Lay summary based on abstract TRENDS IN STROKE INCIDENCE IN SOUTH LONDON: A 28-YEAR POPULATION-BASED STUDY

Stroke Rates in South London: Three Decades of Change
Key Findings from New Research

A major study tracking stroke cases in South London over 28 years has revealed important changes in how often strokes occur in our community. The research, conducted by King's College London and local NHS partners, provides crucial insights for public health planning.

What Did We Do?

Research teams monitored stroke cases across 27 wards of South London between 1995 and 2022, covering a population of nearly 400,000 people. The study tracked first-time strokes, providing a clear picture of how stroke rates have changed over time.

Positive Overall Trend

The overall trend shows that stroke rates have decreased significantly since the mid-1990s:

- In 1995-1998, about 1.37 people per 1,000 experienced their first stroke
- By 2015-2018, this had fallen to 0.82 people per 1,000.

Looking more closely at the downwards trend:

    - The decline was seen across ethnic groups but was particularly evident in the White group (Figure 1H)

This decline suggests that improvements in public health, medical care, and lifestyle changes have helped reduce stroke risk in our community.

Recent Concerns

However, the study identified a concerning trend in recent years:

- Between 2019-2022, stroke rates increased slightly to 0.92 per 1,000 people
- This reversal of the long-term downward trend requires attention from health services.

Why This Research Matters

This research helps us understand:

- How our community's health is changing over time
- Where we need to focus healthcare resources
- Which public health strategies are working and which need adjustment

Implications for healthcare planning, commissioning and policy

The findings suggest we need:

- Continued investment in stroke prevention programs
- Special attention to what's driving the recent increase in stroke rates
- Targeted public health initiatives to address emerging risk factors

About the Research

This study represents one of the longest-running stroke monitoring programs in a diverse urban population. It was conducted by researchers from King's College London, working with the NHS and with support from the National Institute for Health and Care Research.

For more information about reducing your stroke risk or local stroke services, please contact your GP or local health authority.

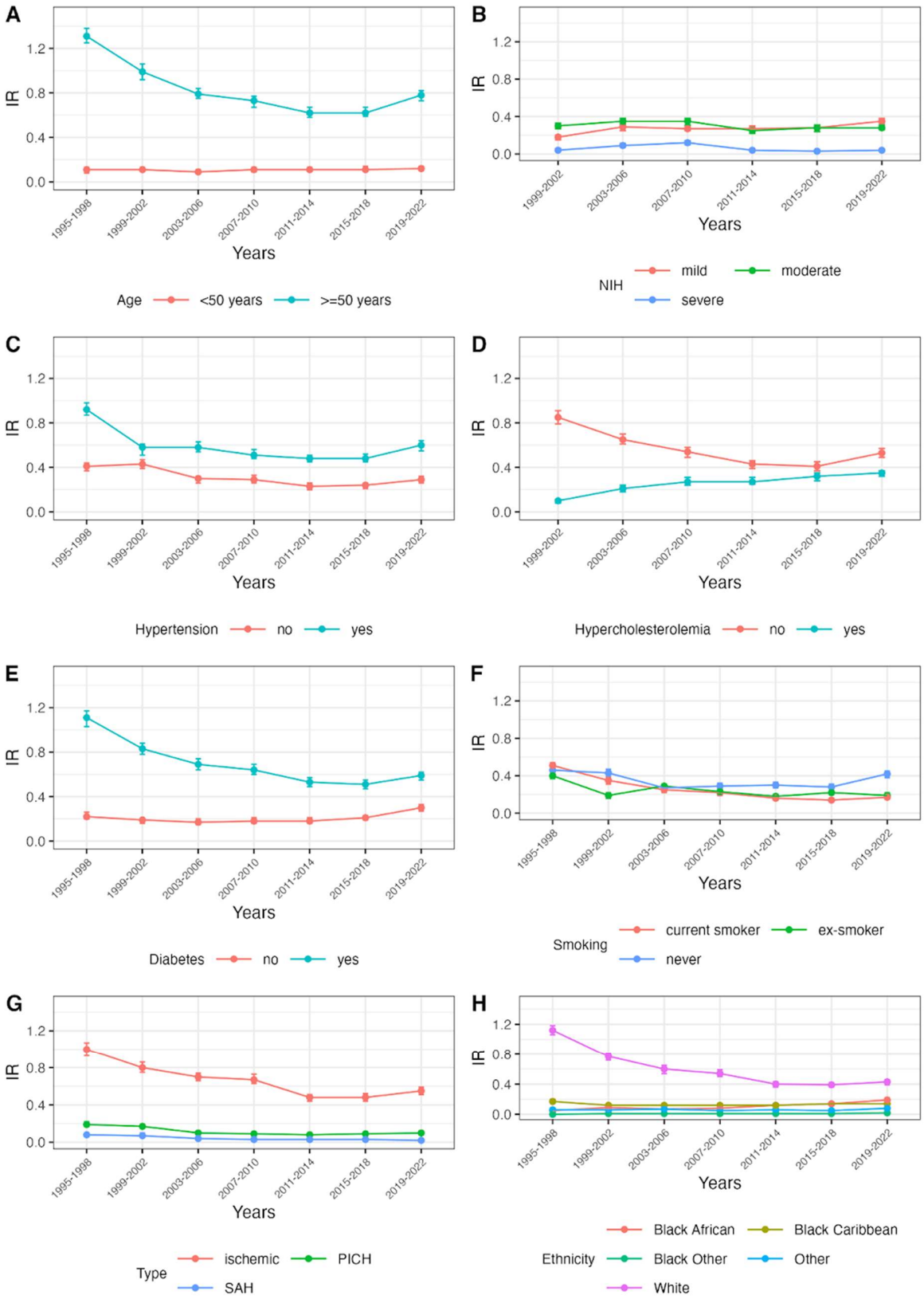

A
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Age
<50 years
>=50 years
B
IR
1.2
0.8
0.4
0.0
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
NIH
mild
moderate
severe
C
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Hypertension
no
yes
D
IR
1.2
0.8
0.4
0.0
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Hypercholesterolemia
no
yes
E
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Diabetes
no
yes
F
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Smoking
current smoker
ex-smoker
never
G
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Type
ischemic
PICH
SAH
H
IR
1.2
0.8
0.4
0.0
1995-1998
1999-2002
2003-2006
2007-2010
2011-2014
2015-2018
2019-2022
Years
Ethnicity
Black African
Black Caribbean
Black Other
Other
White

Figure 1. Local temporal incidence rates (95% Confidence Intervals) per 1,000 cases stratified by **A.** Age group (<50 years old; >-50 years old); **B**. NIH severity (mild, moderate, severe), **C.** hypertension, **D.** hypercholesterolemia status, **E.** diabetes status, **F.** smoking status, **G.** stroke clinical subtype (ischemic, SAH, PICH). **H.** ethnicity (white, black, other, undefined). NIHSS and hypercholesterolaemia data collection began in 1999, while all other variables were recorded from 1995 onwards. This results in a difference in the x-axis starting points for NIHSS compared to the other variables.