PRIVATE CONSULTATIONS SURVEILLANCE REPORT

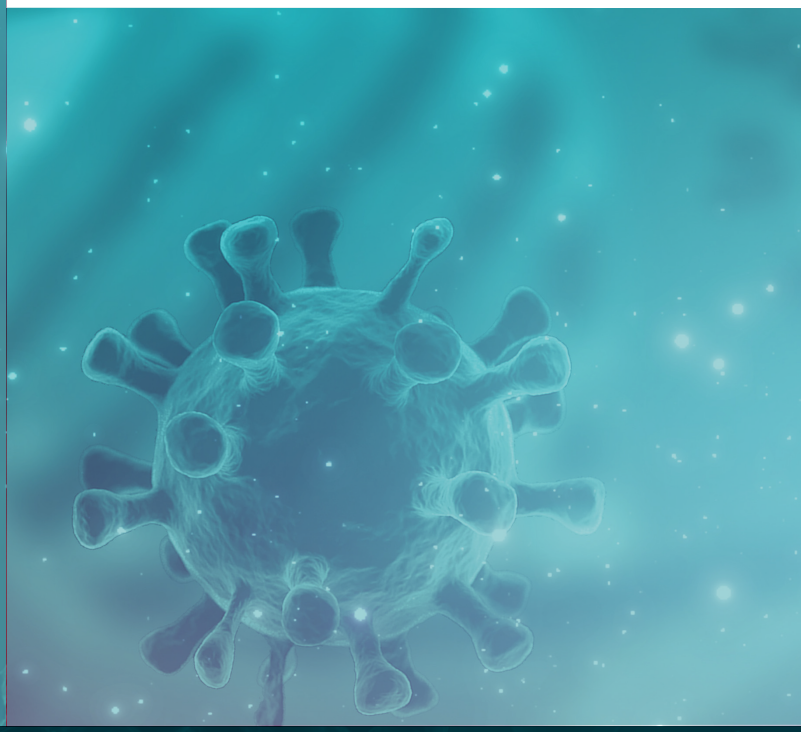
NATIONAL INSTITUTE FOR COMMUNICABLE DISEASES
Division of the National Health Laboratory Service

SOUTH AFRICA | WEEK 27 2020

CONTENTS

HIGHLIGHTS: WEEK 27

- The reduction in total numbers of respiratory hospitalisations as a result of the lockdown has reversed and numbers are now exceeding those preceding the national lockdown.
- Sustained increase in proportion of respiratory hospitalisations among 20-49 and ≥50 years and in all four provinces evaluated likely reflects increasing respiratory cases including COVID-19 cases. The proportion of respiratory consultations in individuals aged 5-19 years is increasing and has now exceeded the seasonal threshold.
- Differences by province and age group should be interpreted with caution due to low numbers in some groups.



PROGRAMME DESCRIPTIONS

Inpatient data from a large national private hospital group and outpatient data from a general practitioner network linked to the same hospital group were received for the last week. Data were obtained from eight provinces (**Eastern Cape**, Free State, **Gauteng**, Limpopo, **KwaZulu-Natal**, Mpumalanga, North West, **Western Cape**). Sufficient numbers for province-level reporting were available for four of these (bold). Consultations and admissions were coded based on discharge diagnosis using the International Classification of Diseases and Related Health Problems, 10th revision (ICD-10). Data were analysed using the indicator: All respiratory and confirmed or suspected COVID-19 (J00-J99 & U07.1 & U07.2)/Total consultations. Data on the indicator Pneumonia and Influenza (J10-J18)/Total consultations are available on request but were not included in this report.
Data were categorised in the following age groups: All ages, <5 years, 5-19 years, 20-49 years, ≥50 years

Epidemic Threshold

Thresholds were calculated using the Moving Epidemic Method (MEM), a sequential analysis using the R Language, available from: http://CRAN.R-project.org/web/package=mem, designed to calculate the duration, start and end of the annual influenza epidemic. MEM uses the 40th, 90th and 97.5th percentiles established from historical data (2015-2019 for inpatients, 2016-2019 for outpatients) to calculate thresholds of activity, defined as follows:

- Epidemic threshold: Median of weekly values for all baseline years
- Low activity: Between epidemic threshold including 40th percentile
- Moderate activity: Between 40th and 90th percentile
- High activity: Between 90th and 97.5th percentile
- Very high activity: 97.5th percentile and above

Hospitalization data for recent weeks are adjusted for delayed reporting (diagnosis codes assigned on discharge delayed for prolonged hospitalisations). Adjustment accounts for the probability of being admitted, but not yet discharged at the time of data drawdown using the age- and syndrome-specific probability distribution of duration of admission obtained from all hospitalizations that occurred during 2015-2019 and applied to the most recent weeks in 2020.

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INTERPRETATION OF DATA PRESENTED

Total admissions reduced from week 13 when lockdown was implemented. After week 18, when restrictions moved to level 4, there was a modest increase in total admissions. In week 26 admissions reached similar levels to before the lockdown and continue to increase in week 27. The proportion of admissions coded as confirmed COVID-19 (out of suspected) increased from week 15, exceeding 30% from week 23.
Total outpatient consultations reduced slightly from week 13 but recovered to levels similar to those preceding the lockdown. The proportion of outpatient consultations coded as confirmed COVID-19 (out of suspected) increased from week 15.
Proportion of admissions respiratory or suspected COVID-19 overall remained below threshold until week 21, following which it increased rapidly reaching the very high threshold in week 25 and remaining above the threshold to date.
By age group, percent admissions respiratory or suspected COVID remained below threshold for 0-4 years and 5-19 years, increasing in recent weeks and reaching or crossing the moderate threshold in week 27. Among individuals aged 20-49 years and ≥50 years, percent respiratory admissions has continuously increased since week 13, reaching very high level in both age groups.

Proportion of outpatient consultations respiratory or suspected COVID-19 overall increased from week 11, peaking in week 13 and dropping well below the threshold, but showing an increasing trend in recent weeks, crossing the moderate threshold in week 26. By age group, percent outpatient visits showed similar trends for all age groups, and has breached the seasonal threshold among individuals aged 5-19 in week 27 and among individuals aged 20-49 years and ≥50 years from week 25.
Trends in proportion of admissions and outpatient consultations respiratory or COVID varied by **province** with proportion respiratory inpatients reaching very high levels in all provinces evaluated.

Assessment

The sustained increase in proportion of respiratory hospitalisations among 20-49 and ≥50 years likely reflects increasing respiratory cases including COVID-19 cases. The proportion of respiratory consultations in individuals aged 5-19 years is increasing and has now exceeded the seasonal threshold. Changes in health-seeking behaviours and/or effects of lockdown-related reductions may also have contributed. The reduction in total numbers of respiratory hospitalisations as a result of the lockdown has reversed and numbers are now exceeding those preceding the national lockdown. Differences by province and age group should be interpreted with caution due to low numbers in some groups.

