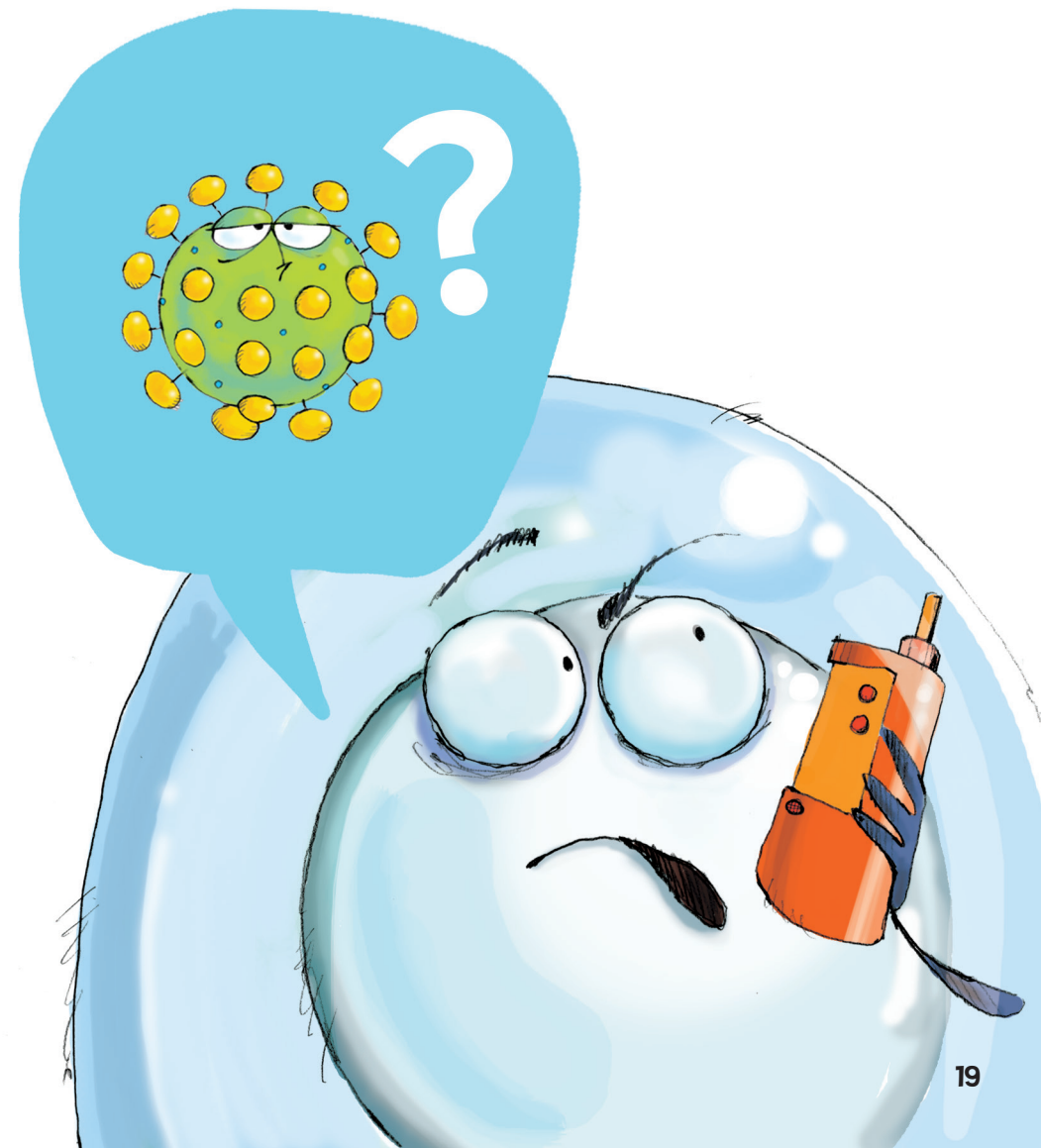
Since this virus is new for humans, our defense cells, the leukocytes, still do not know it and so they do not know how to attack it.



