WORLD JOURNAL OF PHARMACEUTICAL RESEARCH
SJIF Impact Factor 8.453
Volume 11, Issue 12, 2514-2554. Case Study ISSN 2277–7105

TREATMENT OF COVID-19 BY STUDYING AND OBSERVING PRESCRIPTION-BASED MEDICATION IN A PATIENT REPORTED WITH COVID, SARS-COV CASE, AN ACTUAL PRACTICE IN PHARMACY AND, THE HOSPITALS. A CASE STUDY REPORT

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Article Received on
21 July 2022,

Revised on 11 August 2022,
Accepted on 01 Sept. 2022

DOI: 10.20959/wjpr202212-25628

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ABSTRACT

COVID-19 is caused by a venurable SARS-CoV group of viruses that cause severe to acute respiratory diseases in vulnerable people or the patients diagnosed with it. The cure and treatment were critical at the initial and there were many critical cases reported to be diagnosed with COVID positive. The death of patients were high due to unavailability of medication and proper treatment. Newer medications such as: Remdesiver, Favipiravir antiviral drugs, Lopinavir- Ritonavir treatment were also had been a part of trial. This study investigated a diagnosis report of a patient based on patients consent to study and reproduce the diagnosis for study and information purposes. Studying medication in current medication practices in the health care systems are very important, so the conduct of this case study was obtained to meet the understanding of current medicinal practices and, the effect of some of the medication on the patient. Understanding the recovery state, and concern of pharmacovigilance, in the in the health care is majour concern of this case report. But there are currently no proven ways to stop the spread of this lethal virus. SARS-CoV-II. Scientists are working really hard to develop efficient mitigation strategies while also studying the mechanisms of virus transmission, along with the medication.

KEYWORDS

SARS-CoV treatment, case report, studying pharmacovigilance data, patient case study report, pharmacovigilance safety data.

1. INTRODUCTION

The COVID-19 pandemic stands as a pivotal global health challenge for our era. Caused by the SARS-CoV-2 virus, COVID-19 is an infectious disease. While many individuals experience mild to moderate symptoms and recuperate without specific medical intervention, others develop severe illness necessitating medical care.[5]

Coronavirus disease (COVID-19) is an infectious disease caused by the SARS-CoV-2 virus. Most people who fall sick with COVID-19 had experienced mild to moderate symptoms and recover without special treatment. However, some of them had become seriously ill and require medical attention.

Coronaviruses are a large family of viruses, some causing illness in people and others that circulate among animals, including camels, cats and bats. Rarely, animal coronaviruses can evolve and infect people and then spread between people such as has been seen with MERS and SARS. The outbreak of Novel coronavirus disease (now named COVID-19) was initially noticed from a seafood market in Wuhan city in Hubei Province of China in mid-December, 2019, has spread to more than 185 countries/territories worldwide including India. The causative agent for COVID-19, earlier termed provisionally as novel Coronavirus has been officially named as SARS-CoV-2.

Effective responses to the epidemic continue to be difficult for many nations as the world struggles with the new coronavirus. The same is true of India. India is a very diverse nation, and states and even cities can differ substantially from one another. While the disease's symptoms and main methods of transmission are the same over the world, local elements including population density, social contact patterns, and the effectiveness of local public health systems dictate the disease's course. Innovations fueled by local initiative, resourcefulness, and dedication are creating inspirational success stories in many different locations.

One of India’s examples of relative success in dealing with the spread of COVID-19 can be witnessed in Pune. Pune is the second largest city in Maharashtra, a western coastal state in

India. With an estimated population of 6.6 million1 in 2020, the city has a population larger than that of the country of Finland living in an area one fifth the size of London. Administered by the Pune Municipal Corporation, it is divided into five zones comprising 15 ward offices.[11]

Although Pune's high population density poses a threat, the city also has unique strengths. Its wide and active network of civil society organisations with a long history of working with the local population, particularly its informal settlements, and high literacy rate (86%) provide opportunities to address the challenge posed by the pandemic.

The first case of COVID-19 was detected in Pune on 9th March 2020. The city created a COVID-19 response team and a 106-bed isolation facility. Meetings were held with department heads, government hospitals and public representatives to devise a preparedness plan.

After the detection of the first case, it took 48 days for Pune to cross 1000 cases but only 11 more days to cross 20002. A decision was taken to identify and focus on hotspots within the city to control community spread. The city government identified five wards with the highest number of cases and created the Action Plan for Hotspot Areas to address the root causes of COVID-19 spread in these areas. The highest density of cases was reported from informal slum settlements within these wards. It was understood that the lack of space within these settlements made it a challenge to implement proper social distancing within them, as was the case in places like Dharavi—Asia's largest slum, located in Mumbai, the city with the most COVID-19 cases in India—which witnessed an early spread.

1. a. Ward wise positive cases distribution

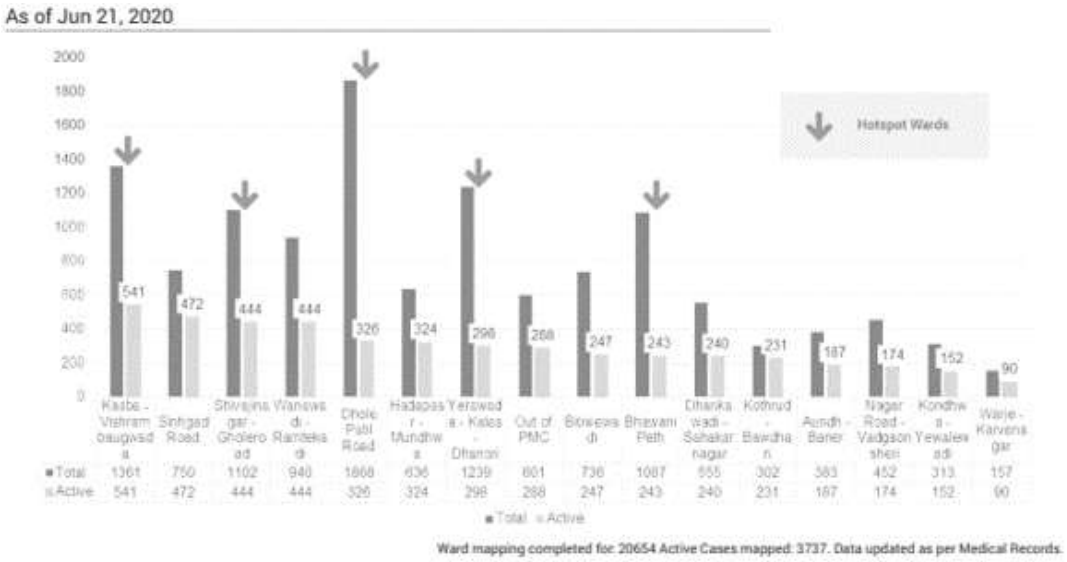


Figure 1: Showing How Active Cases in Hotspots Were Brought Down Below Normal Levels of Other Wards.

SARS-CoV-2 has been proven to spread from person to person. It is believed to be primarily spread by respiratory droplets produced when persons cough, sneeze, or exhale. SARS-CoV-2 can also be spread by contact, direct contact, and infected surfaces. subsequently touching their own mouth, nose, or potentially eyes after touching other surfaces or items. Healthcare associated infection by SARS-CoV-2 virus has been documented among healthcare workers in many countries.

Those in close touch with a person who has COVID-19 are most at risk of contracting it. Patients with suspected or confirmed COVID-19, or those who look for them.

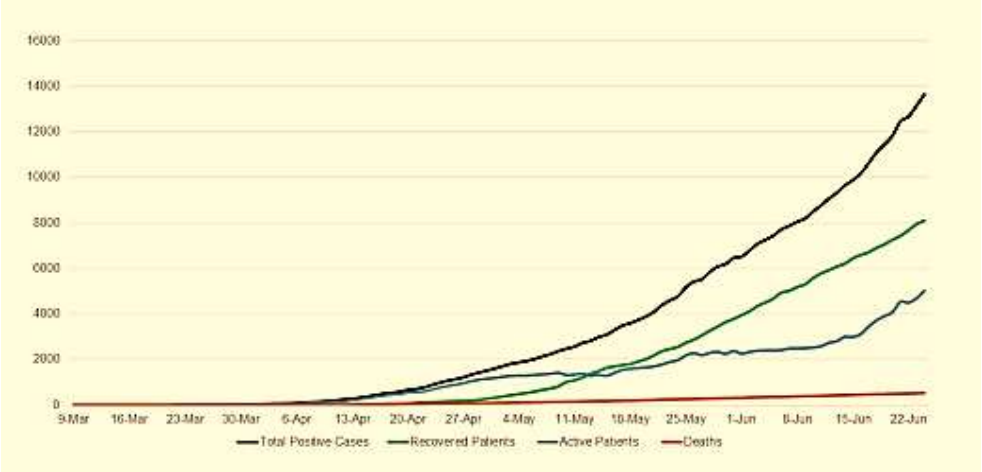


Figure 2: COVID-19 Pune graph, June, 2020.

When COVID-19 came to paradise, India had to try to act swiftly. Goa is a tiny emerald land on the western coast of the Indian peninsula with a population of 1.8 million. On its north runs the Terekhol River, which separates Goa from Maharashtra.

