

## Dettaglio abstract

**N. pgm:** OC 39

**Title:** Effect of COVID-19 pandemic on the HIV cascade of care at a Provincial level

**Presentation type:** Oral Communication

### Session/Topic

HIV and SARS-CoV-2 two intersecting epidemics

**Authors:** F. Maggiolo<sup>1</sup>, R. Teocchi<sup>1</sup>, P. Meli<sup>2</sup>, D. Valenti<sup>3</sup>, F. Radici<sup>4</sup>, I. Mercurio<sup>5</sup>, A.P. Callegaro<sup>6</sup>

**Affiliation:** 1ASST Papa Giovanni XXIII, 2Comunità Emmaus & Caritas Bergamasca, 3Associazione FROM, 4Arcigay Bergamo Cives, 5CRI-Comitato di Bergamo, 6ASST Bergamo Est, Bergamo

### Abstract

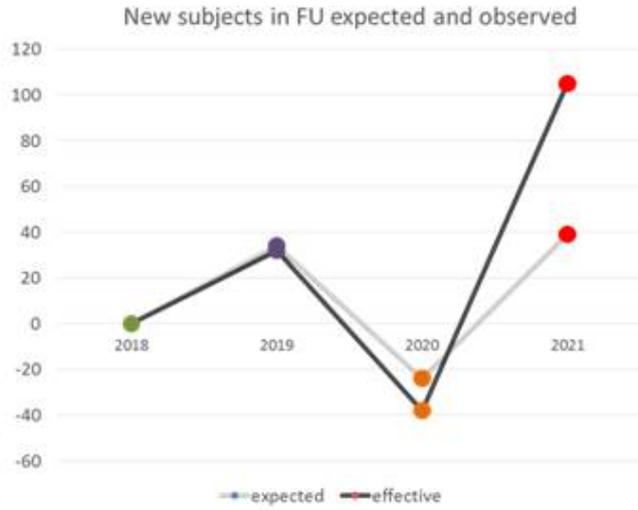
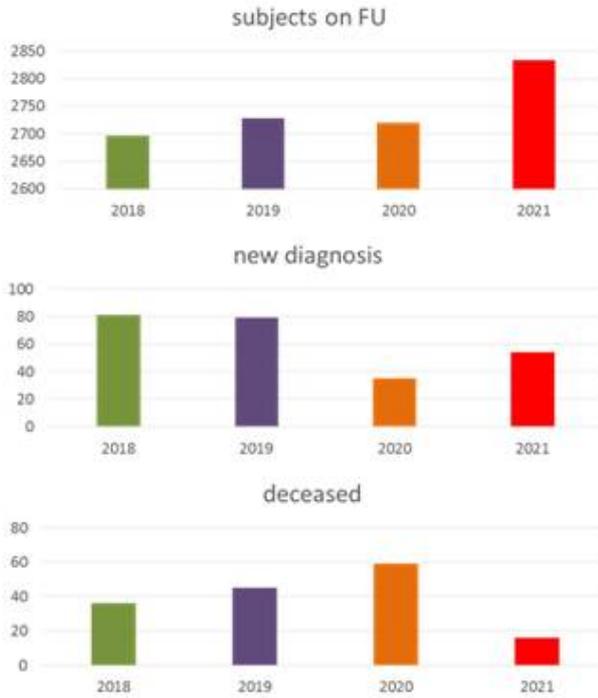
**Background:** Measuring progress towards the HIV care cascade allows to identify processes that should be improved to achieve UNAIDS 95-95-95 2030 goal. This goal is of paramount relevance as it could put the HIV epidemic curve under control. We focused our attention on the effect of the Covid-19 pandemic on our cascade of care.

**Methods:** We calculated the number of PLWH using the eCDC HIV modeling tool (version 1.3.0) that estimates the size of the undiagnosed population. Data on the diagnosed and treated populations were derived from the clinical database of the only Provincial Center authorized to treat HIV infection. Virologic response to ART was defined according to the last available HIV-RNA measure. Data of the last four solar years were compared to assess the dynamics of the cascade of care over time and to verify the weight of the COVID-19 pandemic that in our province was particularly present in the year 2020

**Results:** In the last 4 years we observed a decrement of new diagnosis, this reduction was particularly marked in 2020 and was paired by an increment of deceases (figure upper left panel). As a consequence expected patients in active FU in 2020 was higher than those effectively followed. In 2021 the number of new diagnosis incremented compared to 2020, but still confirmed the overall decrease trend. Furthermore, in 2021 we had a sustained increment of effective PLWH in FU above the expected number (figure upper right panel). This unexpected increment was due to a relevant number of PLWH previously (before 2019) lost to FU that re-engaged care. These temporal variations, induced a 4.3% reduction of the estimated PLWH and a 4.1% increment of PLWH on active care. At January 2022, according to our calculations the total estimated number of PLWH was 3225 (figure lower panel); 2834 of them (87.9%) were on active FU. All diagnosed and alive subjects were actively taking ART and 98.5% of them had their last viral load < 200 copies/ml. That brought to a final proportion of people living with HIV and virally suppressed of 86.4% just above the 95-95-95% goal (figure).

**Conclusions:** The COVID-19 pandemic we faced mainly in 2020 slightly reduced the attendance of our outpatient clinic, but increased death rate in our cohort. New diagnosis were lower, but no rebound was observed in 2021 (e.g. delayed diagnosis). The number of new diagnosis in 2021 confirmed the positive trend of the last four years indicating a steadily reduction of new diagnosis. In 2021 the number of PLWH on active FU exceeded the expected one because of the re-engagement of several PLWH lost to follow-up before the pandemic. This increment improved our cascade of care leading to an overall positive outcome in 86.4% of PLWH.

### Dynamics within the cohort



### Cascade of care 2021

