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# TITLE: SURVEILLANCE OF THE COVID-19 OUTBREAK AT VILA CENTRAL HOSPITAL, VANUATU, MARCH-AUGUST 2022

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# INTRODUCTION/BACKGROUND

- The SARS\_COV2 (Covid-19) virus represents one of the greatest global health challenges in more than a century
- The World Health Organization (WHO) declared COVID-19 a Public Health Emergency of International Concern (PHEIC), and on the 11th March 2020 it was declared a global pandemic



# INTRODUCTION

- On 4<sup>th</sup> March 2022, the first community case of COVID-19 in Vanuatu was detected in an admitted patient at Vila Central Hospital (VCH)
- VCH immediately implemented COVID-19 testing protocols in all wards
- The Infection Prevention and Control Unit was tasked to activate surveillance and daily reporting of COVID-19 cases, hospitalisations and deaths
- The purpose of this study is to describe hospitalisations for COVID-19 at VCH between March and August 2022



# METHODS

- All people presenting to the Emergency Department and admitted to VCH were tested for COVID-19 on arrival/admission.
- A surveillance officer collected COVID-19 status information from admission books on all wards.
- An online surveillance database (go. Data), was used to record line-listed information for each case, including hospitalisations and outcome (recovery or death).



# METHODS

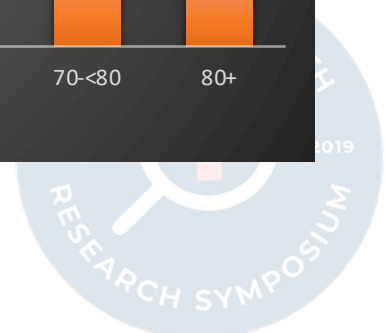
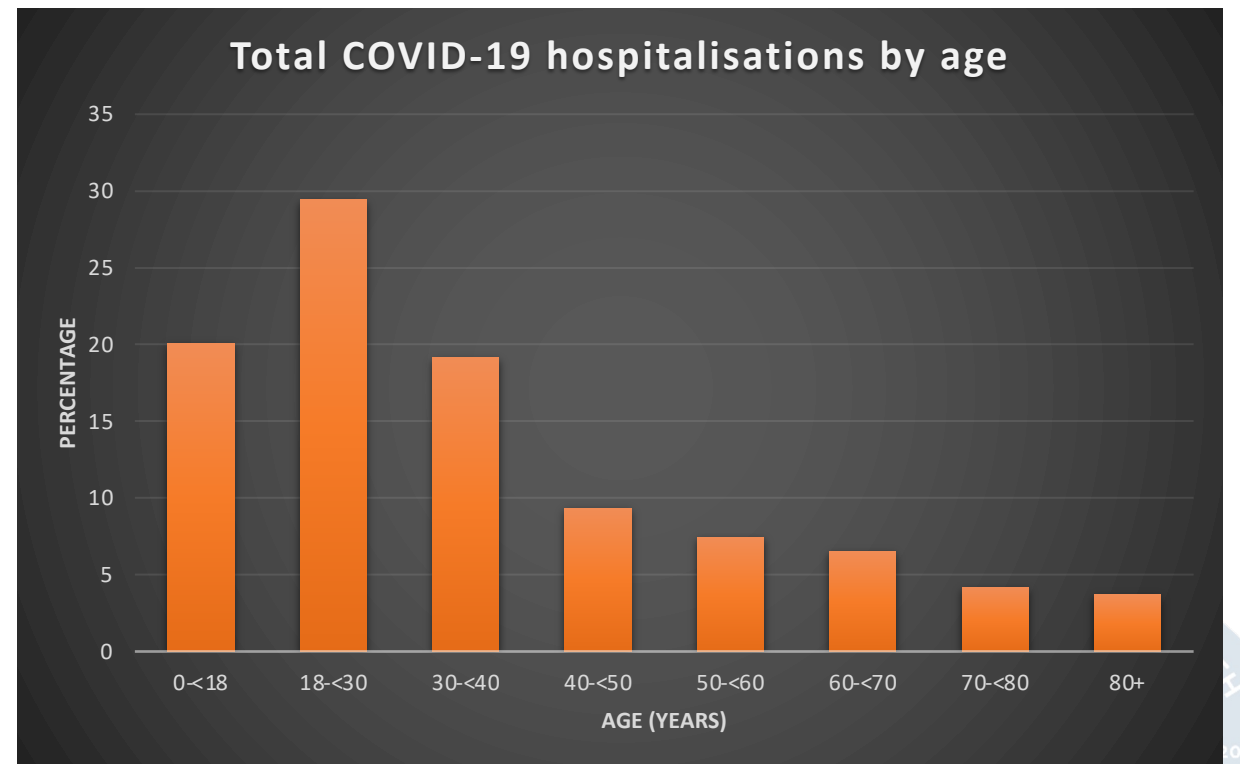
From the go. Data we collected 214 cases of COVID positive patients