The state has a history of Portuguese rule and the plush beaches, remnants of Portuguese culture and architecture as well as the numerous churches, cathedrals and the famous Basilica, make Goa a favorite destination for national and international tourists. However, with the onset of the COVID-19 pandemic in India, its flourishing tourist industry became a cause of concern and vulnerability for the state, propelling the state machinery to swing into focused action very early on in the pandemic and take innovative steps to solve critical problems. As of June 30th, Goa has reported 1251 cases and 3 deaths. It is among the least affected states in the country with just 724 active cases. The state has been able to achieve what looked impossible just a few months ago. Some of Goa's achievements are important not only for the state but also for the larger national and global fight against COVID-19. Here we highlight two examples: how the state repurposed its manufacturing capacity to meet the demand for hand sanitiser; and how Goa's thriving pharmaceutical industry managed to minimise disruption and quickly recover its production capacity to pre-COVID levels.[14]

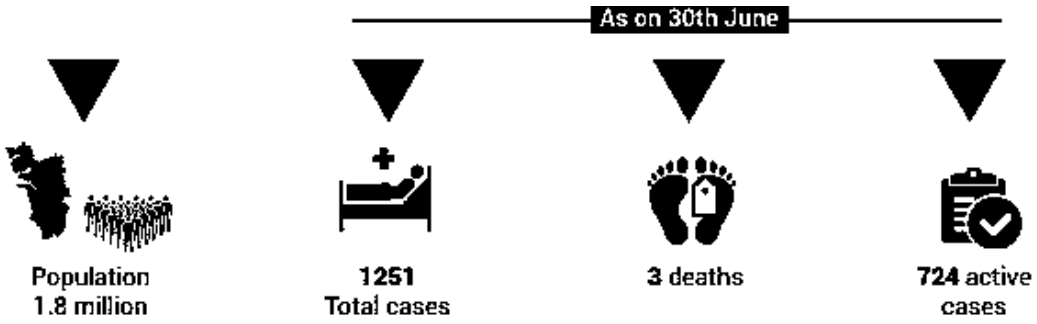


Figure 3: Over View of the Reported Cases of COVID-19.

Turning alcohol into hand sanitiser was one such success story. As COVID-19 emerged in Goa, people panicked and started hoarding hand sanitisers. The administration received numerous complaints related to a shortage of the latter, and as an initial response, **Goa Food and Drug Administration** took steps to prevent black-marketing and hoarding of hand sanitisers and masks. But there was a need to tackle the shortage of Alcohol to Hand Sanitiser supply, and to calm the nerves of the public pertaining to the same. The government of Goa

then decided to permit liquor manufacturing units to manufacture sanitisers off ethyl alcohol, commonly used to manufacture various types of liquor.

When the national lockdown was announced, the administration started issuing permissions to liquor manufacturing units; to manufacture hand sanitiser with effect from 24th March, 2020. Within a few days, a total of 16 liquor manufacturing plants produced 950,000 litres of hand sanitiser. After meeting the local demand, these producers exported the sanitiser out of the state. The administration motivated these manufacturers to provide about 40,000 litres of sanitisers to government departments such as health, disaster management, police, etc, who have had active public interaction even during the lockdown.

Figure 4: Sanitisation Care, Development of Sanitisers and, Hygiene Practice During COVID-19 Pandemic.[13,14]

1.1. How it spreads

The virus can spread from an infected person's mouth or nose in small liquid particles when they cough, sneeze, speak, sing or breathe. These particles range from larger respiratory droplets to smaller aerosols.

You can be infected by breathing in the virus if you are near someone who has COVID-19, or by touching a contaminated surface and then gets passage through your: eyes, nose or mouth. The virus spreads more easily indoors from infected people and from crowded places too.[8]

How to stop its spread is one majour concern. Using personal protective equipment's (PPES) are one most appropriate way to practice.

Thus, the transmission of the virus occurs primarily through small liquid particles emitted from an infected person's mouth or nose during activities such as: coughing, sneezing, speaking, singing, or breathing. These particles can vary in size from larger respiratory droplets to smaller aerosols. Infection can occur through inhalation of the virus when in close proximity to an infected individual or by touching contaminated surfaces and subsequently transferring the virus to one's eyes, nose, or mouth. The virus is known to spread more readily indoors and in crowded settings. Addressing how to mitigate its spread is a significant concern, with the use of personal protective equipment (PPE) being a crucial measure to adopt.

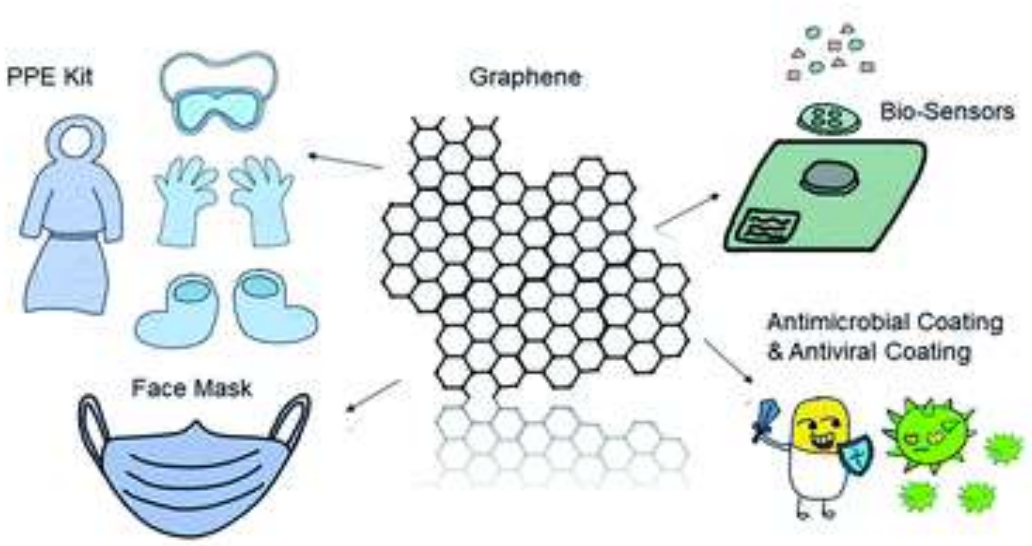


Figure 5: Personal Protective Equipment's (PPEs).

1.1.a. Personal Protective Equipment's (PPEs) are protective gears designed to safeguard the health of workers by minimising the exposure to a biological agent. 4.1. Components of PPE. Components of PPE are **goggles, face-shield, mask, gloves, coverall/gowns (with or without aprons), head cover and shoe cover**.

1.1.b. I.D.s (Individual defense equipment) (PPE)

Personal protective equipment (PPE) is a type of safety equipment used to protect employees' health by reducing their exposure to biological agents.

1.1.c. PPE components

Goggles, a face shield, a mask, gloves, coveralls or gowns (with or without aprons), a head cover, and shoe covers are PPE components. The following paragraphs provide information on each element and the justification for its use:

1.1.d. Goggles and a face shield

In a scenario where droplets are produced by the cough or sneeze of an infected individual or during aerosol generating operations carried out in a clinical setting, contamination of the mucous membranes of the eyes, nose, and mouth is possible. Another likely scenario is unintentionally contacting the eyes, nose, or mouth with a contaminated hand. Therefore, utilising face shields or goggles to protect the mucous membranes of the eyes, nose, and mouth is a crucial component of standard and contact precautions. Goggles should have a

flexible frame that fits well against the skin of the face, shielding the eyes and their surroundings and even allowing room for prescription glasses.

1.1.e. Masks

Coronaviruses are respiratory viruses that mostly affect the upper and lower respiratory tracts.

Thus, preventing human infection by shielding the airway from the particulate matter produced by droplets or aerosols. The virus can potentially enter the host through contaminated hands or mucous membranes of the mouth and nose that have been touched. Therefore, the droplet when handling a suspected or confirmed case of COVID-19 or carrying out operations that produce aerosol, it is essential to take care and use masks for airborne protection.

There are various sorts of masks. The sort of mask to be worn depends on the specific risk profile of the personnel category and the employee's job. Depending on the work environment, two types of masks are advised for different categories of individuals working in hospitals or community settings:

1. A medical mask with three layers,
2. N-95 Respirator mask.

1.1.f. Medical mask with three layers

A triple layer medical mask is a disposable, fluid-resistant mask that shields the user from infectious material droplets released while talking, sneezing, or coughing.

1.1.g. Respirator mask N-95

A respiratory protective device with strong airborne particle filtering effectiveness is an N-95 respirator mask. Such masks are made to produce an extremely tight fit on the face in order to offer the necessary air seal to the wearer.

High fluid resistance, adequate breathability (ideally with an expiratory valve), easily distinguishable internal and external faces, and a duckbill or cup-shaped structural design that does not collapse against the mouth are all desirable characteristics of such a mask.

The filtration capacity of these masks is greater than that of triple-layer surgical masks when properly used.

These are made to shield the wearer from airborne particles because they offer a significantly tighter air seal than triple layer medical masks.

1.1.h. Gloves

A person may become infected with the virus if they touch something or a surface that has been contaminated by someone who has COVID-19 and then touch their own eyes, nose, or mouth. Care should be used while handling objects or surfaces that could be contaminated by COVID-19 instances, even if it is not believed to be the main method of transmission.