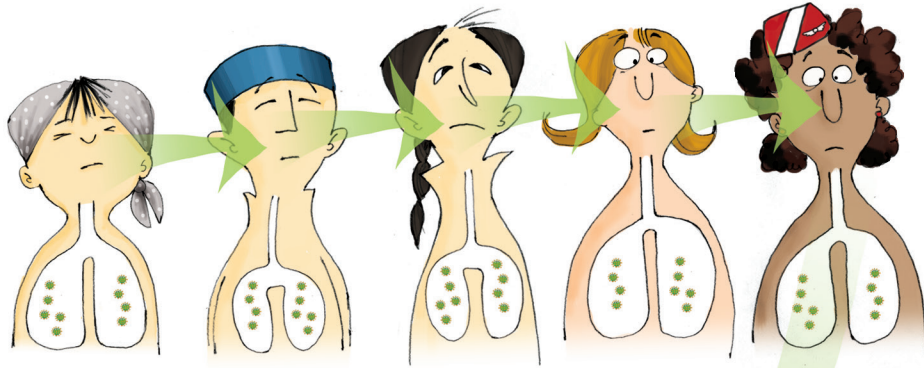
Every day our leukocytes patrol our body to destroy any microbe that could make us sick.



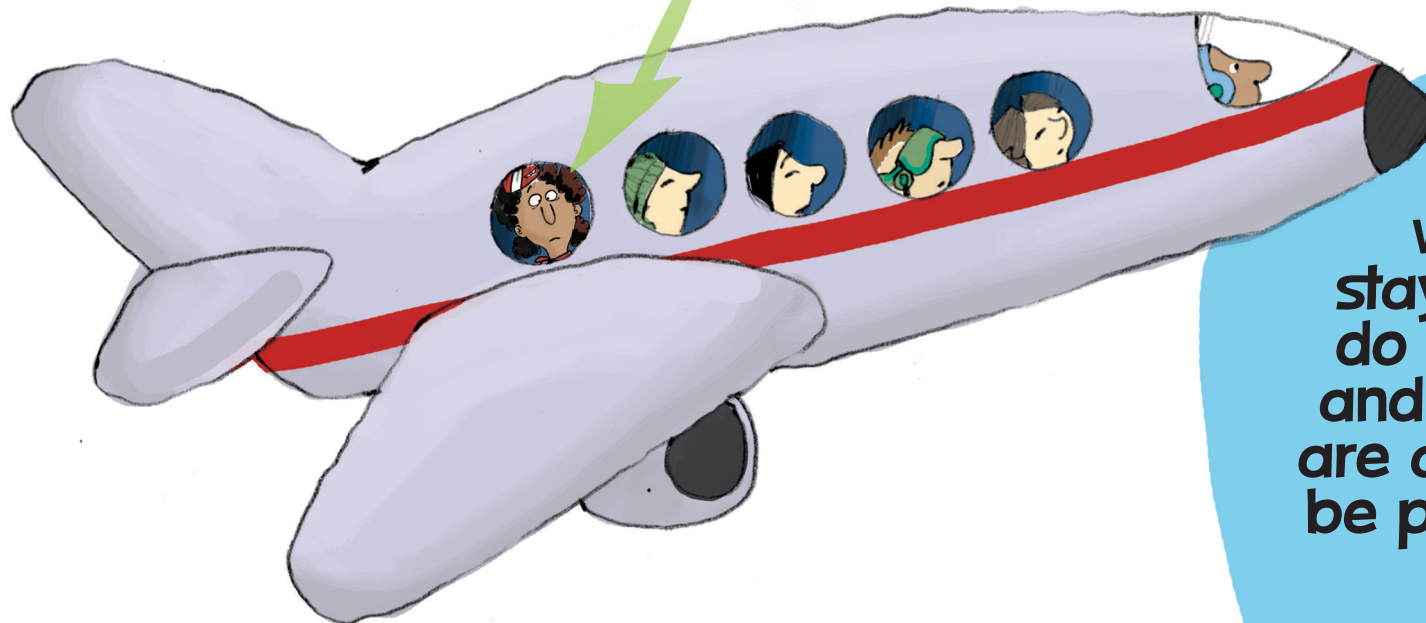
But when they do not know the enemy, they need to learn how to fight it. So, they call the general quarters to ask for instructions on how to destroy it. This is what is happening with SARS-CoV-2



In the meantime, the virus started to spread from person to person in China.