- 67 males and 147 female
  - Out of the female cohort, there were 81 pregnant mothers
- From these data we identified the total number hospitalizations by
  - Gender
  - Age
- We also identified
  - Different age groups hospitalised with COVID-19 and due to COVID-19
  - Severity, underlying conditions, and
  - Outcomes of cases hospitalised due to COVID-19



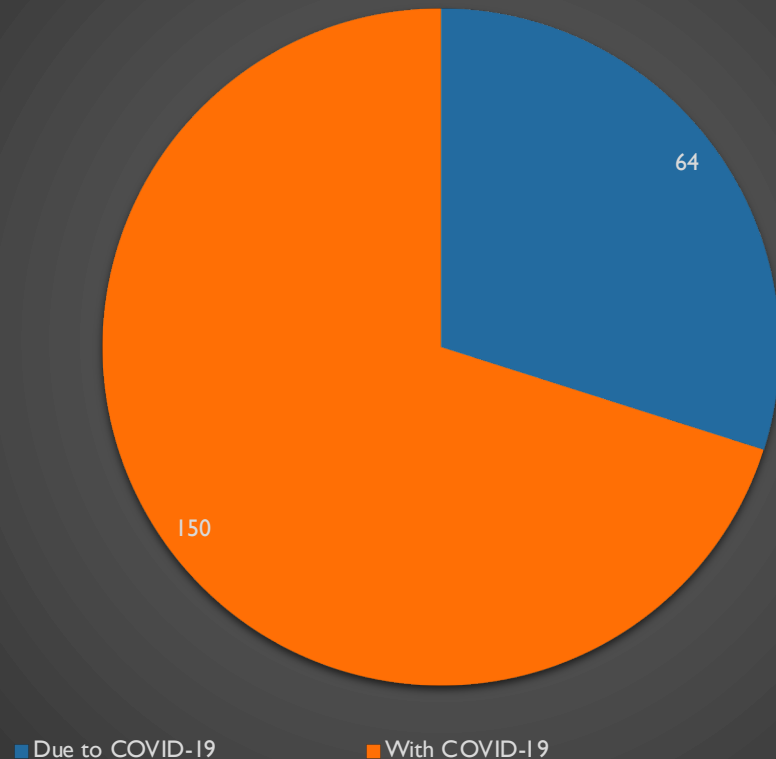
## RESULTS:

- 214 total hospitalisations
- The ages between 0 – 40 years of age made up the majority of COVID-19 positive patients.
- Many of these were admitted for other reasons, but tested positive to COVID-19 on arrival.
  - This included 81 pregnant women.