Since nitrile gloves are resistant to chemicals, including some disinfectants like chlorine, they are recommended over latex gloves. Among healthcare professionals, allergies to latex and contact allergic dermatitis are very common. If nitrile gloves are not offered, latex gloves can be used instead. Powdered gloves should be avoided at all costs.

1.1.i. Cover all/gowns

Coveralls and gowns are made to shield the torsos of medical professionals from viral exposure.

Despite the fact that coveralls normally offer 360-degree protection because they are made to cover the entire body, including the head, lower legs, and occasionally even the feet, the construction of medical/isolation gowns prevents them from doing so (e.g., possible openings in the back, coverage to the mid-calf only).

In order to protect healthcare professionals working in close proximity (within 1 metre) to suspect/confirmed COVID-19 cases or their secretions, it is possible to establish a barrier to eliminate or reduce touch and droplet exposure, both known to transmit COVID-19.

There isn't enough data to compare the effectiveness of coveralls and gowns in preventing the spread of disease to healthcare workers, so both are considered acceptable.

Gowns are simpler to put on and take off. For the duration of the health professional's time in the treatment area, an apron can also be worn over the gown. Coveralls/gowns have stringent regulations that extend from limiting exposure to biologically contaminated solid particles to safeguarding from chemical risks.

To facilitate personal protection and decontamination, shoe coverings should be constructed of impermeable fabric and worn over shoes.

1.1.j. Head protection

Typically, coveralls cover the head. When giving clinical treatment for patients, those wearing gowns should cover their head and neck with a head covering. Inside the head cover, hair and hair extensions should fit snugly.

1.1.k. Rational use of PPE

Based on the risk profile of the healthcare professional, PPEs are to be worn. The PPEs to be utilised in various contexts are described in the document.

1.1.l. Access point: Table 1.

Sr. No	Visit station.	Work.	Threat.	Suggested PPE/recommended PPE.	Remarks.
1.	Medical desk.	**Provide information to travellers**	Low risk	Triple layer medical mask Gloves	Maintaining a one-meter minimum distance is necessary.
2.	Immigration counters, the customs airport protection/ security.	**Offer services to the clients/ passenger.**	Low risk	Triple layer medical mask Gloves.	Minimum distance of one meter needs to be maintained.
3.	Holding area/ Isolation facility etc.	Interview & Clinical examination by doctors/ nurses.	Moderate Risk.	N-95 masks, Gloves.	Wear all PPE properly.
4.	Temperature recording station.	Record Temperature with hand held thermal recorder.	Low risk.	Triple layer medical mask Gloves.	Maintain the record room clean and tidy.
		Attending to severely ill passenger.	High risk	Use of full PPE kit.	When aerosol generating procedures are anticipated.
5.	Sanitary staff.	Cleaning frequently touched surfaces/ Floor/ cleaning linen.	Moderate risk.	N-95 mask, Gloves.	When aerosol generating procedures at the time of training or demonstration of safety usage or protection are

					anticipated.
6.	Administrative staff.	Providing administrative support.	No risk.	No PPE.	No interaction with COVID19 patients. They shouldn't go into certain locations. the location where suspect COVID-19 cases are handled.

1.1.m. Psychosocial support for people testing positive for COVID-19

The World Health Organisation has expressed its concern over the impact of the global pandemic on the mental health and psycho-social concerns of people. It is speculated that safety measures like self-isolation and quarantine have affected usual activities, routines and livelihood of people that may lead to increased loneliness, anxiety, depression, insomnia, harmful alcohol or drug use, and self-harm or suicidal behaviour (World Health Organisation, 2020). The lockdowns around the world have also led to an increase in domestic violence cases as victims of violence are restricted to stay in the same place as their perpetrators, with no escape. Stigma and discrimination against person(s) who have tested positive for COVID-19 is another majour source of distress for them, in addition to the already existing physical and mental health issues. A recent survey by the Indian Psychiatric Society indicated a twenty percent increase in mental illnesses in the country since the coronavirus outbreak. It is understandable that at times like this, people may be feeling afraid, worried and overwhelmed with the constantly changing alerts and media coverage regarding the spread of the virus. Psychosocial interventions are therefore important, to keep the population informed and assist them in following mental health tips and strategies to look after themselves as well as others in the community.

Psychosocial interventions refer to strategies that target excessive, uncontrollable stress, concern and persistent excessive arousal. Mental health professionals like psychologists, psychiatrists and psychiatric social workers help the patients and larger community understand the potential impact of the virus and help patients, societies and families deal with the potential threat on physical and mental health. Psychological assistance services, including telephone, internet and application-based counselling or intervention, have been widely deployed by local and national mental health institutions in a response to the COVID-19 outbreak as the availability of transparent appropriate, and timely information is vital for the emotional restraint of family members and for keeping the general population calm.

The objective of the intervention is to offer basic psychosocial support to people who have tested positive for COVID-19, through telephonic counselling / 'compassionate talking' by qualified and experienced counsellors. Such compassionate talking or counselling entails specific components of Psychosocial First Aid (PFA) such as: listening non-judgmentally; giving re-assurance and general information; and encouraging self-help and other support strategies. Being conducted from a remote place, such counselling does not entail any psychological assessment or treatment. It is not intended to fulfill the objectives of conventional psycho-social counselling such as: providing practical assistance for meeting immediate needs; helping establish social supports; and providing linkages with referral services.

The counsellors offer psychosocial support to the patients in the form of COVID-19 education and bereavement counselling as well as enabling catharsis and, inspiring hope.

1.1.n. The various types of issues which the COVID-19 people vent out to the counsellors include

1. Confusion regarding prescribed duration for isolation/quarantine,
2. Concern about testing,
3. Concern about lack of knowledge about test report result,
4. Concerns about own health, welfare of family,
5. Anger regarding quarantine,
6. Worries pertaining to what the future holds,
7. Worries about stigma and discrimination that family may face,
8. Stress of family members due to high-risk age of patient,
9. Feelings of loneliness stemming from separation from near and dear ones,
10. Worries pertaining to family members not admitted in hospital,
11. Frontline health workers not getting to meet family,
12. Lack of contact with family due to phone connectivity issues.

1.1.o. Psychological factors that motivate or promotes happiness in the people

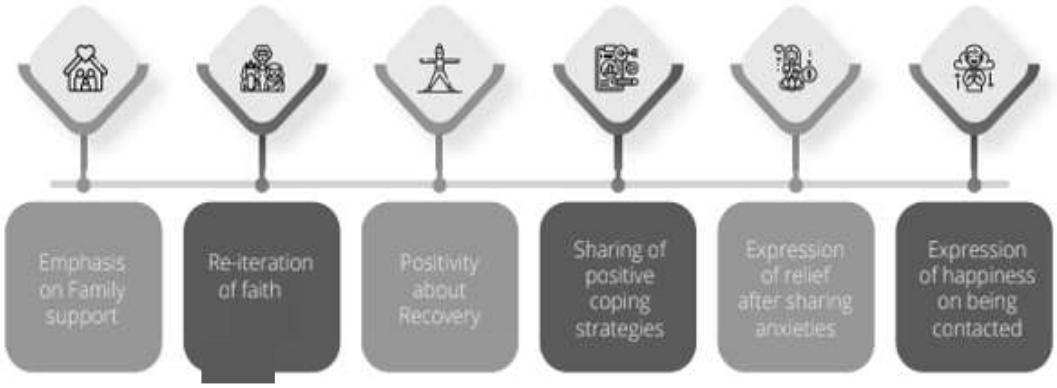


Figure 6: Psychological factors that motivate or promotes happiness in the people.

1.2. New Omicron strain have been the new danger caused by new strain named as Omicron a variant of SARS

New Omicron strain is the concern aroused due to the new variant of SARS called Omicron; the new Corona virus variant named after the Greek alphabet Omicron.

This new species of Omicron has found infecting people in several countries.

1.3. Omicron strain: WHO remarks as a 'variant of concern'

Reports study and, continuous evaluation of its transmission is the majour focus of interest in study of transmission of viruses in human.

1.4. Other highlights: Many countries have banned travelling because of the concerned threat of spread of Omicron; the new Corona virus variant.[4]

1.5. How does COVID-19 spread between people?

The SARS-CoV-2 virus, which causes the sickness, is known to spread between humans in a variety of ways.

1. Current evidence suggests that the virus spreads mainly between people who are in close contact with each other, for example at a conversational distance. The virus can spread from an infected person’s mouth or nose in small liquid particles when they cough, sneeze, speak, sing or breathe. Another person can then contract the virus when infectious particles that pass through the air are inhaled at short range (this is often called short-range aerosol or short-range airborne transmission) or if infectious particles come into direct contact with the eyes, nose, or mouth (droplet transmission).

2. The virus can also spread in poorly ventilated and/or crowded indoor settings, where people tend to spend longer periods of time. This is because aerosols can remain suspended in the air or travel farther than conversational distance (this is often called long-range aerosol or long-range airborne transmission).

3. People may also become infected when touching their eyes, nose or mouth after touching surfaces or objects that have been contaminated by the virus.

Further research is on-going to better understand the spread of the virus and which settings are most risky and why. Research is also under way to study virus variants that are emerging and why some are more transmissible. For updated information on SARS-CoV-2 variants, please read the weekly epidemiologic updates.

1.6.When do infected people transmit the virus?