Some infected people traveled to other countries, without knowing that the virus was traveling with them.



Since this happened very fast, soon doctors and hospitals all over the world had to take care of many sick people.



That is why we are asked to stay home. So that we do not catch the virus and all the people that are already infected can be properly cared for in the hospitals.

It is very important to understand
how can we catch the
SARS-CoV-2 virus.

This
coronavirus
is not in
the air.

It travels in the saliva
droplets that are expelled
when a sick person
coughs or sneezes

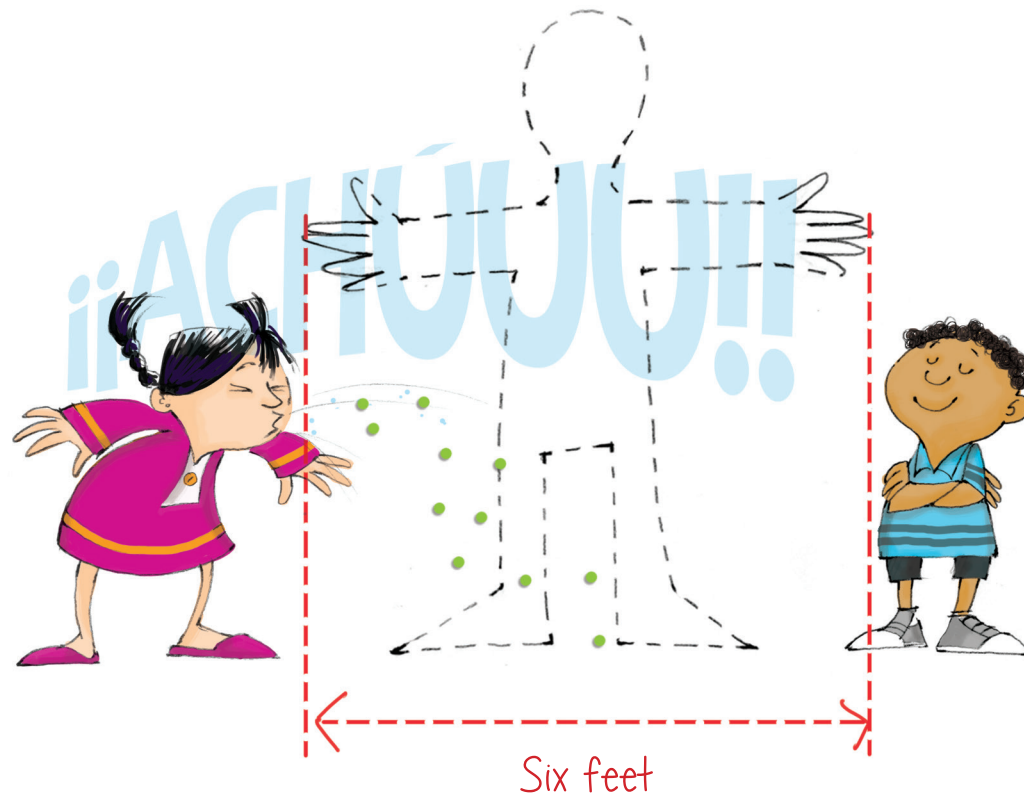


¡ACHÚU!!



That is why you
can catch the virus
if somebody sick
coughs or sneezes
near you.

Those droplets can only reach about 6 feet, which is just about the width of your mom or dad with open arms.



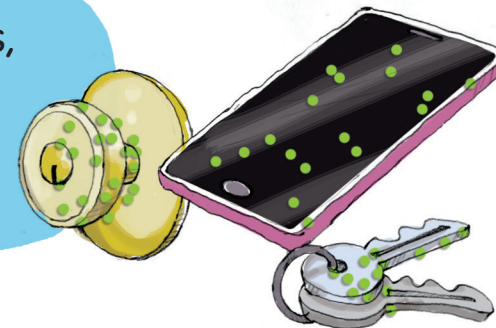
If you imagine that there is an adult with extended arms between a sick person and you, that is enough room so that the droplets with virus cannot reach you.

BUT!!!!

The droplets can fall on many things around you.