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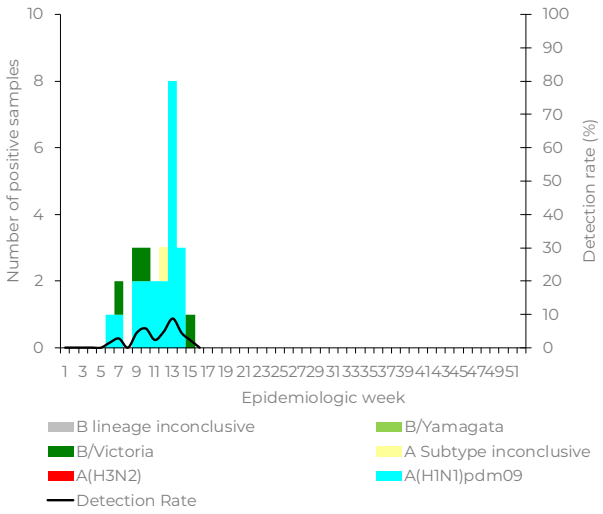
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

WEEK **27** 2020

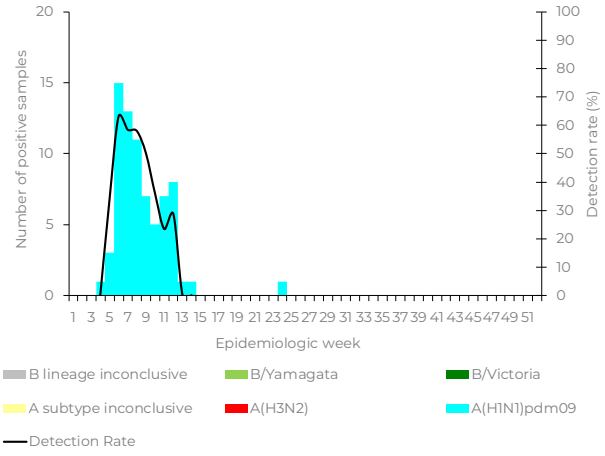
DATA FROM VIROLOGIC SURVEILLANCE PROGRAMMES TO AID IN INTERPRETATION OF CONSULTATION TRENDS

NUMBER OF INFLUENZA POSITIVE SAMPLES BY SUBTYPE/LINEAGE AND DETECTION RATE BY WEEK

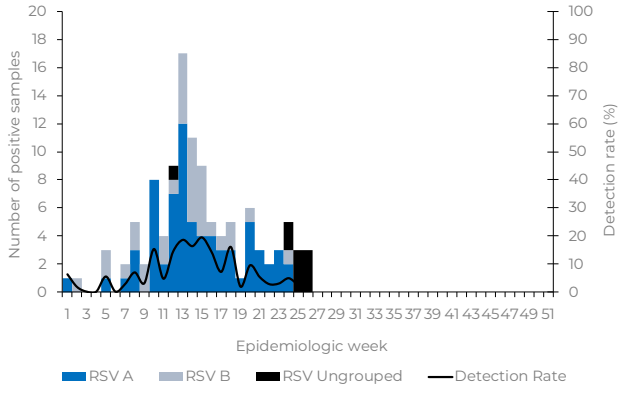
Inpatients



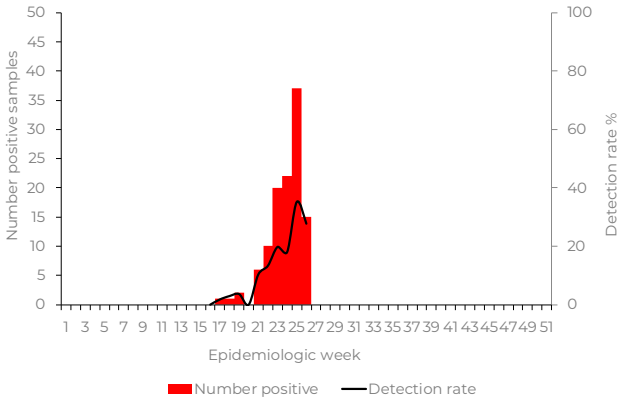
Outpatients



Number of respiratory syncytial virus positive by groups and subgroups per week (Inpatients)



Number of samples tested and results for SARS-COV-2 per week (Inpatients)



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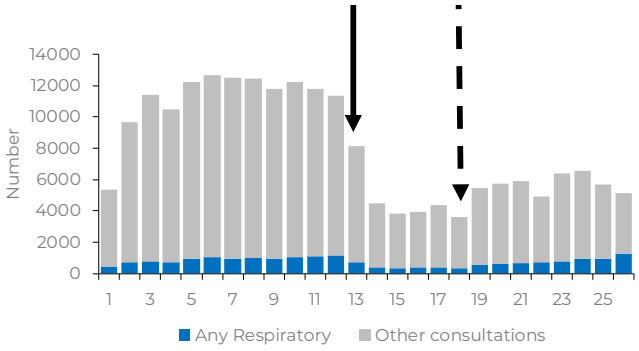
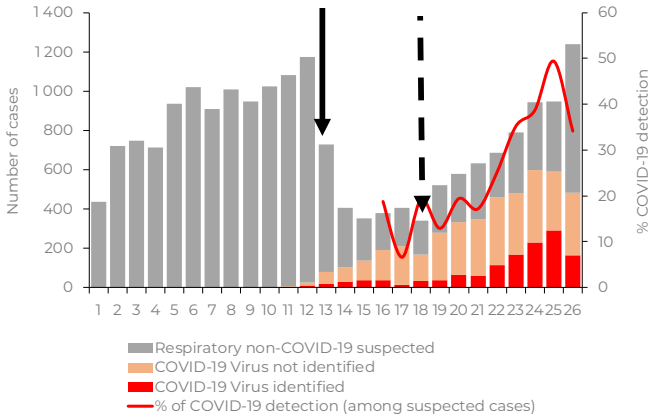
WEEK **27** 2020

NUMBER OF CONSULTATIONS - ALL RESPIRATORY INCLUDING CONFIRMED OR SUSPECTED COVID-19 AND OTHER CONSULTATIONS BY WEEK

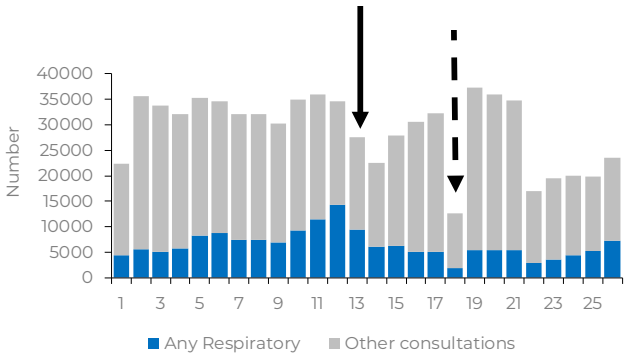
(SOLID ARROW INDICATES FIRST WEEK OF LOCKDOWN, DASHED ARROW FIRST WEEK OF LEVEL 4)