Whether or not they have symptoms, infected people can be contagious and the virus can spread from them to other people.

Laboratory data suggests that infected people appear to be most infectious just before they develop symptoms (namely 2 days before they develop symptoms) and, early in their illness. People who develop severe disease can be infectious for longer time period.

While it is possible for someone who has never developed symptoms to transfer the virus on to others, it is unclear how often this happens, and more research is needed in this area.

1.7. What is the difference between people who are asymptomatic or pre-symptomatic?

1.7.a. Don't they both mean someone without symptoms?

Both terms refer to people who do not have symptoms. The difference is that 'asymptomatic' refers to people who are infected but never develop any symptoms, while 'pre-symptomatic' refers to infected people who have not yet developed symptoms but go on to develop symptoms later.

1.8.Are there certain settings where COVID-19 can spread more easily?

Yes, any situation in which people are in close proximity to one another for long periods of time increases the risk of transmission. Indoor locations, especially settings where there is poor ventilation, are riskier than outdoor locations. Activities where more particles are

expelled from the mouth, such as singing or breathing heavily during exercise, also increase the risk of transmission.

1.8.1.The "Three C's" are a helpful method to consider this. They outline conditions that make it easier for the COVID-19 virus to spread

I. Crowded places;
II. Close-contact settings, especially where people have conversations very near each other;
III. Confined and enclosed spaces with poor ventilation.

The risk of COVID-19 spreading is especially high in places where these "3Cs" overlap.

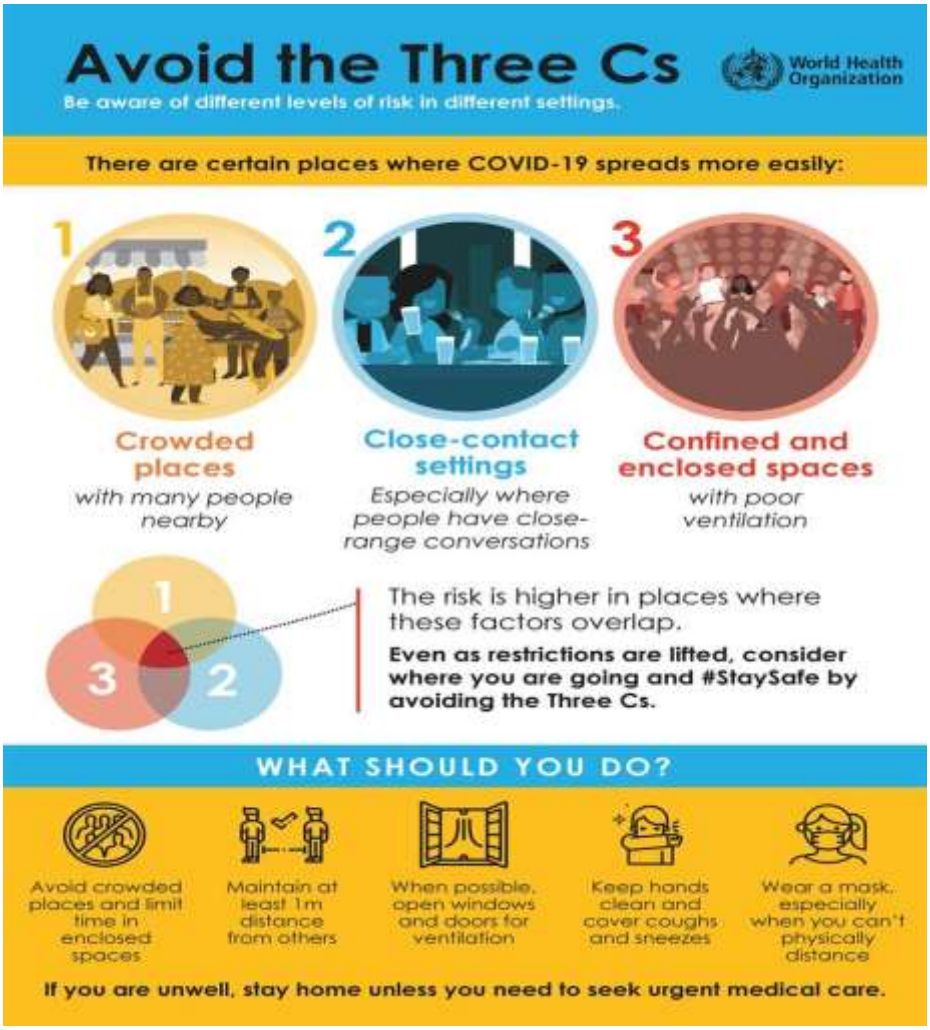


Figure 7: Pictographic understanding of safety procedures on COVID-19.

1.9. General questions

1.9.1. How can I reduce my risk of getting COVID-19?

There are many things you can do to keep yourself and your loved ones safe from COVID-19.

1.9.2. Know your risks to lower risks.

1.9.2.a. Follow these basic precautions

I. **Follow local guidance:** Check to see what national, regional and local authorities are advising so you have the most relevant information for where you are.

II. **Keep your distance:** Stay at least 1 metre away from others, even if they don't appear to be sick, since people can have the virus without having symptoms.

III. **Wear a mask:** Wear a well-fitting three-layer mask, especially when you can't physically distance, or if you're indoors. Clean your hands before putting on and taking off a mask. Wear mask carefully. Avoid crowded places, poorly ventilated, indoor locations and avoid prolonged contact with others. Spend more time indoors than outdoors.

IV. **Ventilation is important:** Open windows when indoors to increase the amount of outdoor air. Avoid touching surfaces, especially in public settings or health facilities, in case people infected with COVID-19 have touched them. Clean surfaces regularly with standard disinfectants safe for skin and alcohol free. Frequently clean your hands with soap and water, or an alcohol-based hand rub. If you can, carry alcohol-based rub with you and use it often. Cover your coughs and sneezes with a bent elbow or tissue, throwing used tissues into a closed bin right away. Then wash your hands or use an alcohol-based hand rub.[8]

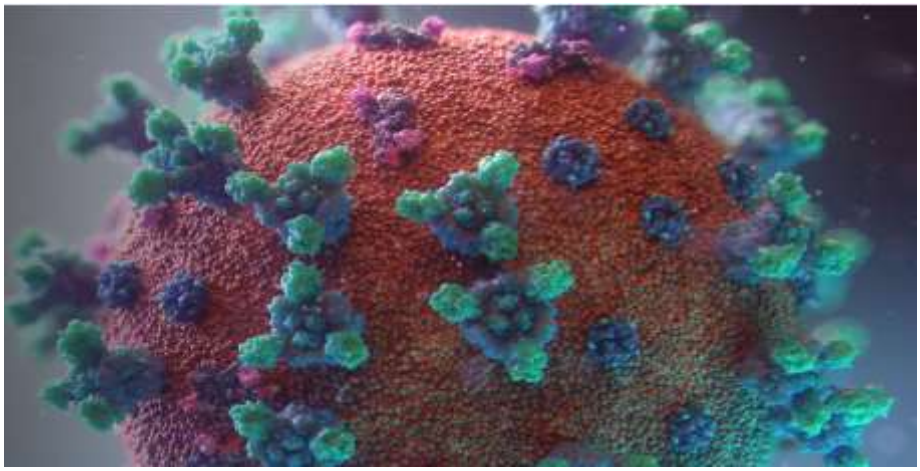


Figure 8: Image of SARS-CoV-II pandemic.

1.10. Some type of case discussion during quarantine period

1.10.1. Feeling vulnerable: anonymous COVID case study

1.10.2. Psychological stress dealing is one majour impact noted

1.10.3. The impact of COVID-19 has elevated stress and fear levels for many of the people we support

a. For one person this has made her more anxious and has affected every aspect of her day to day living.

She has struggled, with loneliness, unable to cope or express her emotions and she has felt very isolated.

During quarantine, she has found it difficult not having a normal routine or being able to attend her day services. She has felt very frustrated.

At first, she struggled to understand the COVID-19 outbreak.

She feared that she would die. She has felt extremely vulnerable and found that watching social media/tv footage about the impact of COVID-19 had a negative impact on her anxiety.

Unfortunately, her (external) day services have not been able to be supportive during this time. Contact calls from them to her have not been regular enough for her.

Also there has been very limited contact with family/relatives.

This has clearly affected her mental health and she has not been able to control or express her emotions.

She has struggled on a daily basis with negative moods and the lack of motivation.

As lockdown has started to ease, she has expressed her nervousness regarding going out and about and carrying out small tasks.

For the past few months, we have supported her to carry out her weekly food shopping. Her confidence is not what it was and she has become more unsettled whilst out of the house.

She currently still does not attend her day service but she has had daily support at her home to take part in a number of activities including baking, crafts and activities. Some days she is

better motivated than others. On days when she has no motivation, she likes to watch YouTube videos on her tablet.

Throughout lockdown the Minstead Trust support team have worked extremely hard to keep her stimulated, positive and with a structured daily routine.[1]

b. Jay attends minstead trust's day opportunities centre in portsmouth

Since the Covid-19 pandemic began, Jay has found it very difficult being unable to attend his job and missed many of his community activities like coffee with his dad. Here he tells us his story.

'I have worked at the John Pounds Centre in Portsmouth for 15 years, helping out, doing the bins and litter picking. I couldn't do it during the lockdowns and it made me feel very isolated from friends and family. I am still not able to do it. I really miss meeting new people there as well as the staff, who are great to work with.