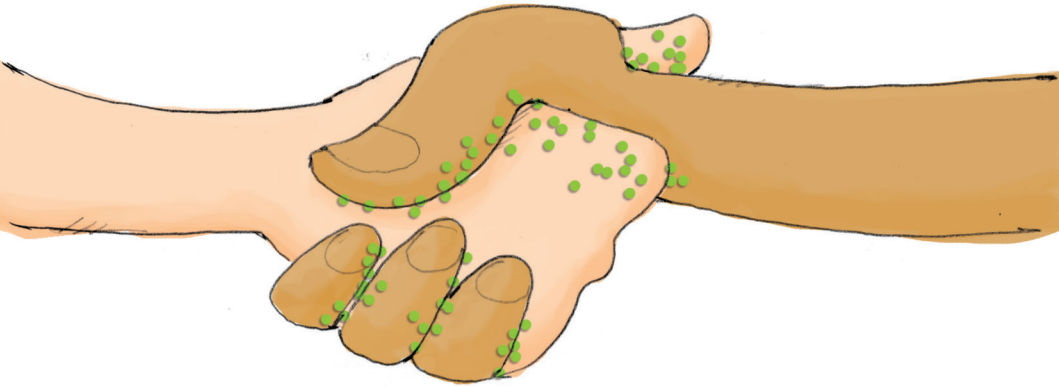
...like tables, computers, handrails, or phones, where the virus can stay for awhile.



If you touch something that is contaminated with virus...



...or shake hands with someone who coughed or sneezed on their hands...



...and then you touch your face, you can get infected, because coronaviruses can enter our body through our eyes, nose or mouth.



Ahhh! That is why we are supposed to use a paper tissue to cough or sneeze, and then throw it away in a closed trash can.



And if we do not have a tissue, we can use our elbow to cover our mouth –Like Batman! So that we don't contaminate (spread the virus to) anyone.



And that's
also why we
are told to
wash our
hands very
well!

With
lots of
soap,



all
over
our
hands,

and very
often!



How does this coronavirus cause disease?

The disease caused by this virus is called:

COVID - 19

Sick people almost always have
fever, cough, headache and they
feel verry tired.



What most
people need to
do is to stay home
until they feel better. 29

Only when sick people get worse do they need to go to a hospital, because they have problems breathing and there they have machines to help them.



Children rarely get sick with this virus, but they can transmit it, so that is why they cannot go to school.



The people that might need to go to the hospital if they are sick, are the elderly, like our grandparents.

or those who already have other diseases.

It is them who we need to take care of!



That is why it is very important to stay home! If we do not get close together, the virus cannot travel from person to person and won't get us sick.