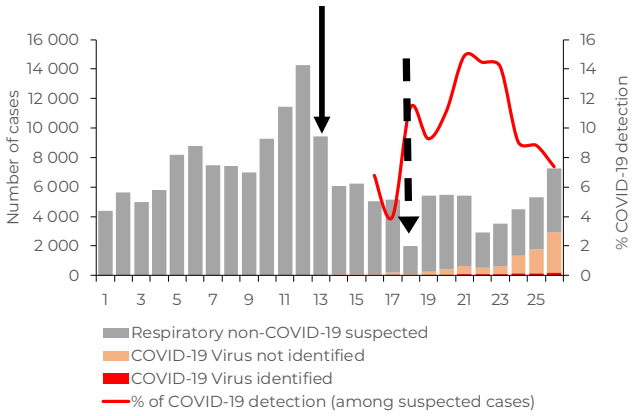
Inpatients





Outpatients





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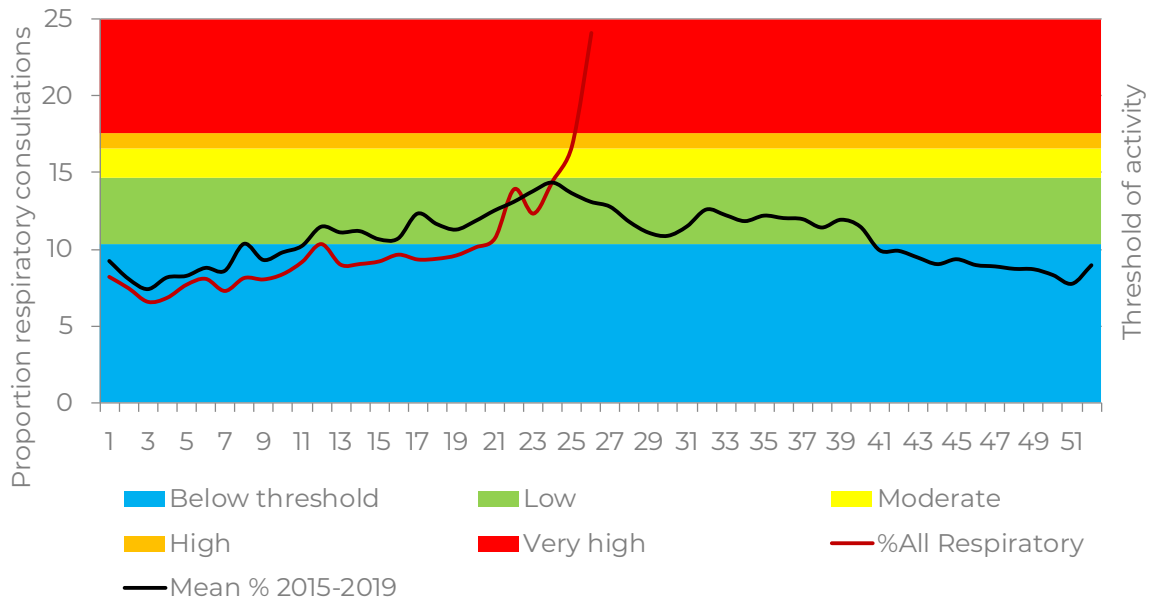
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