'I didn't like being stuck at home in the lockdowns, it was so bad.

'Now things are a bit better I like going for a coffee at Costa. Having a coffee with my dad is great to chill out and spend time with him as he has done a lot for me.

'If I had more support I'd like to go out and watch the football on the TV, I'm a Newcastle supporter, they have lots of money now!'[2]

c. Robert attends minstead trust's new forest day opportunities and community theatre group at Hanger Farm Arts centre

He is an outgoing and chatty member of the trust's community and also revels in getting out and about in the wider community to meet new people and have new experiences. Here he tells us his lockdown experience and how he feels he can flourish in the future, with your support.

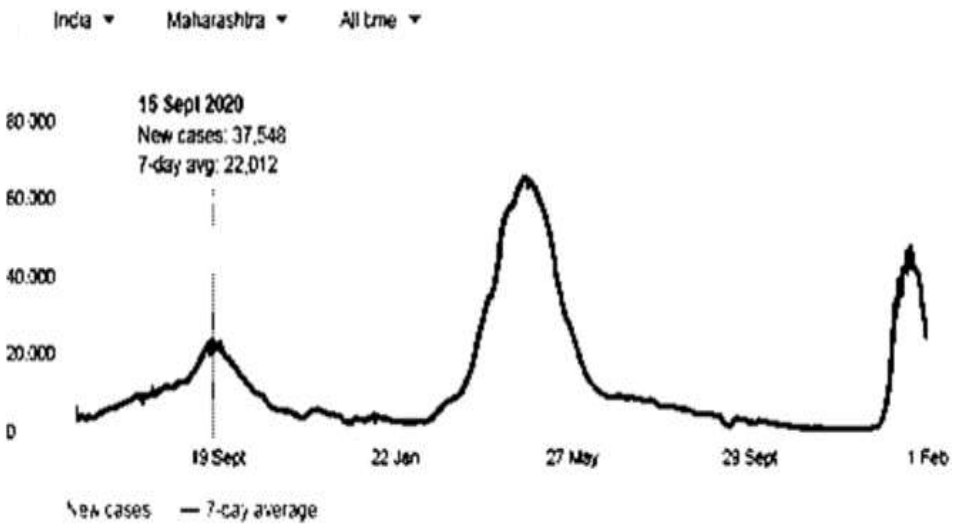
'I found the [COVID-19] lockdowns really hard – the restrictions were so difficult.
'It was very depressing.
'I missed being my friends, having a laugh with them and doing things out and about.

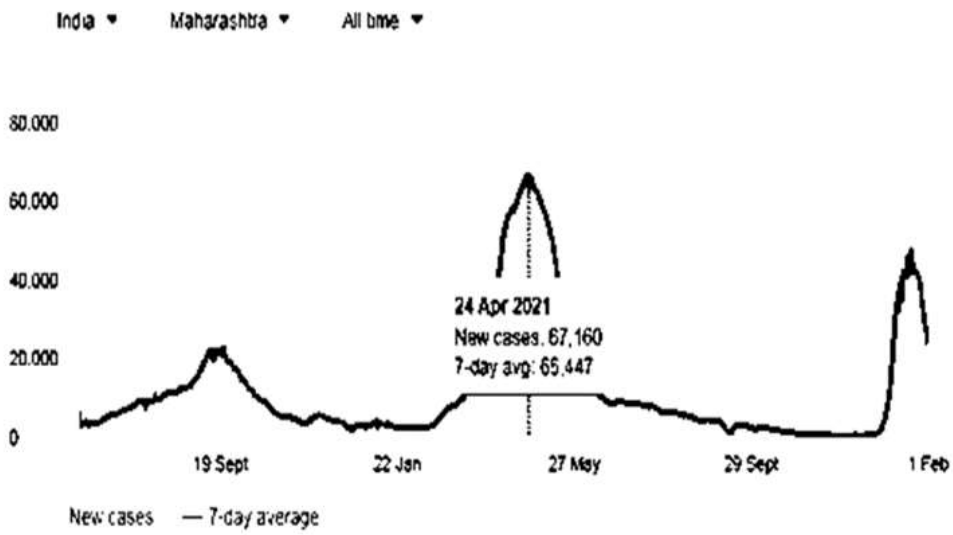
'Now things are a bit better minstead Trust have helped me get back to the community theatre at Hanger Farm. I really enjoy it because I get to be with other people – I'm a very friendly person.

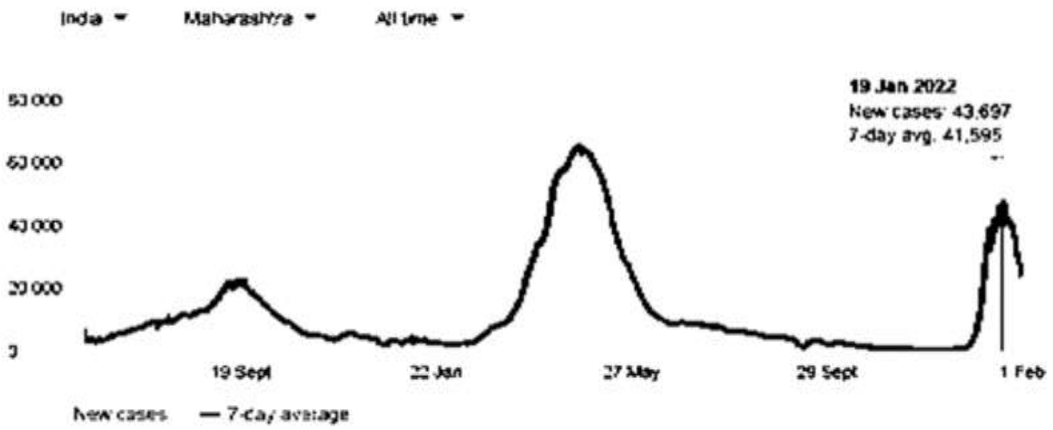
'I am very frustrated when I can't do what I want to do out and about in the community.[3]

Health workers who need **masks, COVID-19 test kits, and disinfectant** to save lives and stay safe are at great demand along with medications. To check with the effective treatment of the medication, effectiveness of accessories like use of mask, COVID-19 test kit and disinfectant can prove its effectivity to prevent COVID infections.

1.11. Some peak cases reported in a specific region; and along with the worldwide data.[6]







Statistics

Cases Vaccines

Location	Total cases	New cases (1 day*)	New cases (last 60 days)	Cases per 1 million people	Deaths
Worldwide	38,16,83,860	33,52,849		49,086	56,88,629
India	4,16,30,885	1,61,386		30,599	4,97,975
Maharashtra	**77,35,481**	**14,372**		**67,746**	**1,42,705**

*The number of new cases reported for the most recent day of complete data, within the last three days

Statistics

Cases Vaccines

Location	Total doses given	New doses given (1 day*)	New doses given (60 days)	People fully vaccinated	% of population fully vaccinated
Worldwide	10,10,29,04,922	1,72,65,317		4,16,09,10,585	53.5%
India	1,66,47,86,038	74,23,888		70,99,26,447	52.2%
Maharashtra	*No data*	*No data*		*No data*	*No data*

*The number of new vaccine doses reported for the most recent day of complete data, within the last three days

[7]

Figure 9: Graph of the statistics measure of the coronavirus cases.

1.12. Challenges in pharmacovigilance

Pharmacovigilance focuses on drug quality, medication errors and, adverse drug reactions which impact the health care system by affecting a significant patient population.

WHO defines pharmacovigilance as "the science and activities relating to the detection, assessment, understanding, and prevention of adverse drug effects or any other medicine-related problem that can impact life."

Significantly, pharmacovigilance is regarded as the constant process of identifying the safe use of pharmaceutical products and helps in minimising the risk of any harm that may come to patients. Pharma Companies must conduct a comprehensive drug safety and pharmacovigilance audit to assess their compliance with worldwide laws, regulations, and **FDA** guidance.

1.13. Below are a few challenges to pharmacovigilance

1.13.1. Inconsistent reporting of adverse events

The occurrence of an adverse event is not always during a visit to the healthcare centre. It can occur after several hours of administering the drug. Patients fail to remember all the relevant information about the adverse events and are not able to report it accurately.

Patients are anxious and report all their discomfort as adverse events. Adverse drug events (ADE) reported are not always serious and may be symptoms of a disease but in some cases can turn out to be serious and fatal to life. Other incidents where a patient has had side effects caused by concomitant medicines taken along with the study drug which could be reported as

adverse events. Such reporting can lead to drug safety committees to come to conclusions which in turn lead to the suspension or withdrawal of the drugs from market.

The Adverse drug event study by Tufts University in Sep. 2015 indicates the following:
40% of HCP's have never reported an ADE.

60% of HCP's report it is difficult to determine if the drug has caused the ADE.

1.14. Challenges in spontaneous reporting[10]

Adverse events can be reported voluntarily by the patient, companies, or the HCP. The majour drawback of the system is the under-reporting of adverse events to the post-marketing databases surveillance. The medical staff does not prioritise reporting and may neglect symptoms that are not serious.

Data analysis may produce more signals than that can be analysed from the available resources. The adverse event workload has been rising to more than 50% yearly in a few companies. This might delay the focus on potential serious adverse events requiring immediate action.