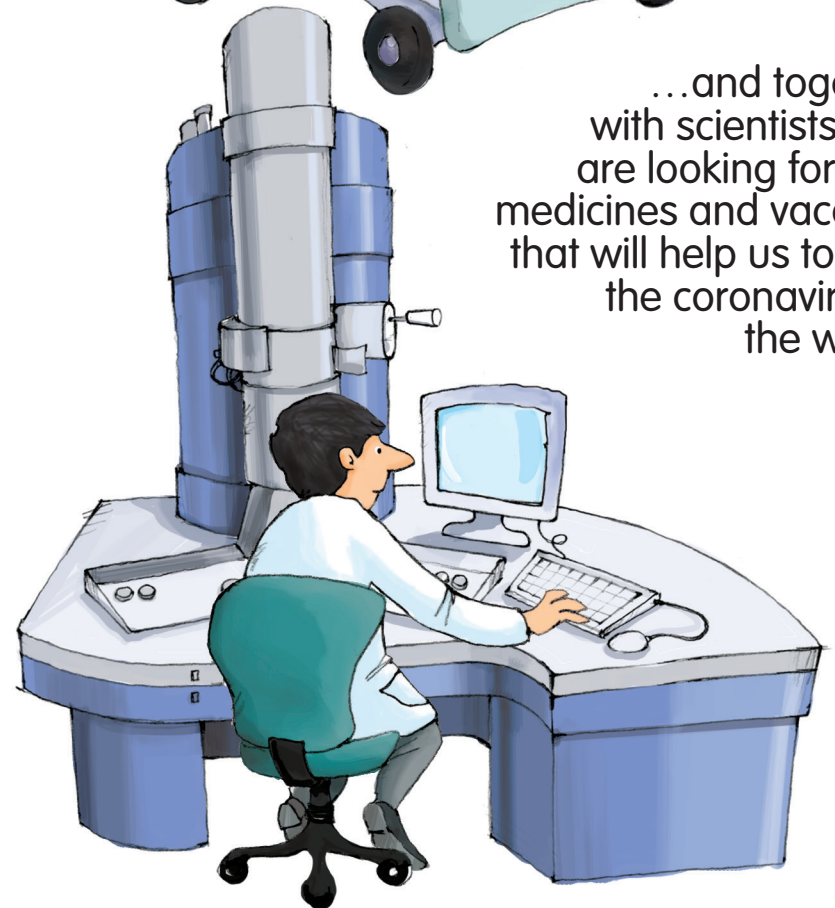


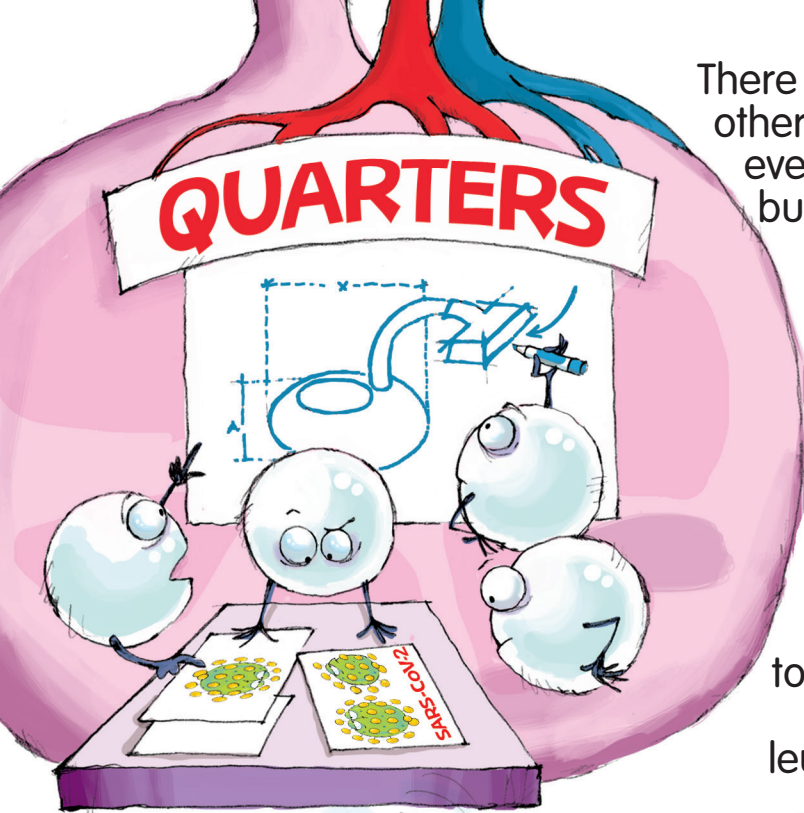
This will also give time for the doctors to take care of the sick people that need them the most, and will make room in the hospitals for those who need to be there.

Nurses and doctors are working very hard to take care of the sick people...



...and together with scientists they are looking for new medicines and vaccines that will help us to fight the coronavirus in the world.