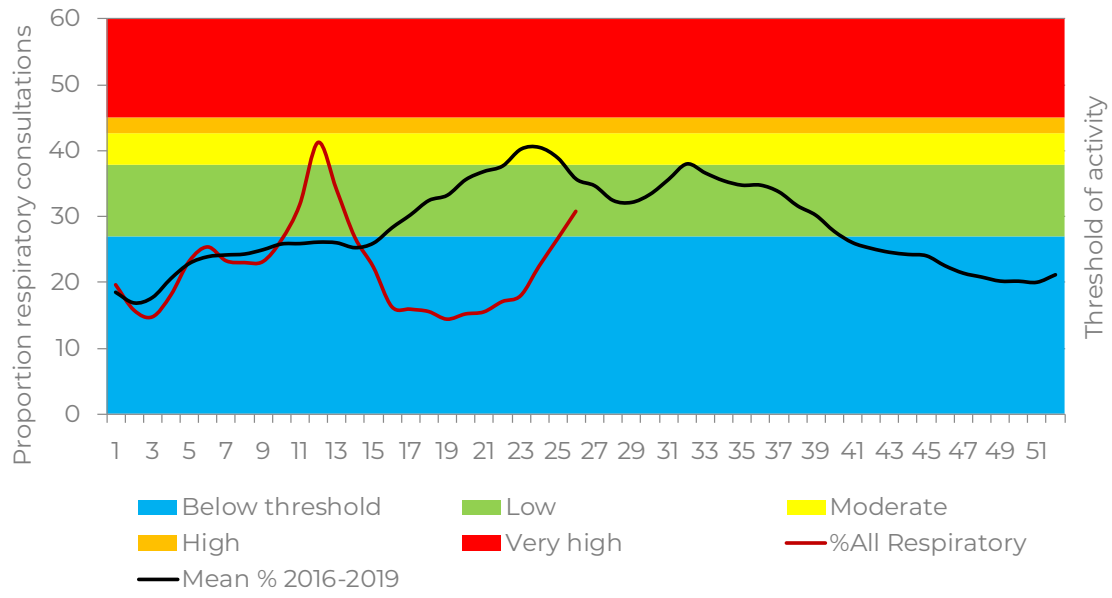
WEEK **27** 2020

ALL AGES

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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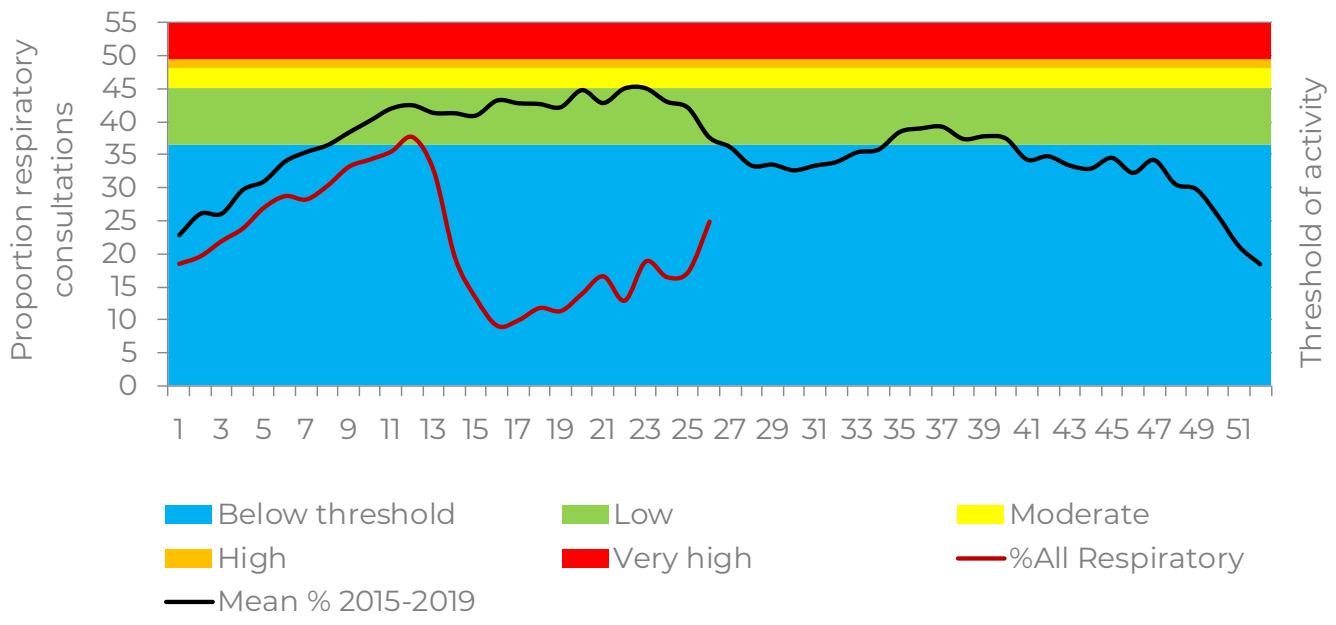
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