Another concern is the misreporting and miscoding of adverse events. The fields in reports about dosage, formulation type, time and length of exposure to adverse events are not clearly reported and coded leading to challenges in managing and analysing the data.

This also leads to the generation of false alarms for non-existent adverse events. HCP's generally select treatments based on their own practice preferences; also, the inadequately adjusted algorithms could produce errant false signals. Inadequate analysis of such signals may lead to early refusal of useful drugs.

1.15. Priority of efficacy over safety

Smaller drug companies may prioritise efficacy over safety in clinical trials leading to a compromise in drug quality. The signal detection is not utilised by few sponsors to detect and effectively solve the issues in a timely manner. Drug development relies on balancing efficacy and safety equally.

1.16. Limitations in published case reports

Reports in medical journals about the suspected adverse effects are an established way to alert about drug hazards. These reports are one of the signal generating reports easily accessible by the general population.

1.17. Limitations in these include

A small number of cases are published.

Reports are poorly documented.

Delay in occurrence and publication of adverse events.

Analysis of electronic health records, (EHR).

EHR provides a great wealth of information about real time and real-world medication usage. A few limitations include the unstructured narrative information that is complicated to analyse. There may be few cases in EHR to analyse a particular drug but more number of cases are required to generate a signal. Another challenge is the lack of access to medical records due to patient privacy systems.

1.18. System integration

Integration between the various systems such as the clinical trial management system (CTMS), clinical data management system (CDMS), product performance system, clinical coding application and, CRO systems is important for total data analysis. Standardising the medical domains, adverse events and, medical coding ensure quality in study analysis. Standardisation is a challenge as there is no standard framework to allow system integration. Though the default file format XML is agreed it is not implemented. Thus, clinical data is collected by the current sponsor in separate EDC or via paper-based case report forms.

Apart from the limitations listed above one of the majour roadblocks for conducting effective PV is the increasing amount of unstructured information originating from several patient sources.

The complexity in pharmacovigilance services is leading to outsourcing of PV as a whole or part of it. Pharma industry is still leveraging 10+ years old legacy systems to monitor safety and drug misuse in case of patient safety and risk assessment. The technical advancement such as Cloud-based solutions, mobile health devices, artificial intelligence, blockchain, and,

machine learning will not only improve the effectiveness of PV but also helps improve the efficacy of drug delivery and improved patient compliances.

1.19. Unapproved drugs[9]

Unapproved prescription drugs pose significant risks to patients because they have not been reviewed by FDA for safety, effectiveness or quality. Without FDA review, there is no way to know if these drugs are safe and effective for their intended use, whether they are manufactured in a way that ensures consistent drug quality or whether their label is complete and accurate. Unapproved drugs have resulted in patient harm, and the agency works to protect patients from the risks posed by these drugs.

1.20. Preserving patient access to medically necessary drugs

The agency balances its goal to eliminate unapproved prescription drugs from the market with patient access to medically necessary drugs. FDA carefully considers the possible effects on patient access, including whether any action would likely lead to a disruption in the drug supply, before initiating an action against an unapproved drug.

The agency permits some unapproved drugs to be marketed if they are relied on by health care professionals to treat serious medical conditions when there is no FDA-approved drug to treat the condition or there is insufficient supply of FDA-approved drugs.

1.21. FDA permits some unapproved prescription drugs to be marketed if

1. The drug is subject to an open drug efficacy study implementation (DESI) program proceeding,
2. Health care professionals rely on the drug to treat serious medical conditions when there is no FDA-approved drug to treat the condition,
3. There is insufficient supply of an FDA-approved drug.

The law allows some unapproved prescription drugs to be lawfully marketed if they meet the criteria of generally recognised as safe and effective (GRASE) or grandfathered. However, no such drugs are recognised by the agency that are being grandfathered.

Drugs marketed in the U.S., with or without FDA approval, can be identified in the following databases:

National Drug Code (NDC) Directory publishes data derived from information submitted to the agency as part of drug listing requirements, including information on unapproved drugs.

NDC numbers are provided for all listed drugs, regardless of approval status. Information in the directory does not indicate that FDA has verified the information provided.

Drugs@FDA lists information on FDA-approved drugs since 1998, including patient information, labels and approval letters.

Orange Book identifies FDA approved drugs.

2. CASE STUDY

COVID-19 study report preparation is an academic project that tracks real-time coronavirus statistics. The team uses various data collection methods and exposes data of varying nature. This case study uses data that were collected using daily Facebook surveys information with the aim of examining the possible correlation between wearing a face-mask and showing symptoms like those of SARS-CoV-2—hereinafter COVID.

2.1. During the study and observation

2.2. Specifically, three types of data are recorded

1. Does the person regularly wear a face mask?
2. Does the person have COVID-like symptoms?
3. Does the person know someone in their community who has COVID-like symptoms?

Table 2: Tracks of Real-Time Coronavirus Statistics.

1. Does the person regularly wear a face mask?	𝍸 𝍸 𝍸
2. Does the person have COVID-like symptoms?	Yes.
3. Does the person know someone in their community who has COVID-like symptoms?	𝍸

Table 3: Patient Medication Record, Patient Case Form.

Case discussion:		**Date: 1-Feb-2022.**
Patient meta data:		
Name:	**1st name:** S.	**Last name:** S.
Sex: Female.	**Weight:** 70 Kg.	**Age:** 30 years.
		Marital status: Married.
Habits:	**Smoking cigarette:** No.	**Drinking Alcohol beverages:** No.
Chewing tobacco: No.	**Snuff:** No.	Premedication history: None in last 3 months.
Ongoing medication: None.	**Diabetes:** No.	**Other medical condition:** No.
Prior report of adverse medical case: No.		

Diagnosis: COVID-19.	R_x.	1. Doxycycline.
	2. Zifi.	3. One anticoagulant tablet.
	4. Vit C, Vit. B complex.	5. Dolo.
6. Antiemetic.	7. Cough syrups.	**Doctor**: XYZ Beezx.

2.3. CASE REPORT

This case report outlines the presentation, diagnosis, and management of a 30-year-old married female with symptoms consistent with COVID-19. Close monitoring and appropriate medical care are crucial for the patient's recovery and to prevent further transmission of the virus.

Narrative: A 30-year-old married female reported of sudden symptoms of being having feeling of body ache, with high fever along with the rising and falling body temperature with symptoms of cough and cold. Chills and fever. She was previously diagnosed with cold but later she was diagnosed with the COVID-19, SARS-CoV; as the symptoms persist and lasted for long. She was asked to be on medication and, quarantine for 7 days by the doctor.

Case report form

Patient information

Name: Patient's name: Mrs. XX.

Age: 30 years

Gender: Female

Marital status: Married

Chief complaint

The patient presented with sudden onset of symptoms including: body ache, high fever with fluctuating body temperature, cough, and cold. Additionally, she experienced chills and fever.

History of present illness

The patient reported feeling unwell with symptoms resembling a common cold initially. However, as the symptoms persisted and intensified, she sought medical attention. Upon examination, she was suspected to have contracted COVID-19, specifically the SARS-CoV-2 virus.

Past medical history

The patient had no significant medical history except for occasional episodes of common cold.

Medications

Upon diagnosis of COVID-19, the patient was prescribed medication to alleviate symptoms and manage the viral infection. The specifics of the medication regimen are as per the treating physician's discretion.

Management

The patient was advised to quarantine for 7 days to prevent further spread of the virus. She was also instructed to monitor her symptoms closely and seek medical attention if they worsen or if any new symptoms develop.

Follow-Up

The patient will be scheduled for a follow-up appointment to assess her condition post-quarantine and ensure resolution of symptoms. Further recommendations for post-COVID care will be provided as necessary.

Table 2: Onset of symptoms and related medical information.

Date	Symptoms	Treatment
1.Feb.2022	Body ache, fever	Symptomatic relief
1.Feb.2022	Cough, cold	Symptomatic relief
1.Feb.2022	Chills, fluctuating fever	Symptomatic relief
1.Feb.2022	Diagnosis confirmed: COVID-19 (SARS-CoV-2)	Quarantine, medication
1.Feb.2022	Ongoing monitoring of symptoms	Follow-up scheduled

2.4. Medications

2.4.1. She was prescribed with following medications

2.4.2. Medication

1. Doxycycline.
2. Zifi.
3. One anticoagulant tablet.
4. Vit C, Vit. B complex.
5. Dolo.
6. Antiemetic’s.
7. Cough syrup.

Other: Quarantine for a specific time period until told.

Medications prescribed

1. Doxycycline

Dosage: As per physician's prescription.

Purpose: Doxycycline is an antibiotic commonly used to treat bacterial infections. In the context of COVID-19, it may be prescribed to prevent or treat secondary bacterial infections that can occur due to the weakened immune system or prolonged illness.

2. Zifi

Dosage: As per physician's prescription.

Purpose: Zifi is another antibiotic medication used to treat bacterial infections. Similar to Doxycycline, it may be prescribed to prevent or treat secondary bacterial infections associated with COVID-19.

3. One Anticoagulant tablet

Specific name and dosage: The specific anticoagulant tablet and dosage were not provided. It is important to follow the physician's instructions regarding the type and dosage of the anticoagulant prescribed.