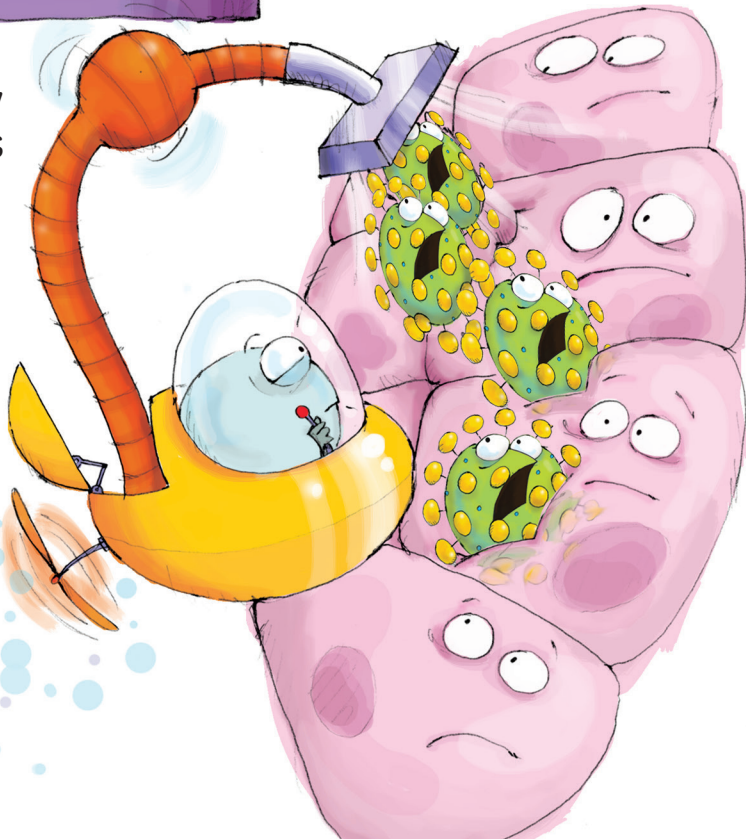




There have been other pandemic events before, but sooner or later they end.

We need to be patient so that our leucocytes...

...learn how to defend us against SARS-CoV-2, as they already do against many other viruses and microbes.



Fear of the unknown is sometimes worse than the harm that the coronaviruses can cause. Now that you saw this video and learned what is happening, you know how to help: Stay home and explain this to your friends so that they also understand, and be patient.



When the video was over, Paul was no longer sad or worried.

Now I get it:
If we stay home, it is less likely that we get the virus, and in that way, we can protect others in case we are infected and haven't noticed!



When I grow up I will be a scientist!!

And I think you will be an excellent scientist Paul!

Why don't we make a cake to celebrate?



Yeeees!!

Just hold on a moment..... I need to tell Luis and Sophy something very important:





WHO MADE THIS BOOK?



Susana López

She works at the Institute of Biotechnology of UNAM in Mexico and studies rotaviruses, which cause gastroenteritis in small children, because she wants to find new ways to protect children against the disease caused by these viruses. She uses microscopes and special equipment. When she is not working she likes to read books or to cook, using regular pots and pans.



Martha Yocupicio

She tries to understand what is happening when viruses infect our cells, and how the cells fight back. In her free time, she likes to read books of detectives that use their reasoning to resolve interesting mysteries.

Selene Zárate

Besides being a mom, this Mexican scientist studies how viruses evolve and escape from the immune system and from drugs, and how to prevent this from happening. When she is not working, she takes care of her two naughty little ones and rediscovers with them how the world works.



Eva Lobatón

She has a big colorbox and a computer, that she uses to write and color books and magazines. Besides having fun, she thinks that her drawings can communicate many messages. When she is not working she likes to observe things around her.



Martha, Selene and Susana have support from the National Strategic Program on Research and Incidence in Virology from CONACyT.



What is and what are the goals of the MEXICAN SOCIETY FOR VIROLOGY?

A group of researchers from a variety of institutions in the country got together with the idea of creating the Mexican Society for Virology (Sociedad Mexicana de Virología-SMV) to promote research and innovation, training of students with high academic standards, technological developments and the communication of virology.

Viruses are the most diverse and most numerous microorganisms on the planet. They can infect all known life-forms and are responsible for many human diseases.

Advancement in the knowledge of their biology and of their role in disease are vital for the development of new and improved vaccines, and for the design of antiviral drugs and better diagnostic tools.

The study of their epidemiology, evolution and ecology is required to further our understanding of their patterns and mechanisms of distribution and dispersion, which can in turn be used to generate new methods for disease prevention and control.

The SMV aims to promote collaborative links between research groups on all aspects of virology, from basic to clinical and epidemiological studies, and to contribute to the efforts of the Mexican health system to respond, effectively and efficiently, to health emergencies of viral origin.

The SMV also aims to communicate to the general public topics on virology that are of interest to all.

Be sure to look for our publications and videos!