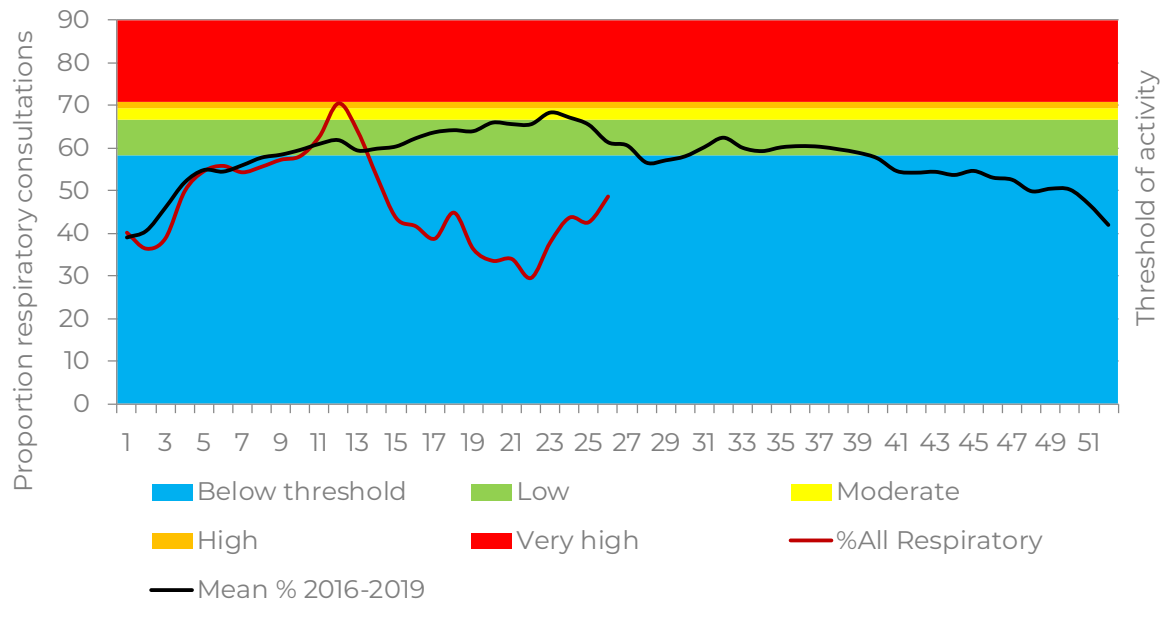
WEEK **27** 2020

0-4 YEARS OF AGE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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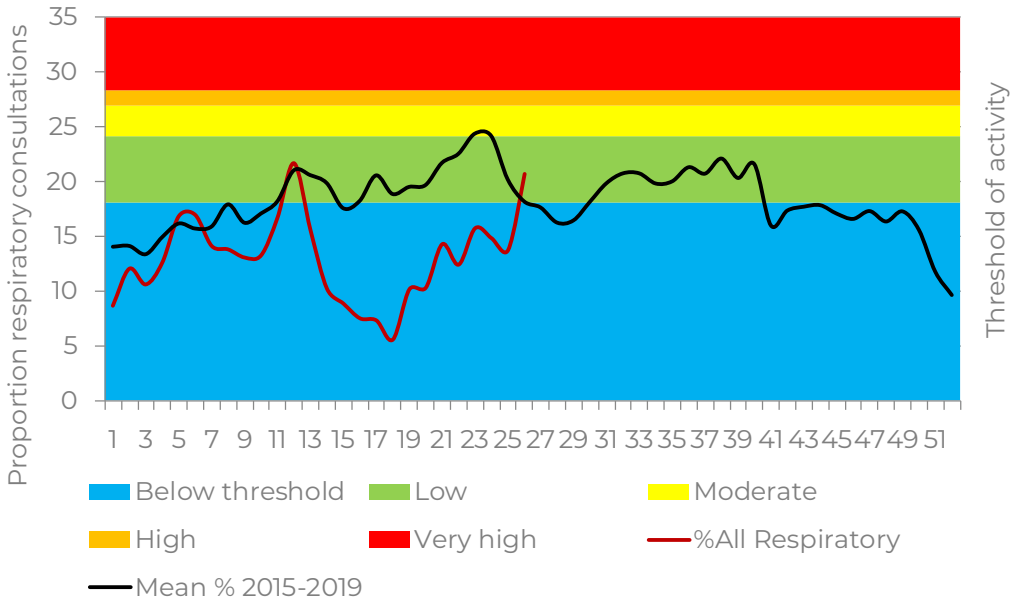
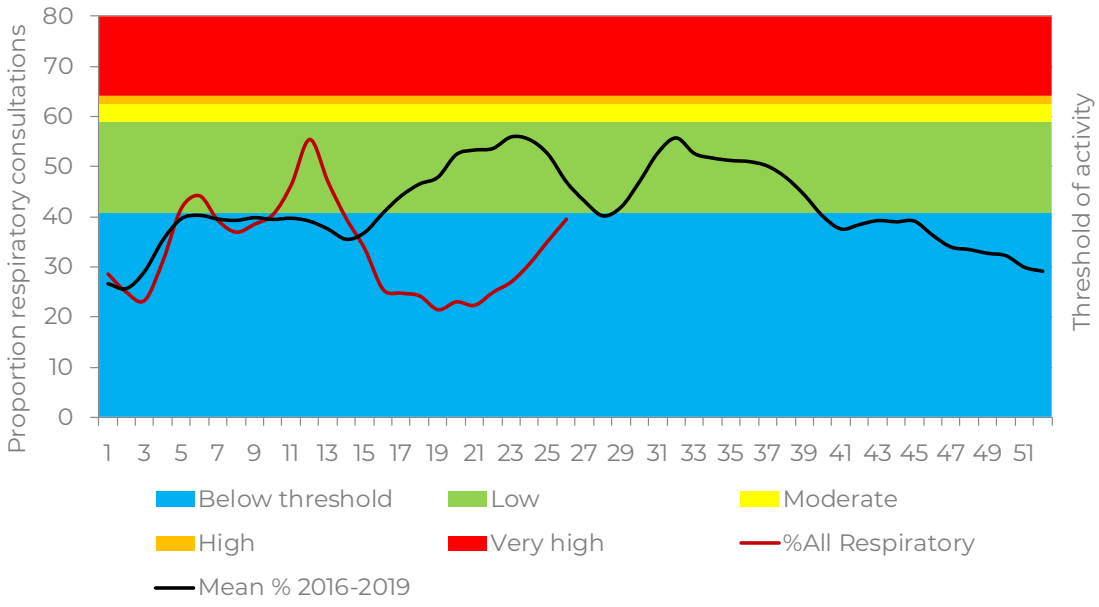
5-19 YEARS OF AGE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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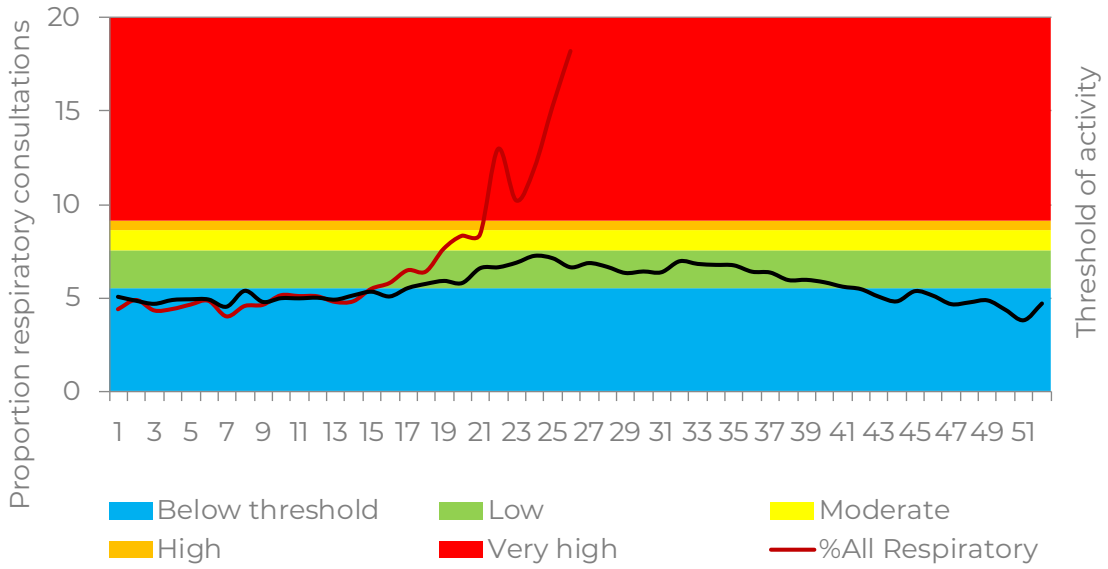
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

