

Ecuador is located in northwestern South America, bordering on Colombia, Peru, and the Pacific Ocean. It covers an area of 256,370 km<sup>2</sup> and is divided into four regions: coastal, mountain, Amazon, and island. The political divisions include 24 provinces and 269 cantons, with their respective parishes.

The population is highly multiethnic and multicultural, including the following groups: mestizo (71.9%), the coastal mestizo group known as montubia (7.4%), Afro-Ecuadorian (7.2%), indigenous (7.0%), white (6.1%), and other (0.4%).

The per capita gross national income was US\$ 11,190 in 2014. The economy has reaped the benefits of high oil prices, international financial flows, and better tax collection.

2019 population (millions) **17.3**  
Life expectancy (years) **77**

### THE DISEASE BURDEN AFFECTING MENTAL HEALTH

Mental, neurological, substance use disorders and suicide (MNSS) cause 19% of all disability-adjusted life years (DALYs) and 36% of all years lived with disability (YLDs).

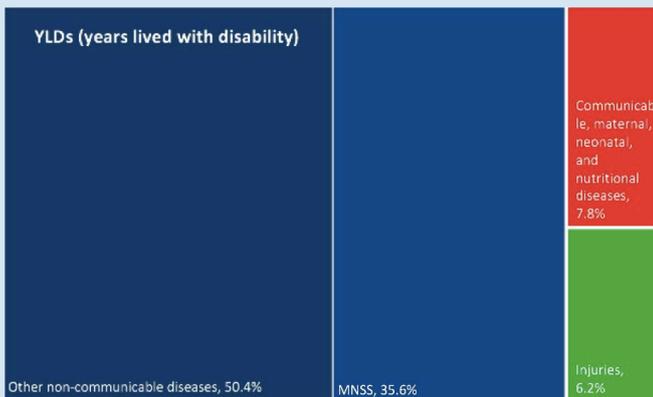


Figure 1. Distribution of YLDs with a focus on mental, neurological, substance use disorders and self harm (MNSS)

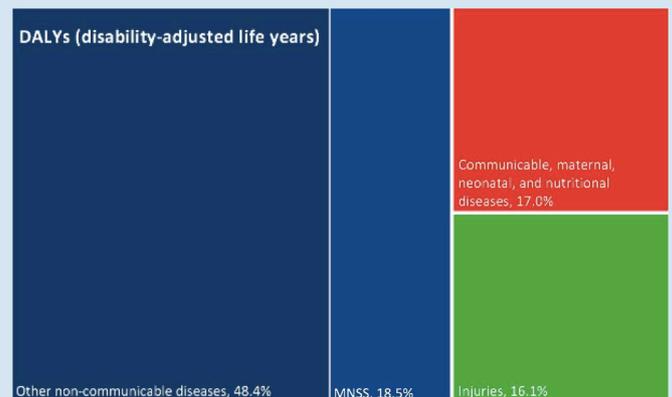


Figure 2. Distribution of DALYs with a focus on mental, neurological, substance use disorders and self harm (MNSS)

### THE BURDEN AFFECTING MENTAL HEALTH ACROSS THE LIFETIME

Fig. 3 shows the changes in disease burden across age-groups. NCDs (in shades of blue) surpass 50% of the burden at 5 years old, and will remain the largest burden throughout the lifetime. MNSS account for between a fourth and a third of the total burden between 10 and 45 years of age, the largest burden of all disease groups during this period.

Fig. 4 focuses exclusively on the burden resulting from MNSS. Until 5 years old, the MNSS burden is mostly due to epilepsy (57%) and autism (37%). Between 5 and 15 years old, the burden of conduct disorders (18%), anxiety disorders (16%), and headaches (15%)—including migraine and tension-type—gain prominence. Around 20 years of age, a pattern emerges that will remain stable throughout youth and adulthood: common disorders (anxiety, depression, self-harm and somatic symptom disorder) account for 42%, headaches for 19%, substance use disorders 17% (12% due to alcohol), and severe mental disorders (schizophrenia and bipolar disorders) 8%. The elderly suffer mostly from neurocognitive disorder due to Alzheimer's disease, which reaches 50% of the burden around 80 years old and surpasses 70% at 90 years old.