Purpose: Anticoagulant medications are prescribed to prevent the formation of blood clots, which can be a complication of COVID-19 due to the hypercoagulable state associated with the illness. Preventing blood clots reduces the risk of serious complications such as deep vein thrombosis (DVT) or pulmonary embolism.

4. Vitamin C, Vitamin B complex

Dosage: As per physician's prescription.

Purpose: Vitamin C and Vitamin B complex supplements may be prescribed to support the immune system and promote overall health during illness. Vitamin C is known for its antioxidant properties and its role in immune function, while Vitamin B complex helps in energy production and supports the nervous system.

5. Dolo

Dosage: As per physician's prescription.

Purpose: Dolo is a brand name for the medication containing paracetamol (acetaminophen). It is commonly used to reduce fever and relieve mild to moderate pain associated with

conditions such as headache, muscle aches, and toothaches. In the context of COVID-19, it may be prescribed to alleviate fever and body aches.

6. Antiemetics

Specific name and dosage: The specific antiemetic medication was not provided. Antiemetics are drugs used to control nausea and vomiting.

Purpose: Antiemetics may be prescribed to alleviate nausea and vomiting, which can occur as symptoms of COVID-19 or as side effects of other medications prescribed for symptom management.

7. Cough syrup

Specific name and dosage: The specific cough syrup was not provided.

Purpose: Cough syrup is used to relieve cough symptoms associated with respiratory infections, including COVID-19. Depending on the formulation, it may contain ingredients such as expectorants, cough suppressants, or mucolytics to help loosen mucus and ease coughing.

Other instructions

Quarantine: The patient was advised to quarantine for a specific time period until instructed otherwise. Quarantine helps prevent the spread of the virus to others in the community and allows the patient to recover without putting others at risk of infection. The specific duration of quarantine may vary depending on guidelines from health authorities and the patient's clinical condition.

2.4.3. Details of each prescribed medications: Studying the brand details

Examining the specifics of each prescribed medication, we focused into the brand particulars.

A. Dolo-650 Tablet 15's

i. Manufacturer: MICRO LABS LTD.

ii. Composition: PARACETAMOL-650MG.

iii. Consume type: ORAL.

Dolo-650 Tablet 15's belongs to the group of mild analgesics (pain killer), and antipyretic (fever-reducing agent) used to treat mild to moderate pain including headache, migraine, toothache, menstrual period pain, osteoarthritis pain, musculoskeletal pain, and reducing

fever. Pain and fever are caused by the activation of pain receptors due to the release of certain natural chemicals in our body like prostaglandin.

Dolo-650 Tablet 15's contains 'Paracetamol' which prevents the release of a natural chemical (prostaglandin), causing a sensation of pain, inflammation, and fever. Dolo-650 Tablet 15's also has an antipyretic effect and can reduce body temperature in cases of fever. Dolo-650 Tablet 15's works by resetting the temperature-regulating centre in the brain, thus decreasing temperature in fevers caused due to illness, chemotherapy, or other reasons.

Dolo-650 Tablet 15's is available as an over-the-counter medication. However, it is always recommended to use it after consulting a doctor. The dose and duration of the medication depend on your condition and its severity. The common side effects of Dolo-650 Tablet 15's include agitation, nervousness, and insomnia. Everyone needs not experience the above side effects as they vary depending on their health, underlying conditions, age, weight and gender. In case of any discomfort, speak with a doctor.

Before starting Dolo-650 Tablet 15's, please inform your doctor if you have any known allergy to paracetamol, heart, kidney or liver problems, or persistent headaches. And also, if prescribed by your doctor, ask if the medication is safe to use during pregnancy and breastfeeding.

Thus, Dolo-650 Tablet 15's, categorised as a mild analgesic and antipyretic, serves to alleviate mild to moderate pain and reduce fever. Its applications span from addressing headaches, migraines, toothaches, menstrual cramps, osteoarthritis pain, and musculoskeletal discomfort. The mechanism involves the inhibition of prostaglandin release, thus mitigating pain, inflammation, and fever. Further, it acts as an antipyretic by modulating the brain's temperature-regulating centre, effectively lowering body temperature in feverish conditions induced by illness or other factors like chemotherapy. While Dolo-650 Tablet 15's is available over-the-counter, prudent usage after consulting a healthcare professional is advised, with dosage and duration contingent upon individual condition severity. Possible side effects, such as: agitation, nervousness, and insomnia, may vary based on factors like: health status, age, weight, and gender. Precautionary measures include informing the doctor of allergies to paracetamol, as well as pre-existing heart, kidney, or liver issues, and persistent headaches before commencing medication. Additionally, consultation is recommended for its safety during pregnancy and breastfeeding.

B. Uses of Dolo-650 Tablet 15's

Fever, pain relief: medicinal benefits

Dolo-650 Tablet 15's contains 'paracetamol' which is a mild analgesic and fever reducer. Dolo-650 Tablet 15's can also be used to treat mild to moderate pain in conditions of headache, toothache, backache, period pain, and muscle pain. It has less gastric irritating properties compared to other pain killers like aspirin and ibuprofen. It is the drug of the first choice for reducing fever suitable for all age groups (from children of 2 months to the elderly).

iv. Directions for use

Swallow the tablet whole with a glass of water before or after the meals. It is recommended to take a tablet after food to avoid any gastrointestinal irritation. Do not chew, crush, or break it. If you cannot swallow the tablet as a whole, you may break the pill into half and take both halves one at a time. Space the doses evenly, and take it at a fixed time for better results.

v. Storage

Store in a cool and dry place away from sunlight.

vi. Side effects of Dolo-650 tablet 15's

Most of the side effects of Dolo-650 Tablet 15's do not require medical attention and gradually resolve over time. However, if the side effects are persistent, reach out to a doctor. Some common side effects of Dolo-650 Tablet 15's are liver damage, skin rashes, increased heartbeat, low platelets, and low white blood cells. Some may experience allergic skin reactions like peeling and blistering of the skin. Inform your doctor if you are allergic to paracetamol, or any other ingredients. Everyone may not experience these side-effects.

B. Doxycycline

Doxycycline belongs to a group of medications called tetracycline antibiotics, used to treat bacterial infections. DOXYCYCLINE treats urinary tract infections, intestinal infections, respiratory infections, eye infections, sexually transmitted infections (like gonorrhoea, syphilis), gum infections, and diseases (like periodontitis), and others. Besides this, DOXYCYCLINE also treats acne-like lesions caused by rosacea. However, it does not treat facial redness caused by rosacea.

DOXYCYCLINE being an antibiotic prevents the growth of bacterial cells (the bad ones!) by preventing the formation of the outer protein layer of bacteria (cell wall) responsible for bacteria's growth and multiplication. It is a broad-spectrum antibiotic, i.e., it acts against a wide variety of bacteria. It is a bacteriostatic antibiotic i.e.; it stops the growth of bacteria but necessarily does not kill them.

DOXYCYCLINE should only be taken if advised by your doctor. It can be taken with or without food but should be consumed at a fixed time for the best results. The course of DOXYCYCLINE should be completed as prescribed by your doctor for better results. Some common side effects of DOXYCYCLINE are nausea (feeling or being sick), vomiting, diarrhoea etc. Please consult your doctor if these side effects become troublesome.

DOXYCYCLINE is pregnancy category D (high risk) medicines so its use in pregnant and nursing mother is not recommended. Use of DOXYCYCLINE during tooth development (last half of pregnancy, infancy, and childhood up to the age of 8 years) may cause staining of teeth (yellow-grey-brown). Do not consume alcohol as it may cause excessive drowsiness when taken along with DOXYCYCLINE. Before using DOXYCYCLINE tell your doctor if you ever had an allergy to DOXYCYCLINE, have kidney problems, liver problems, swollen food pipe (esophagitis) or muscle disease (myasthenia gravis). Do not drink alcohol with DOXYCYCLINE as it may increase the unpleasant side effects like drowsiness and dizziness.

Uses of DOXYCYCLINE
Bacterial infections.

i. Directions for use

Take DOXYCYCLINE as advised by your doctor. Preferably take it empty stomach. Swallow it as a whole with plenty of water, do not chew or crush it. If gastric irritation or stomach upset becomes troublesome, you may take it with meals and speak with your doctor regarding use of an antacid. Do not consume dairy products like milk, cheese, yogurt etc with DOXYCYCLINE as it decreases its absorption from the stomach.

ii. Storage

Store in a cool and dry place away from sunlight.

iii. Side effects of DOXYCYCLINE

Every medicine has got some side effects. DOXYCYCLINE also has some side effects which may occur in the early days of the treatment, but get better after some time. Common side effects of DOXYCYCLINE include nausea (feeling sick), vomiting, diarrhoea. These side effects are temporary and may resolve over time. If these side effects are persistent or are troublesome, speak with your doctor.

iv. Drug interactions

vi.i. Drug-drug interaction: DOXYCYCLINE is contraindicated in persons who have shown hypersensitivity to any of the tetracycline or penicillin, retinoid medications taken by mouth (such as acitretin, isotretinoin), blood thinners (such as warfarin), heart disease medicine (digoxin), anti-seizure medications (such as phenytoin, carbamazepine), antacids (especially those containing aluminium, calcium, or magnesium, bismuth subsalicylate), iron supplements, and oral birth control pills.

vi.ii. Drug-food interaction: Food containing calcium, iron should be avoided within 2 hours of DOXYCYCLINE as it may affect DOXYCYCLINE effectiveness. Avoid alcohol intake as it may lead to drowsiness and effect DOXYCYCLINE absorption.

vi.iii. Drug-Disease Interaction: DOXYCYCLINE should not be given to people with kidney problems, liver problems, swollen food pipe (esophagitis), lupus disease (an autoimmune disease), muscle disease (myasthenia gravis).

v. Safety Advice

v.i. Do not consume when

Drunked with alcohol, pregnant, breast feeding, driving, histrory of dignosed liver problems, kidney problems.

vi. Special advise

DOXYCYCLINE is preferably taken empty stomach or 1-2 hours before meals but it can lead to stomach upset. To avoid this, you may take DOXYCYCLINE with meals but ensure you drink plenty of water to keep yourself hydrated.