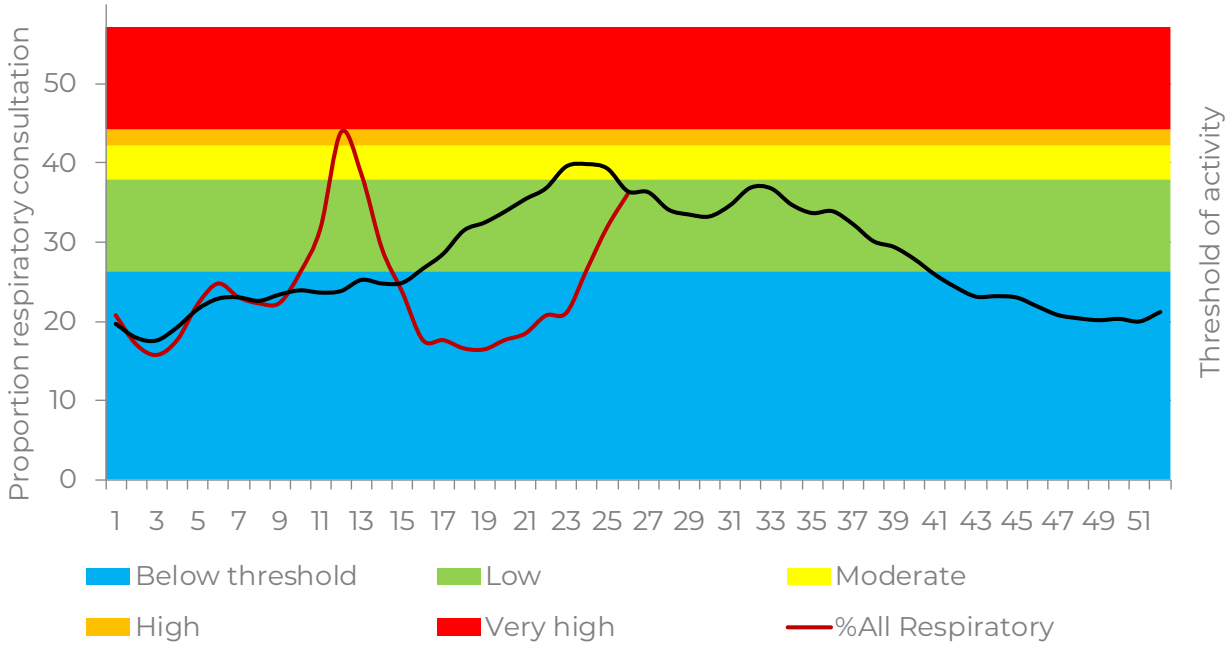
WEEK **27** 2020

20-49 YEARS OF AGE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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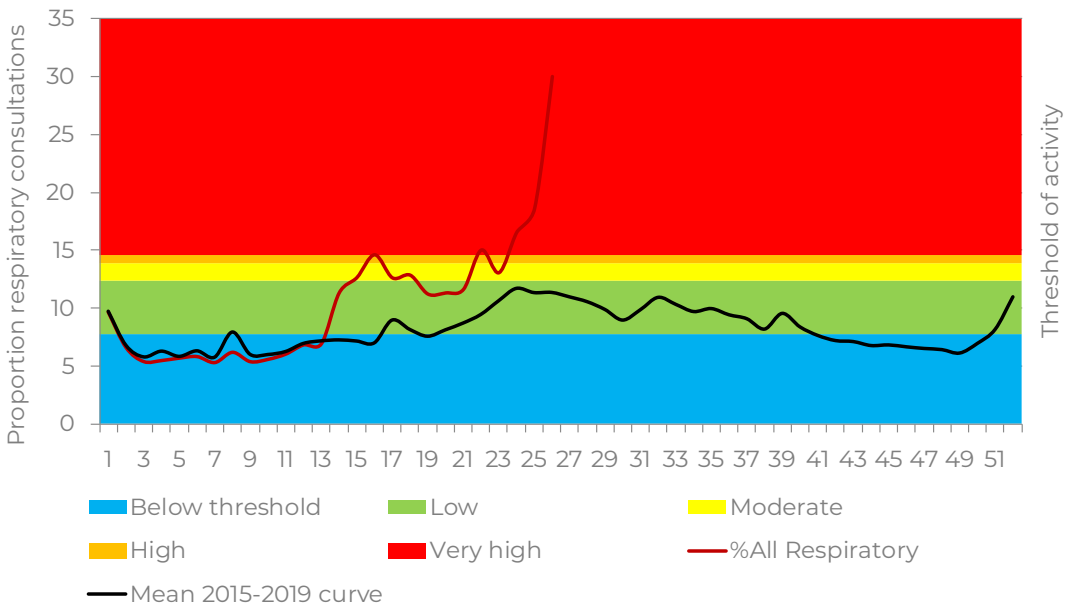
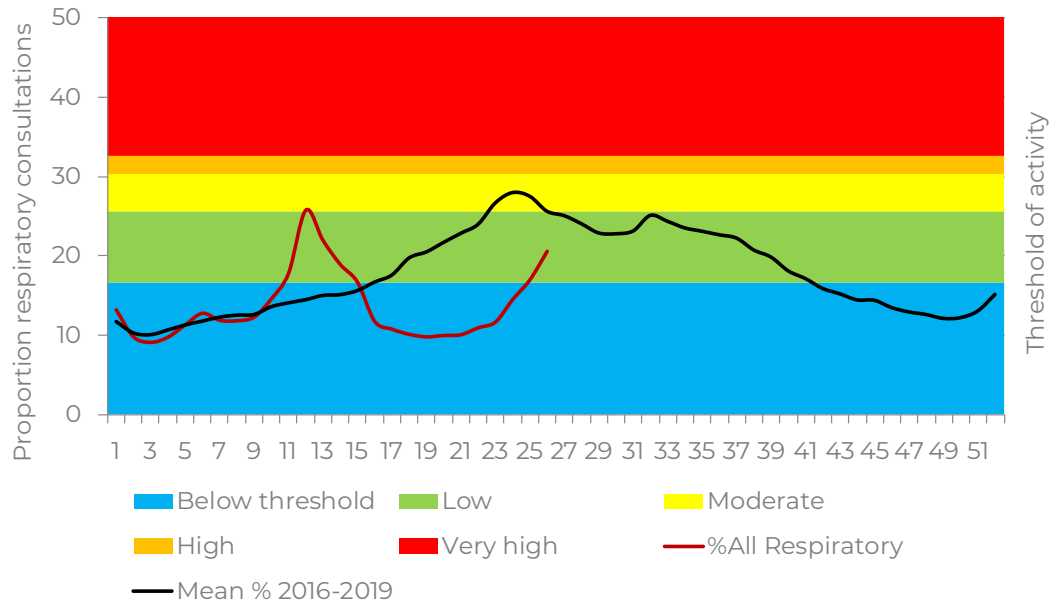
≥50 YEARS OF AGE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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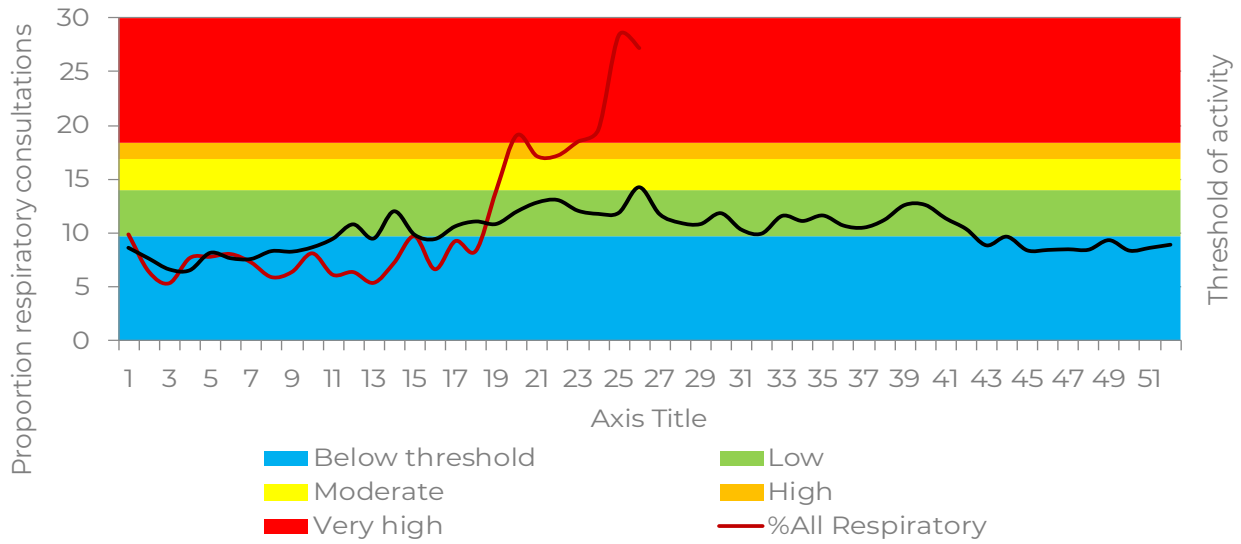
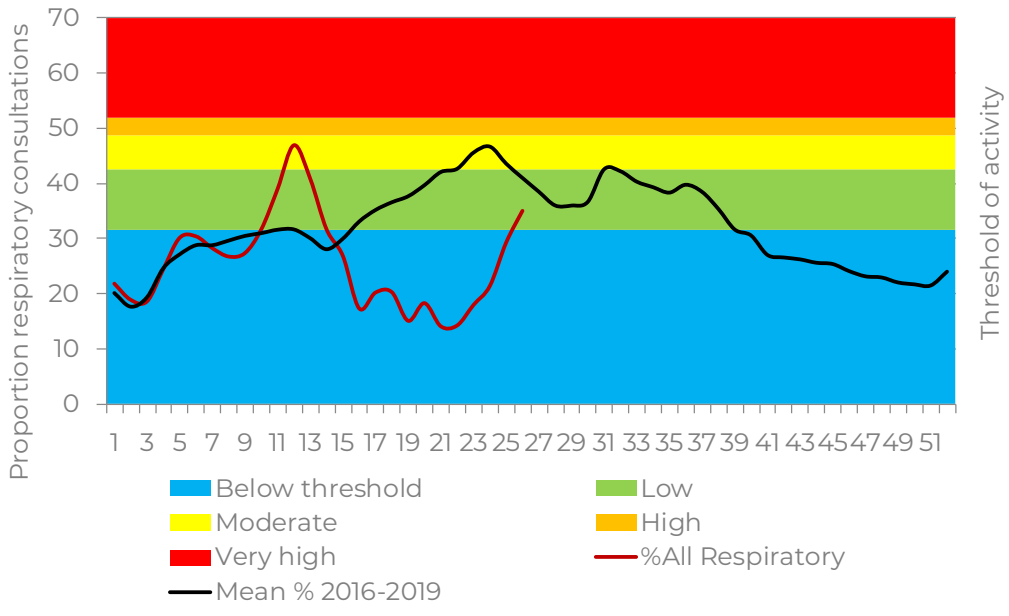
WEEK **27** 2020