## RESULTS: HOSPITALIZATIONS DUE TO COVID AND WITH COVID

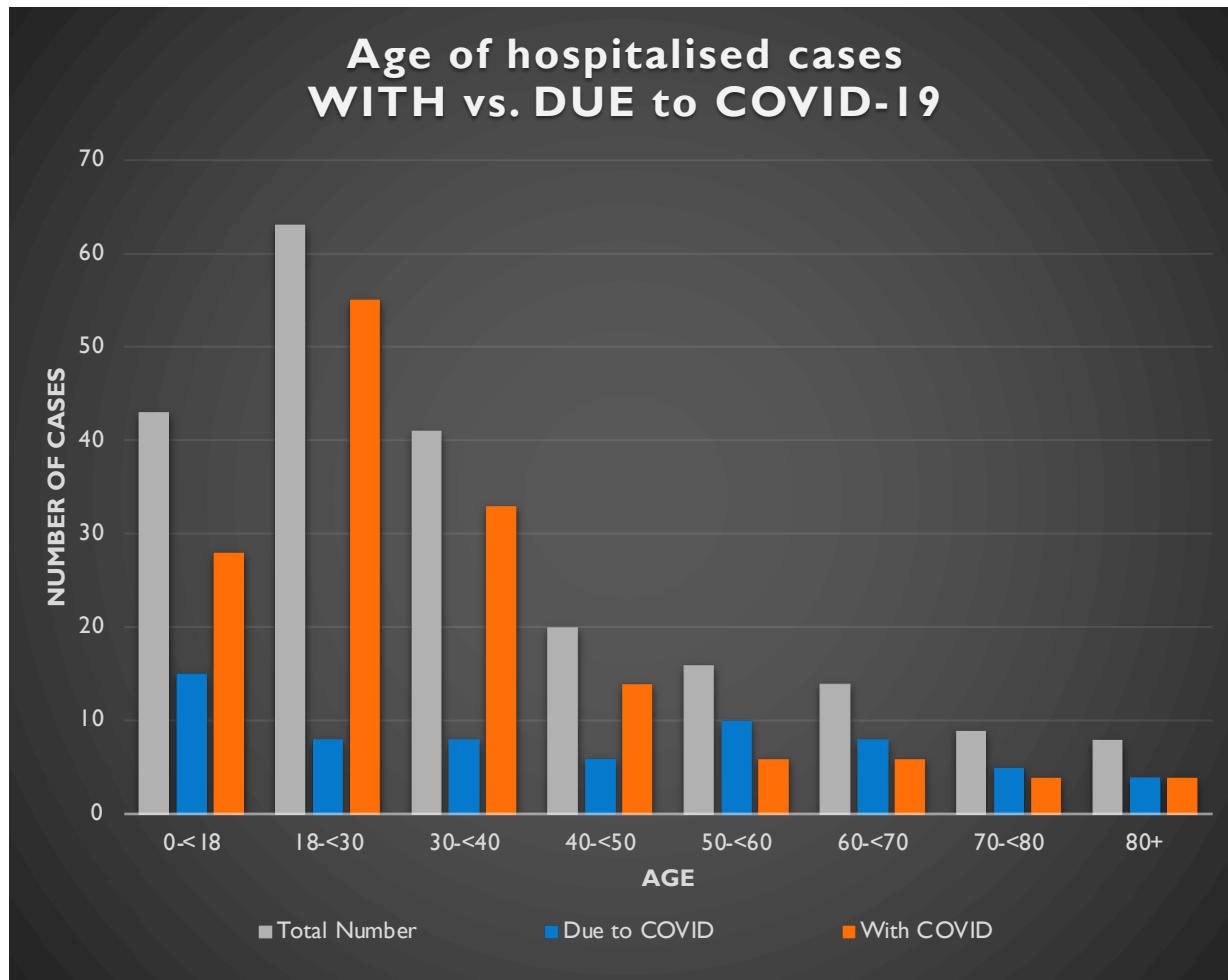
Total COVID-19 hospitalisations



- Majority of admissions were admitted with COVID.
- Only 64 patients were admitted due to COVID (ie. COVID was the primary reason for admission).