<https://www.smvirologia.org>

 <https://www.facebook.com/SocMexViro>

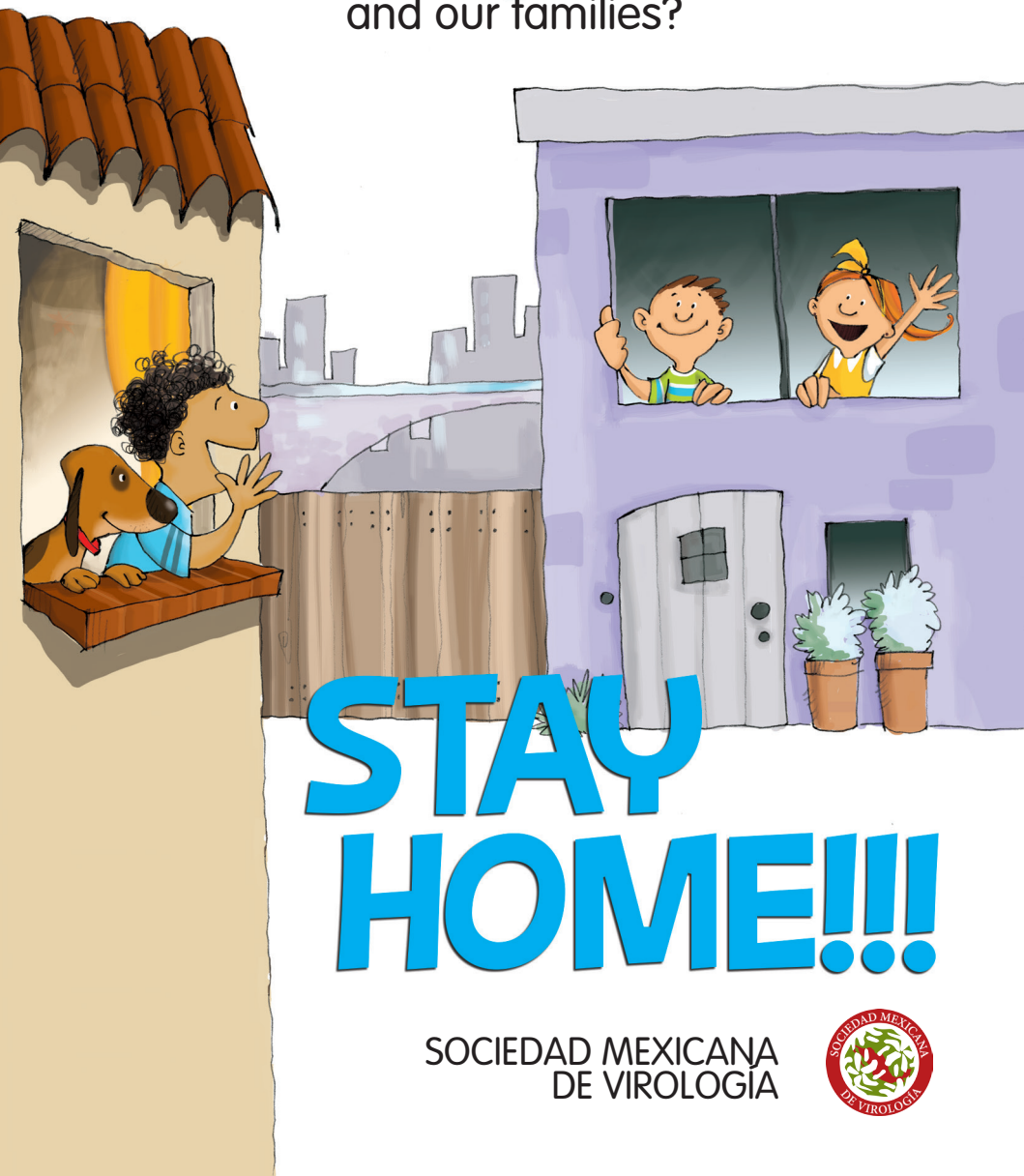
 Soc Mex Virología - Virología Conacyt
@Viro_ConacytMX

 Sociedad Mexicana de Virología



Paul is sad because he can't go out.
He can't see his friends or visit
his grandparents.

Like everyone else, he has to wait
until the coronavirus pandemic is over.
What is the coronavirus? How is it spread?
How can we take care of ourselves
and our families?



STAY HOME!!!

SOCIEDAD MEXICANA
DE VIROLOGÍA