EASTERN CAPE PROVINCE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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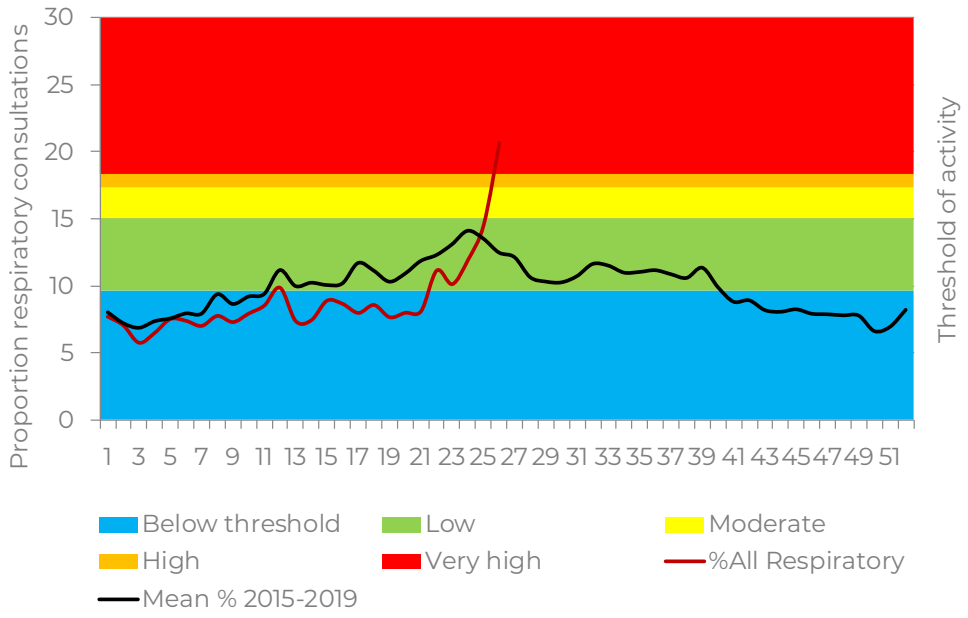
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

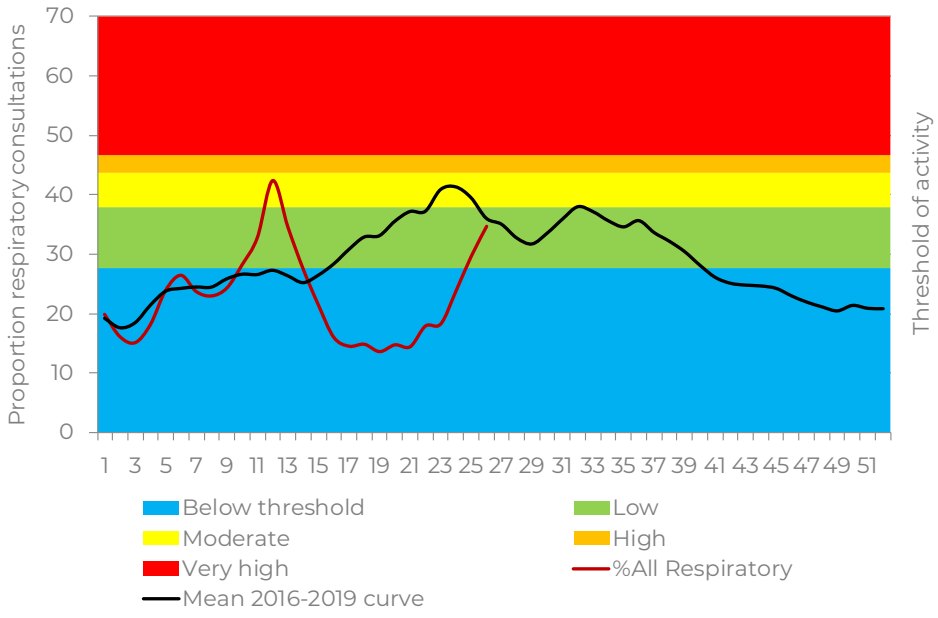
WEEK **26** 2020

GAUTENG PROVINCE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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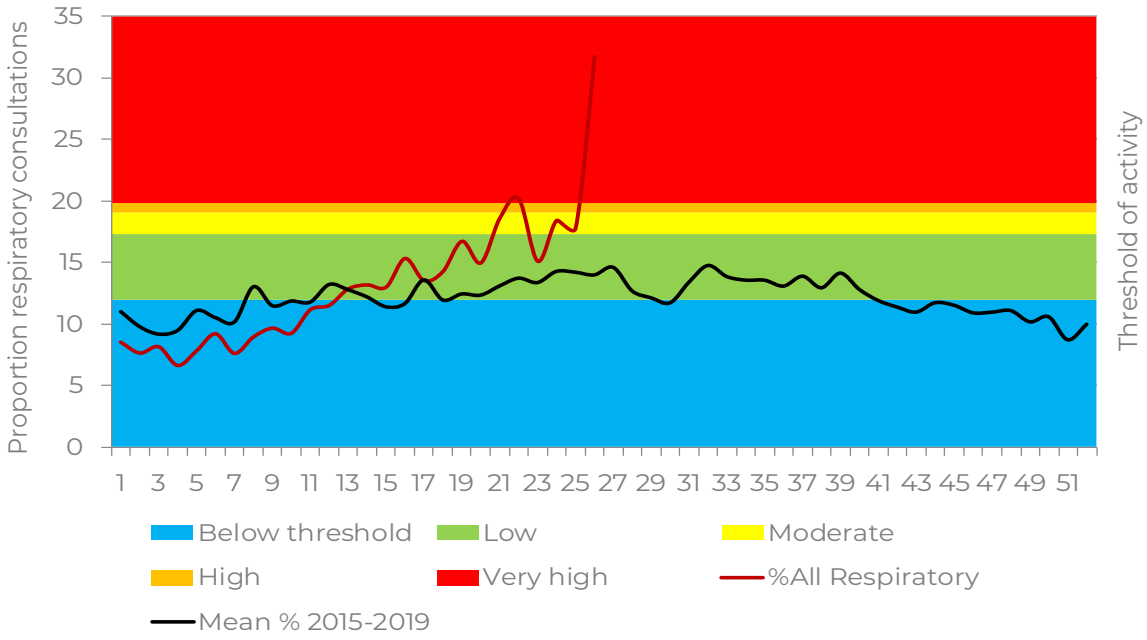
PRIVATE CONSULTATIONS SURVEILLANCE REPORT

