The George Washington University COVID-19 Biorepository for Data and Specimen Collection: A Preliminary Review of Initial Enrollees

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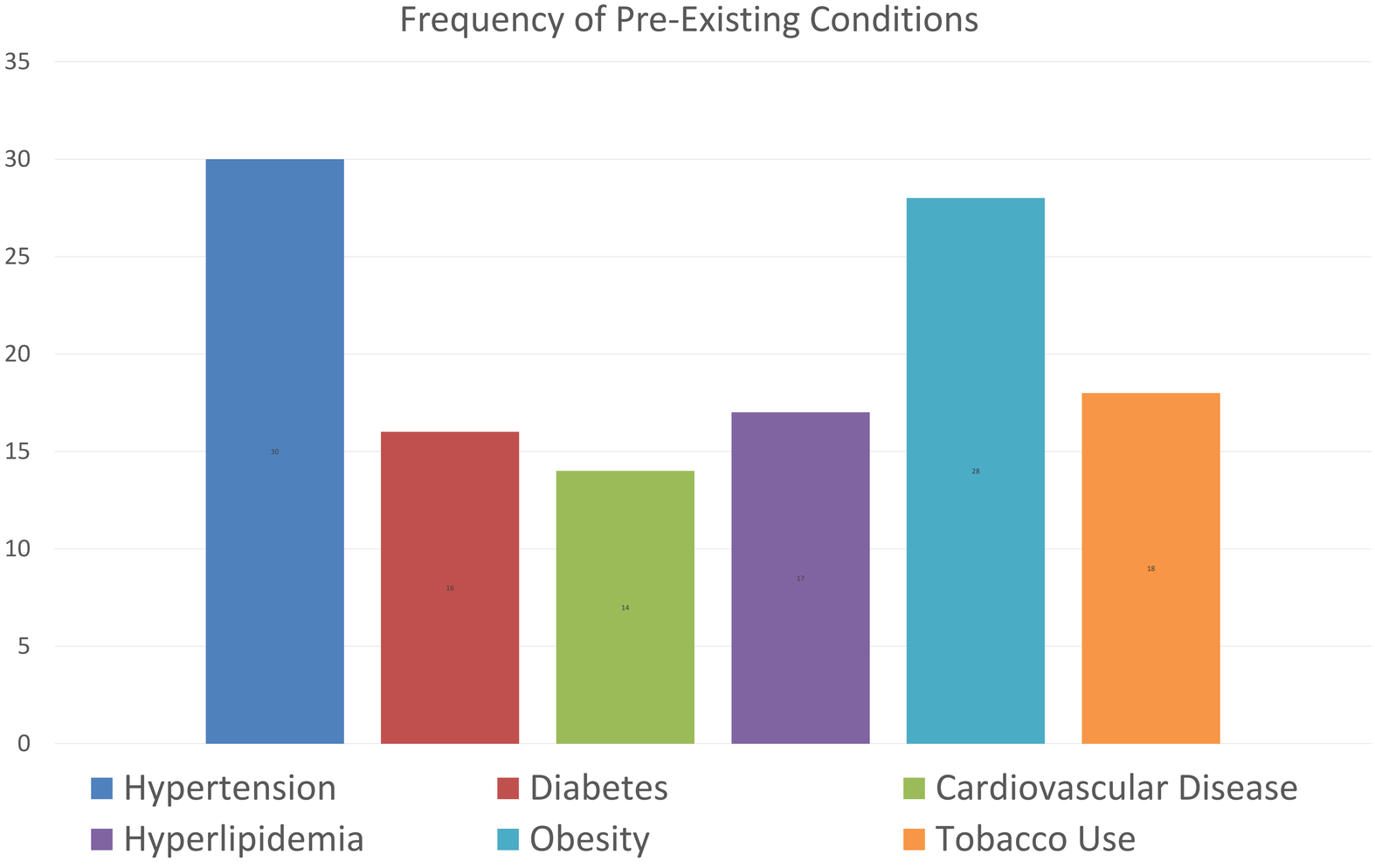
PURPOSE:

The SARS-CoV-2 is incompletely understood, as is the associated COVID-19 clinical syndrome. As additional disease complications are discovered, additional questions arise. To better understand the pathogenesis and mechanisms of the SARS-CoV-2 virus, a biorepository of clinical specimens and clinical data has been established at George Washington University.

METHODS:

- Prospective longitudinal cohort study
- Biospecimen collection including naso- and oro-pharyngeal swabs, blood samples, and urine specimens
- Clinical data collection including course of illness, severity, treatment, and outcomes
- Evaluation at enrollment and at three time points including 10-weeks, 6-months, and 12-months post-acute infection

PRELIMINARY RESULTS:



PRELIMINARY RESULTS:

Demographics	
Male	48.9%
Female	51.1%
Black	88.9%
Hispanic	6.7%
White	4.4%
Average Age	54 years
Outcomes	
Required Hospitalization	97.8%
Required ICU	20.0%
Mortality	4.4%
Length of Hospitalization	9.1 Days
Interventions	
Remdesivir	26.7%
Dexamethasone	37.8%

CONCLUSIONS & IMPRESSIONS

- The most common pre-existing conditions are hypertension and obesity, consistent with nationally available data
- Population of the biorepository reflects the local population and continues to expand rapidly
- Data collection includes naso- and oro-phryngeal, blood, and urine biospecimens, demographic data, and clinical course and outcome data
- Biorepository serves to correlate biological and clinical data to disease course, severity, and post-acute COVID complications
- Potential future use includes identification of therapeutic targets, increased predictive and prognostic data identification, and better understanding of SARS-CoV-2