Anaemia remains a significant global health challenge

Despite a reduction in prevalence since 1990, anaemia remains a significant global health challenge. Substantial variation in anaemia burden exists by age, sex, and geography.

Prevalence of anaemia has fallen over the past three decades...

Global anaemia prevalence, 1990 to 2021



... and still, the condition is the third largest cause of years lived with disability (YLDs) globally, accounting for 52 million YLDs in 2021:





Children younger than 5 years are particularly afflicted by anaemia.







All-age YLDs per 100 000 population, by sex



Countries within sub-Saharan Africa and south Asia are afflicted at a significantly higher rate than other geographical regions worldwide.

All-age YLDs per 100 000 population, by geographical location





Although anaemia burden dramatically decreases with socioeconomic development in general, the burden in sub-Saharan Africa and south Asia is significantly worse than expected.





Socio-demographic Index is an estimated measure of socioeconomic development based on income, education, and under-25 fertility rate.

The most common causes of anaemia—accounting for 84.7% of YLDs caused by the disease in 2021—are:



However, cause-specific burden estimates vary substantially by location, and can be used to design

locally relevant health interventions aimed at improving anaemia management and prevention.

YLDs per 100 000 population 27.28 and over 9.55 to <27.28 1.85 to <9.55 0.42 to <1.85 Less than 0.42	Sub-Saharan Africa	South Asia	\$\$\$\$ High-income countries	
Dietary iron deficiency	1	1	1	
Haemoglobinopathies and haemolytic anaemias	2	2	3	
Other neglected tropical diseases	4	3	4	
Other unspecified infectious diseases	5	4	5	
Chronic kidney disease	9	5	2	
Malaria	3	10	15	
Vitamin A deficiency	6	7	11	
Endocrine, metabolic, blood, and immune disorders	11	6	6	
Gynaecological diseases	14	8	8	
Upper digestive system diseases	12	9	7	
Schistosomiasis	7	16	16	
Intestinal nematode infections	8	12	14	
HIV/AIDS	10	14	10	
Maternal disorders	13	11	12	
Inflammatory bowel disease	16	13	9	
Cirrhosis and other chronic liver diseases	15	15	13	
Top-16 causes of anaemia worldwide, ordered by global rank.		Numbers indicate regional rank.		

For example, interventions aimed at tackling communicable, maternal, and nutritional causes of anaemia would have a greater impact in regions where prevalence is high, such as sub-Saharan Africa, and south Asia, than in regions where prevalence is low, such as high-income countries.

GBD 2021 Anaemia Collaborators. Prevalence, years lived with disability, and trends in anaemia burden by severity and cause, 1990–2021: findings from the

Global Burden of Disease Study 2021. Lancet Haematol 2023; published online July 31. https://doi.org/10.1016/S2352-3026(23)00160-6



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