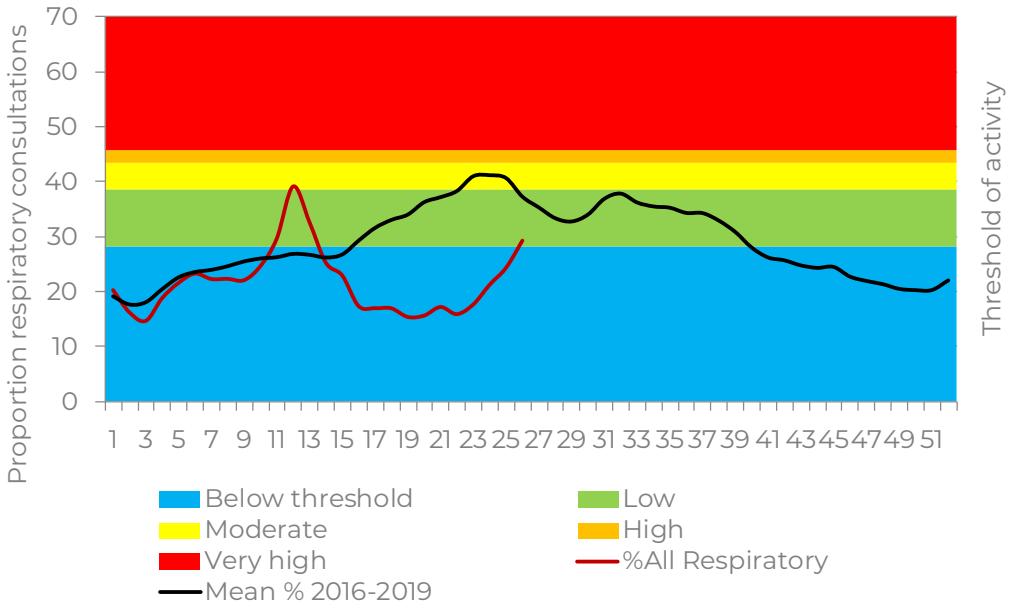
WEEK **27** 2020

KWAZULU-NATAL PROVINCE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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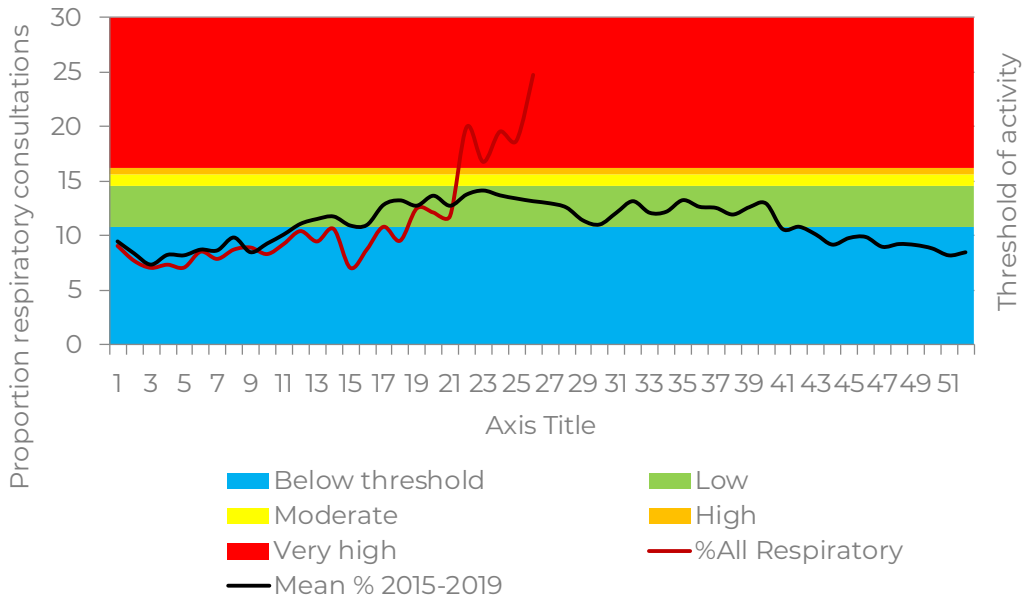
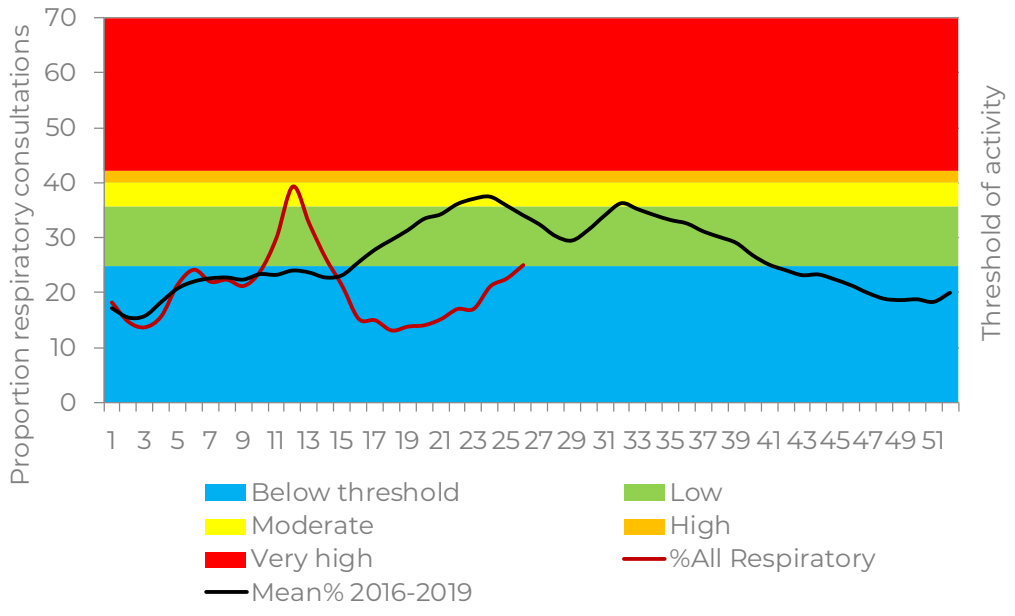
WEEK **27** 2020

WESTERN CAPE PROVINCE

All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Inpatients



All Respiratory including confirmed or suspected COVID-19 (J00-J99 & U07) indicators – Outpatients



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