To prevent throat irritation, take DOXYCYCLINE in an upright position. Do not lie down for at least 30 minutes of taking it.

Even if you feel better after taking DOXYCYCLINE, do not stop taking it until your doctor says so. This might cause the symptoms to reappear and will make the infection difficult to treat due to antibiotic resistance.

DOXYCYCLINE can affect growing teeth, so it should be avoided during pregnancy and in children less than 8 years old.

DOXYCYCLINE should not be consumed beyond its expiry date as after that it breaks down into harmful chemicals which can damage the kidney.

Make sure you drink plenty of fluids when you are sick. This will in general help you clear out the infection faster, protect you from dehydration, and will help you overcome some unpleasant side effects of taking DOXYCYCLINE.

Wear sunglasses and sunscreen when you go out in the sun as DOXYCYCLINE can make your skin sensitive to light.

C.Zifi

Zifi 200mg Tablet 10's.

i. Manufacturer

FDC LTD.

ii. Composition

CEFIXIME-200MG.

iii. Consume type

Oral.

Zifi 200mg Tablet 10's

Zifi 200mg Tablet 10's is a cephalosporin-type antibiotic primarily taken to treat various types of bacterial infections of the ears, lungs, and urinary tract. Infectious or harmful bacteria can make you sick and reproduce quickly in your body. These harmful bacteria produce chemicals known as toxins, which can damage tissue and make you sick.

Zifi 200mg Tablet 10's kills the bacterial cell by blocking the chemical (mucopeptides) released by the outer layer (cell wall) of the bacteria. In turn, Zifi 200mg Tablet 10's weakens and destroys the bacterial cell wall. It is a broad range of antibiotic that helps in fighting various types of bacteria. Zifi 200mg Tablet 10's will not work for colds, flu, or other viral infections.

Zifi 200mg Tablet 10's should be taken as prescribed by your doctor, preferably with a meal to avoid stomach upset and at fixed intervals every day for best results. The dose of Zifi 200mg Tablet 10's can vary depending upon your condition and severity of the infection. Also, it is recommended to complete the course of medicine even if you feel better as it is an antibiotic, and leaving it in between may lead to even severe infection that will in fact stop responding to the antibiotic as well (antibiotic resistance). The common side effects of Zifi 200mg Tablet 10's include diarrhoea, nausea, loose stools, abdominal pain, dyspepsia (Indigestion), and vomiting. Everyone need not experience the above side effects. In case of any discomfort, speak with a doctor if you notice any sudden wheeziness, tightness in the chest or throat, difficulty in breathing, swelling of the eyelids, face or lips, rash or itching (especially affecting your whole body) STOP TAKING your medicine and go to a doctor immediately.

Before starting Zifi 200mg Tablet 10's, please inform your doctor if you have any allergy (against any antibiotic), kidney or liver problems. Do not take Zifi 200mg Tablet 10's on your own as self-medication may lead to antibiotic-resistance in which antibiotics fail to act against specific bacterial infections. If you are pregnant or breast-feeding, think you may be pregnant or are planning to have a baby, ask your doctor for advice before taking Zifi 200mg Tablet 10's. As far as it is known, Zifi 200mg Tablet 10's may be used in pregnancy. Consideration should be given to discontinuing nursing temporarily during treatment with cefixime.

Uses of Zifi 200mg Tablet 10's

Urinary tract infections, upper respiratory tract infections (URTI), lower respiratory tract infection, gonorrhoea (cervical/urethral), Ear infections (acute otitis media), pharyngitis (inflammation of the pharynx) and tonsillitis (inflammation of the tonsils).

iv. Medicinal benefits

Zifi 200mg Tablet 10's is a short-term medication for a wide range of bacterial infections. It prevents the growth of bacteria by stopping the formation of protective covering which is vital for its growth. It prevents and treats bacterial infections like Urinary tract infections, upper respiratory tract infections (URTI), lower respiratory tract infection. Ear infections (acute otitis media), pharyngitis (inflammation of the pharynx) and tonsillitis (inflammation of the tonsils). Besides this, it also helps in the prevention of infection following burns, surgery or dental procedure, sexually transmitted infections, bone infections or scarlet fever (bacterial illness with strep throat).

v. Directions for use

It's always recommended to follow the instructions of your doctor.

Side Effects of Zifi 200mg Tablet 10's

Like all medicines, Zifi 200mg Tablet 10's can also cause side-effects, although not everybody experiences them. A most common side effect of Zifi 200mg Tablet 10's is diarrhoea, nausea, loose stools, abdominal pain, dyspepsia (Indigestion), and vomiting. Most of the side effects of Zifi 200mg Tablet 10's do not require medical attention and gradually resolve over time. However, if the side effects are persistent, reach out to your doctor. Besides this, If you experience any sudden wheeziness, tightness in the chest or throat, difficulty in breathing, swelling of the eyelids, face or lips, rash or itching (especially affecting your whole body) STOP TAKING your medicine and go to a doctor immediately.

vi. Reported side effects by patient: None.

vii. Outcome: Patient recovered from the condition and was found healthy after the complete treatment was done.

3. DISCUSSIONS

It is more common to people get diagnosed with COVID-19, SARS-CoV as it's an epidemic disease which had also lead to a pandemic condition. Diagnosing with SARS-CoV is more challenging because of its certain way of causing a patient ill in a sever to acute way but leading to death in cases diagnosed with severe SARS infection. Clinically it is challenging to treat patient with SARS due to increased rate of spreading amongst population therefore the

treatment has been very crucial in cases diagnosed with SARS. Proper ventilation methods along with PPE kits have been effective for HCPs to provide proper services.

4. CONCLUSION

Scientists are researching virus transmission pathways in attempt to build effective mitigation techniques, under the tremendous strain brought on by the epidemic. From this meta-analysis, we could study about SARS-CoV diseases or infections very clearly. Due to its high recurrence rate of SARS-CoV, the patients are quarantine, special mask systems can save the population around the patient to keep getting infected with SARS-CoV. The patient study report suggests her to be benefiting from the prescribed medications. Use of triple layer of mask can protect other healthy persons from being infected from the SARS-CoV. **Psychological stress dealing is one majour impact noted in patients diagnosed with COVID and, with those have been social distanced or self-quarantine. This is due to the fear in the patient of loosing lives, family etc.** The pharmacovigilance aspect of the recovery have state of the patient have been meet, there have been no causality due to medication, or due the adverse event of any of the prescribed medications. There have been causality report or ADR in patient. The drug-drug interaction has been a majour concern which have been not an issue as per the patient concern was taken. The recover complete in time period of one month and did not have a recurring symptom of SARS observed. Behaviour of a patient is very much required in case of SARS-CoV-2 transmission in a heavily populated city is where close contact with people occurs randomly; like transport services, school, colleges, canteen facilities etc. All the measures of such records are recorded in the table number 2. The patient medication records have been recorded in the in the table number 3 along with the patient case report form. Close monitoring investigation of patient case report, pharmacological investigation in the dosing and cure of the patient, therapy profile monitoring, check of complete dose regimen. The patient introduced suffering of deep suffocation during the time of COVID onsite in the patient, but was eased with the help of medication. Such close monitoring help patients to have proper therapeutic regimen, monitor any challenge in the therapy, ensure safety, and monitor any untoward reaction of the new drug or new drug therapy.

4.1. Challenges: None.

4.2. Any significant untoward reactions: None.

4.3. Casualty: None.

4.4. Significant outcome of the study: The patient got cure from SARS -CoV and was found healthy after the complete medication and treatment.

5. Conflict of interest

There is no conflict of interest.

6. Declaration of patient consent

The researcher, author of this study confirms that they have obtained all appropriate patient consent in either of the form; from the patient to study her medication and produce for the medication information purpose. The patients understand that their names and details will not be published or be let in public in any form, along with any physical records.

7. ACKNOWLEDGEMENT

I am incredibly grateful for the opportunity to publish with you and extend my heartfelt appreciation to my mentor, Professor Dr. Saurabh Dilip Bhandare, at NGSPM's College of Pharmacy in Trambak-Nashik. Working alongside him has been an immense privilege, and his unwavering support, meticulous guidance in manuscript development, consistent encouragement, and nurturing, parental demeanour has been instrumental in the realisation of our project's success. Miss, Sonal Devidas Nerkar.

Collaborating co-authors: Mr. Tajane Omkar Prakash, and Valvi Snehal Ravindra.

Thank your sir for giving opportunity to be a part of this collaboration in publication as co-authors and allow us to study in this project or case study.

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