

DEPARTMENT OF MICROBIOLOGY, IMMUNOLOGY AND TRANSPLANTATION



# Genomic surveillance report

## Update for Belgium, 26/07/2022

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#### **Executive summary**

Omicron BA.5 is now the dominant lineage in Belgium and accounts for around 90% of the most recent infections. The epidemic resurgence associated with this viral shift seems to have reached a peak, as highlighted by a decreasing number of infections (Rt < 1) and a decreasing test positivity rate (32%). Hospital admissions are currently stable.



Currently, we have limited evidence that BA.2.75 could outplace BA.5, as it seems to have a discreet transmission advantage against the latter. For now, no BA.2.75 samples have been identified in Belgium through our genomic surveillance program.

### 1 Epidemiological context and indicators related to diagnostic activities

Omicron BA.2 and BA.2.75 can be distinguished from BA.4 and BA.5 using as the latter variants present a deletion 69/70 in the Spike gene (S gene target failure, SGTF).

At this stage, SGTF samples (BA.5 and BA.4) represent 96-98% of the most recent samples analyzed (Figure 1).



**Figure 1:** S gene target failure (SGTF, in blue: BA.4 and BA.5) and others (red: currently considered predominantly BA.2, but also possibly BA.2.75) among positive samples reported by the federal platform laboratories.



*Figure 2:* S gene target failure (SGTF, in blue: BA.4 and BA.5) and others (red: currently considered predominantly BA.2, but also possibly BA.2.75) among positive samples reported by the federal platform laboratories.

#### 2 Monitoring of Variants of Concern in Belgium

During the last two weeks of baseline surveillance - 11/07/2022 to 24/07/2022 - (525 sequences collected at this stage), BA.5 represented 91%, BA.4 represented 7% and BA.2 represented 2%. No BA.2.75 have been identified at this stage. In the meantime, we keep monitoring the situation abroad and state of knowledge regarding the emergence and spread of BA.2.75 (currently classified as a variant of interest by the ECDC).



Figure 3: Share of variants of concern per week in Belgium since January 2021