

# Ways to cost environmental pollution: DALYs and QALYs explained

## DISABILITY ADJUSTED LIFE YEAR



LOSS OF HEALTHY  
LIFE YEARS DUE TO  
ILLNESS/INJURY



INCLUDES:

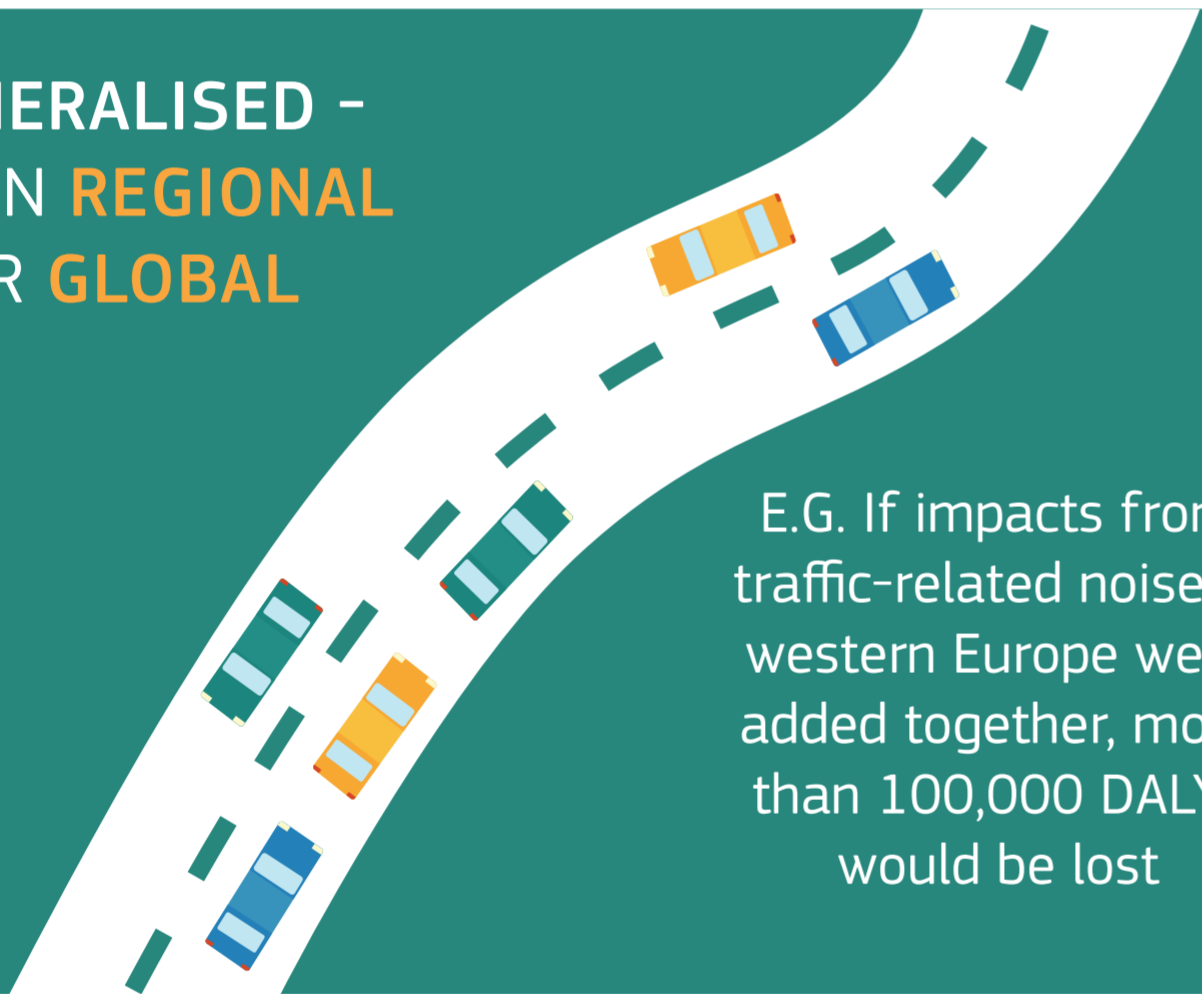
NUMBER OF YEARS LIVED  
WITH A DISABILITY



HEALTHY YEARS LOST DUE  
TO PREMATURE DEATH



GENERALISED -  
OFTEN **REGIONAL**  
OR **GLOBAL**



E.G. If impacts from  
traffic-related noise in  
western Europe were  
added together, more  
than 100,000 DALYs  
would be lost

USED: TO SHOW GAP BETWEEN  
**CURRENT** AND **IDEAL** HEALTH SITUATIONS



Also used to quantify total  
disease burden due to  
environmental pollution

## QUALITY ADJUSTED LIFE YEAR

YEARS OF LIFE  
SPENT IN  
PERFECT HEALTH



INCLUDES:

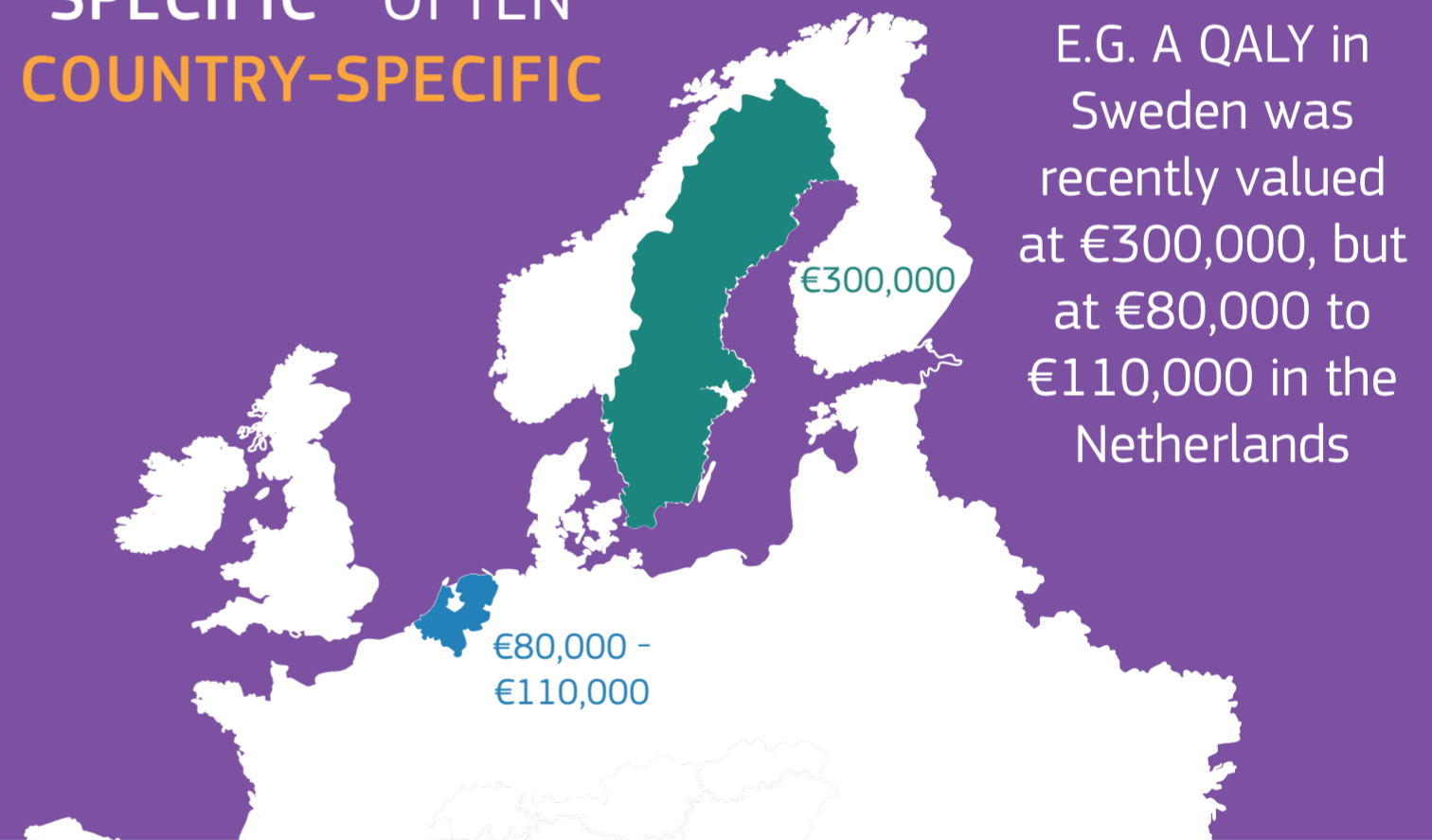
MORBIDITY



MORTALITY



SPECIFIC - OFTEN  
**COUNTRY-SPECIFIC**



E.G. A QALY in  
Sweden was  
recently valued  
at €300,000,  
but  
at €80,000 to  
€110,000 in the  
Netherlands

USED: TO COMPARE INTERVENTIONS AND  
INFORM **RESOURCE ALLOCATION**



Also used to assess the  
cost-effectiveness of new drugs



SEE **SCIENCE FOR ENVIRONMENT POLICY'S** FUTURE BRIEF:  
WHAT ARE THE HEALTH COSTS OF ENVIRONMENTAL POLLUTION?