# RESULTS: HOSPITALIZATIONS WITH AND DUE TO COVID AND COMPARED TO AGE GROUP



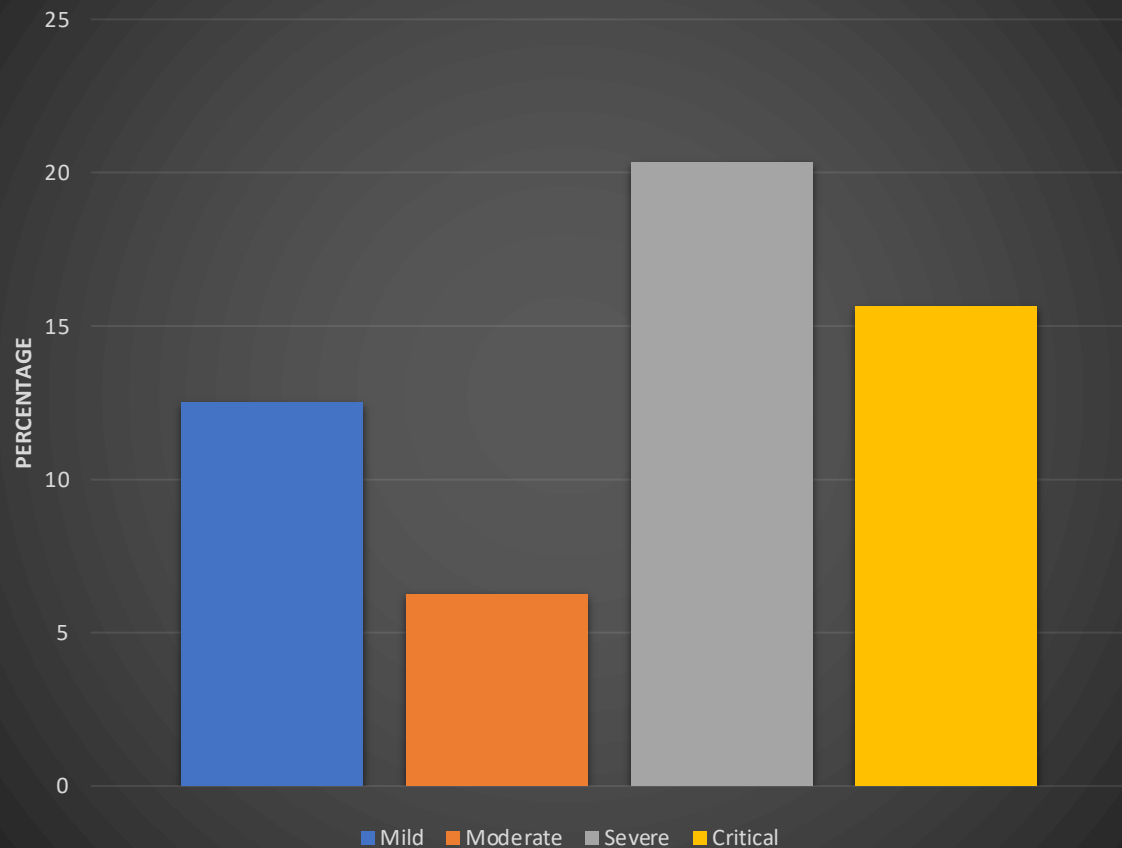
- Younger people more likely to be hospitalised with COVID.
- Hospitalisations due to COVID did not differ much across age groups.