Figure 3. Burden of disease, by disease group and age

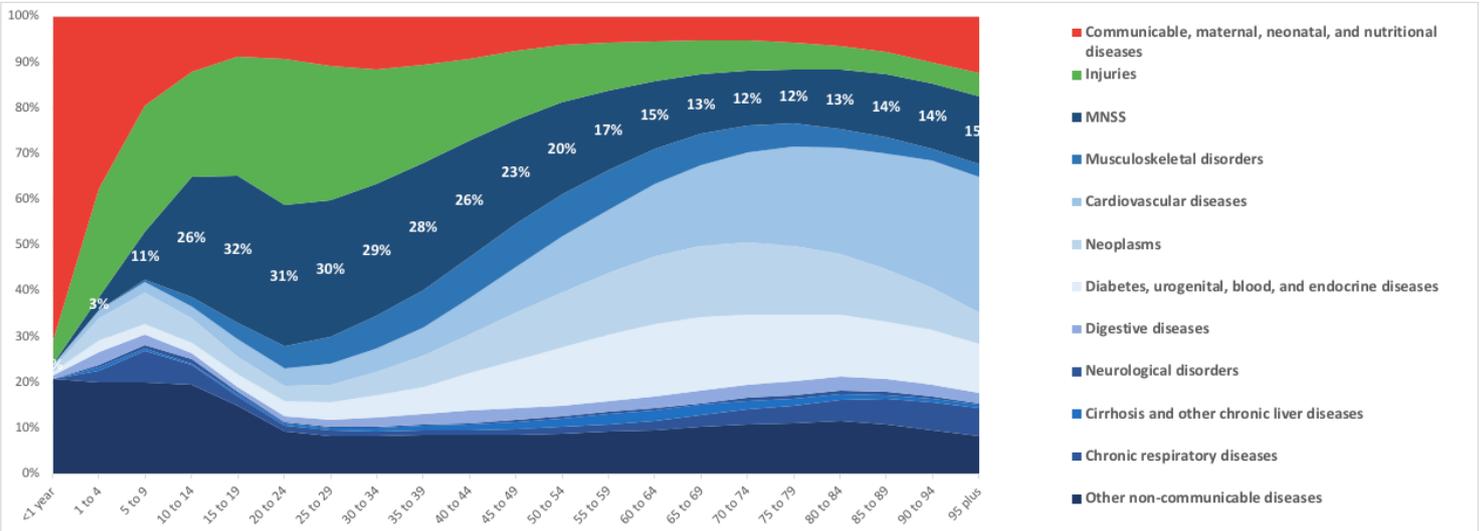
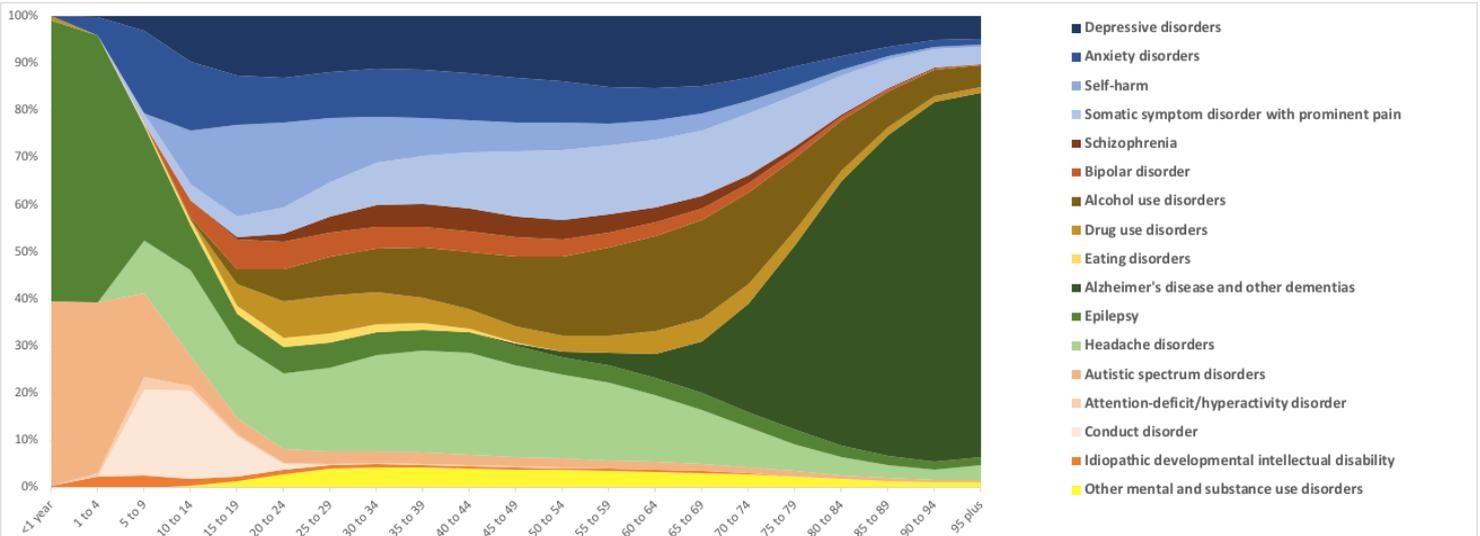


Figure 4. Burden of disease, by MNSS and age



## THE BURDEN AFFECTING MENTAL HEALTH IN MEN AND WOMEN

The top three disorders in terms of disability-adjusted life-years –accounting for 35 to 50% of total MNSS burden- are not the same for men and women: While men are mostly affected by alcohol use disorders, self-harm and suicide, and headaches, women are mostly affected by headaches, depressive and anxiety disorders.

Men		Women	
Disorder	DALYs per 100 000	Disorder	DALYs per 100 000
MNSS (all)	4649	MNSS (all)	4386
Alcohol use disorders	760	Headache disorders	909
Self-harm and suicide	547	Depressive disorders	637
Headache disorders	535	Anxiety disorders	507
Depressive disorders	453	Somatic symptom disorder with prominent pain	471
Somatic symptom disorder with prominent pain	417	Alzheimer's disease and other dementias	325

### Conclusions:

Considering these estimates, primary care providers should receive training and tools to prioritize detection and treatment or referral for the common disorders highlighted above for each age-group and sex. For the severe disorders –such as autism, schizophrenia, bipolar disorder and Alzheimer's– as well as for severe, comorbid, or complex presentations of other disorders –e.g. depression during pregnancy, substance use in public service professions, etc.– primary care providers and families need access to adequate supports, such as:

- Referral and/or supervision platforms that allow for continued treatment in the community, including the use of digital technology to increase access to distant geographically concentrated resources.
- Emergency, inpatient, and residential services for the management of high-risk acute situations and high-need patients. These services should be community-based as much as possible, including for crisis management, inpatient treatment in general hospitals, supported housing, and residential services.