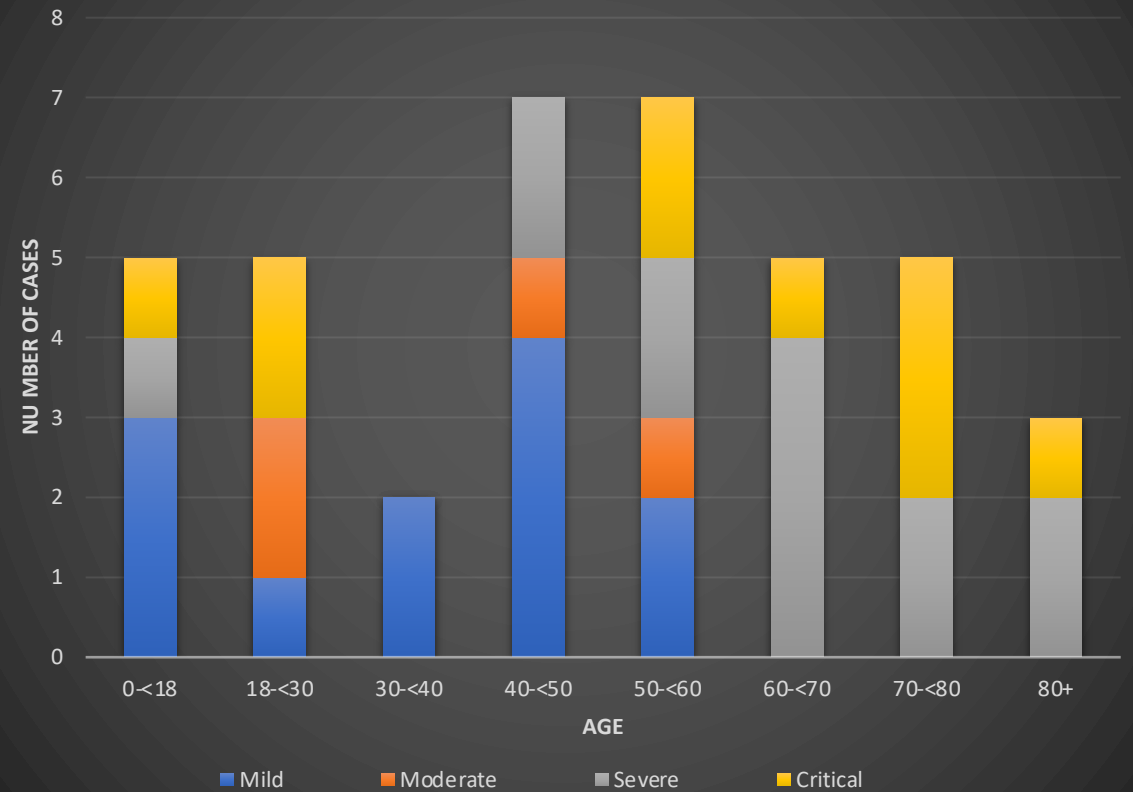


# RESULTS: SEVERITY OF CASES DUE TO COVID AND COMPARED IN WITH AGE

## Severity of cases hospitalised due to COVID

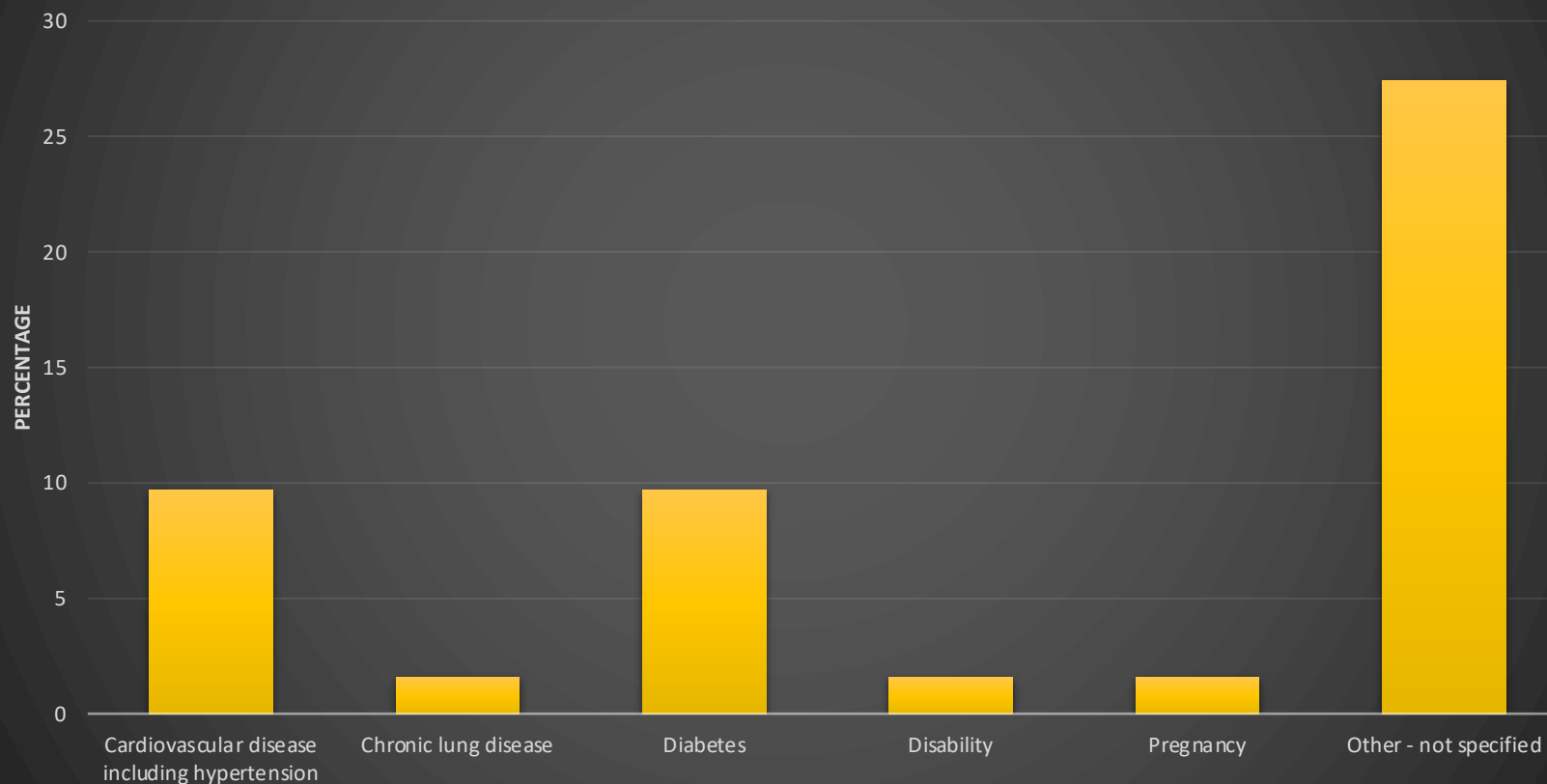


## Age and severity of hospitalisations due to COVID

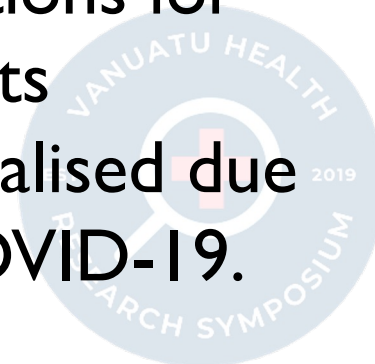


## RESULTS: UNDERLYING CONDITIONS

### Underlying conditions of hospitalisations due to COVID-19

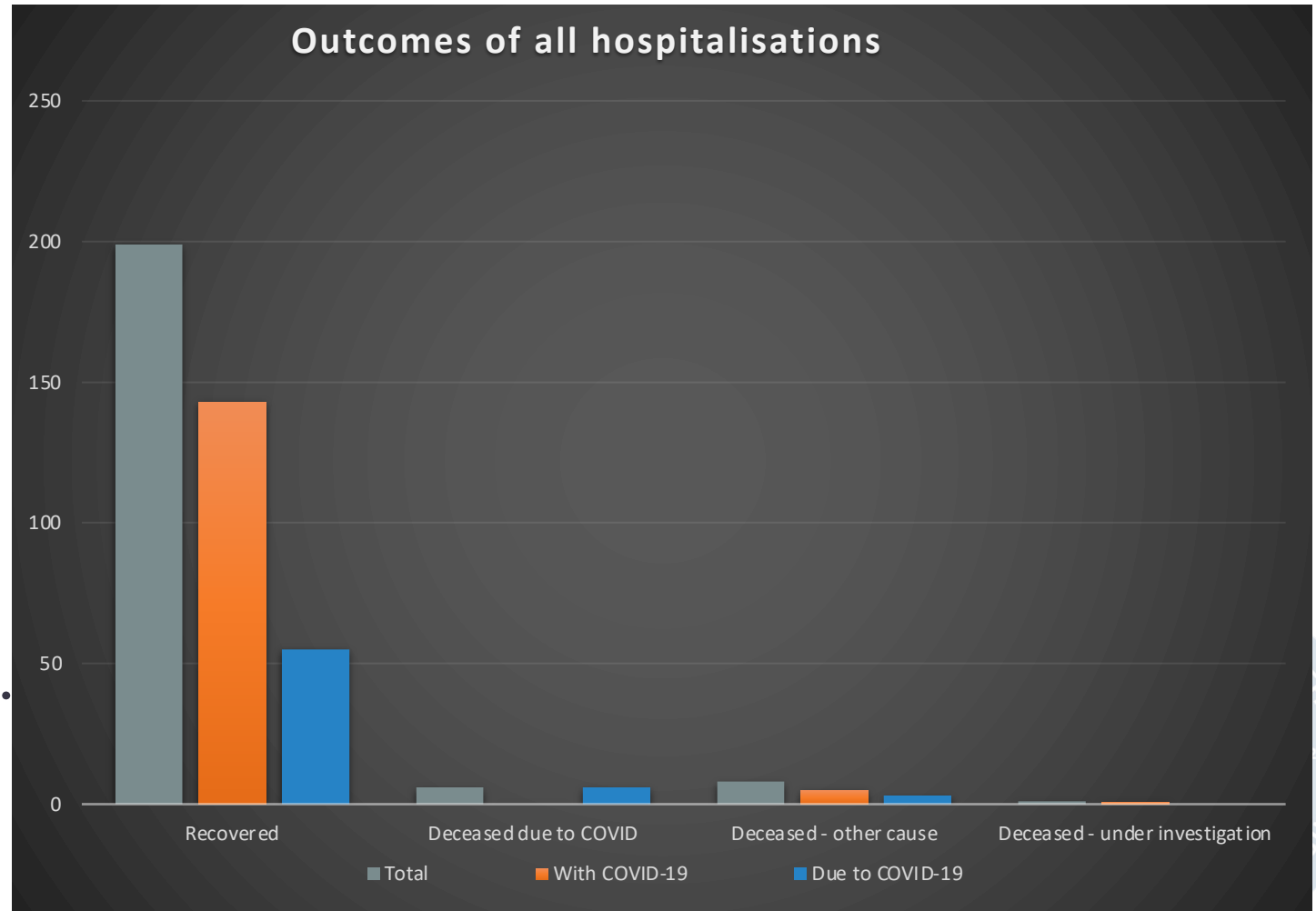


- Cardiovascular disease and diabetes were the most common underlying conditions for patients hospitalised due to COVID-19.



## RESULTS: OUTCOMES

- Six people hospitalised due to COVID-19, died as a result of their COVID-19 infection.
- Three people hospitalised due to COVID-19 died due to other medical conditions.



## DISCUSSION

- Of the 214 total hospitalisations, there was a high percentage of mild infections.
  - This may be due to most of those who were admitted, where hospitalised with COVID-19 e.g 81 pregnant mothers
  - and we know that most of the cases were infected with Omicron Variant, less severe form
- Of the 64 hospitalizations due to COVID-19, there were more severe and critically ill cases, particularly within the age of 50 years and above.



# CHALLENGES AND LIMITATIONS

- Challenges to documentation and reporting in wards was experienced and this may have led to underestimates of the true number of hospitalized cases and can also affects our findings.
- A limitation of the surveillance database is lack of detailed clinical and management information.



## RECOMMENDATIONS / IMPLICATIONS

- Electronic patient records would be useful to improve and strengthens reporting and analysis of further out breaks to clearly define samples.
- Strengthen and support Surveillance unit in the Hospital, funds, capacity building, reporting system etc
  - Refresher trainings,-on reporting, disease definition etc



# ACKNOWLEDGEMENTS

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  - Vila Central Hospital (VCH)-Administration- Hospital IPC
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