# HEALTHY HOMES BAROMETER

## GEBÄUDE QUALITÄTEN IM GESPRÄCH

SEPTEMBER 11, 2017

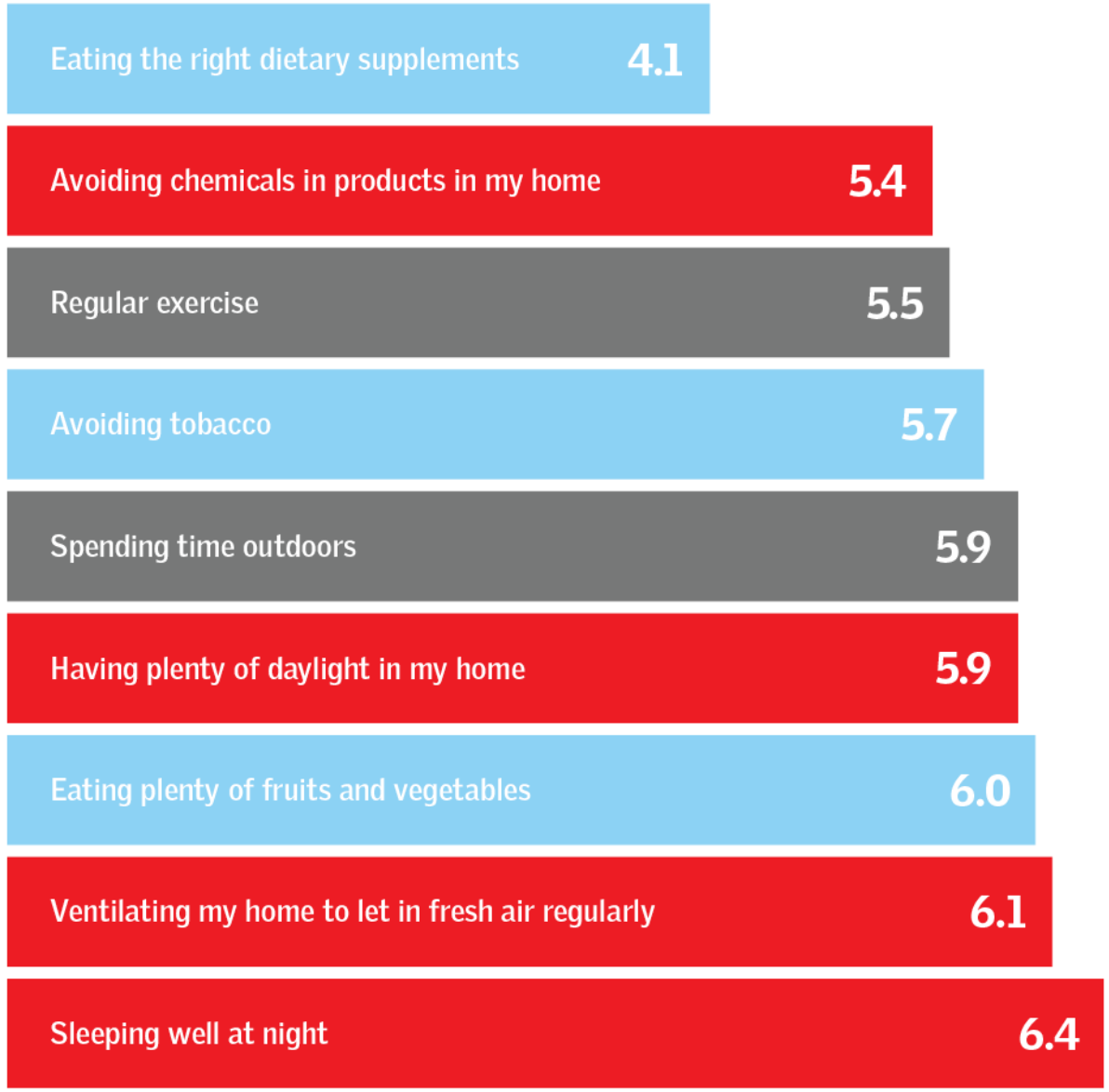
PETER FOLDBJERG, DAYLIGHT, ENERGY AND INDOOR CLIMATE AT VELUX A/S

# THE HEALTHY HOMES BAROMETER 2015 & 2016

- *1st Healthy Home Barometer (2015) was a questionnaire-based survey and **12,000** Europeans in 12 European countries replied.*
- *2nd Healthy Homes Barometer (2016), included additional two countries (Spain, Switzerland), giving a total of **14,000** answers.*

Austria, Belgium, Czech Republic, Denmark, France, Germany, Hungary, Italy, the Netherlands, Norway, Poland, Spain, Switzerland and the UK

# WHAT IS A HEALTHY HOME TO EUROPEANS?



# VENTILATION AND AIR QUALITY

HHB 2015

- Fresh air has high importance (51 %).

Summer:

- 68 % air out more than more than once a day
- 22 % air out once a day.

Winter:

- 28 % air out more than once a day
- 48 % air out once a day.

# VENTILATION AND AIR QUALITY

HHB 2016

Most important reasons for opening the windows:

- Part of a daily routine (74%)
- To let out ‘unhealthy’ air (75%).

Time of day for opening windows:

- 66% open windows when they wake up
- 28% open windows before going to sleep

# DAYLIGHT CONDITIONS

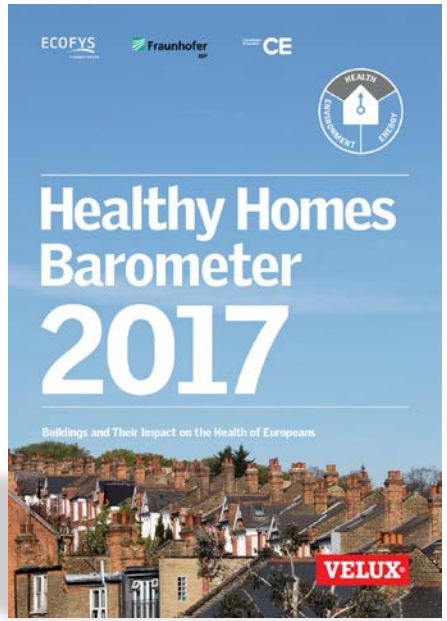
- 37% of Europeans say they **lack daylight** in their living room
- 20% say that they are **too dependent** on artificial light during the day.
- 76% report that they **need to turn on the electric** light during the day when it is daylight outside.

# THE HEALTHY HOMES BAROMETER 2017

- *The 3rd Pan-European survey investigating the link between homes and health*

- *The first report to use detailed statistical data from **Eurostat SILC** to show the correlation between the health of an inhabitant and the building's state*

- *Research based on **250,000 adults** (+16) and **100,000 households** across all EU Member States, except Germany*



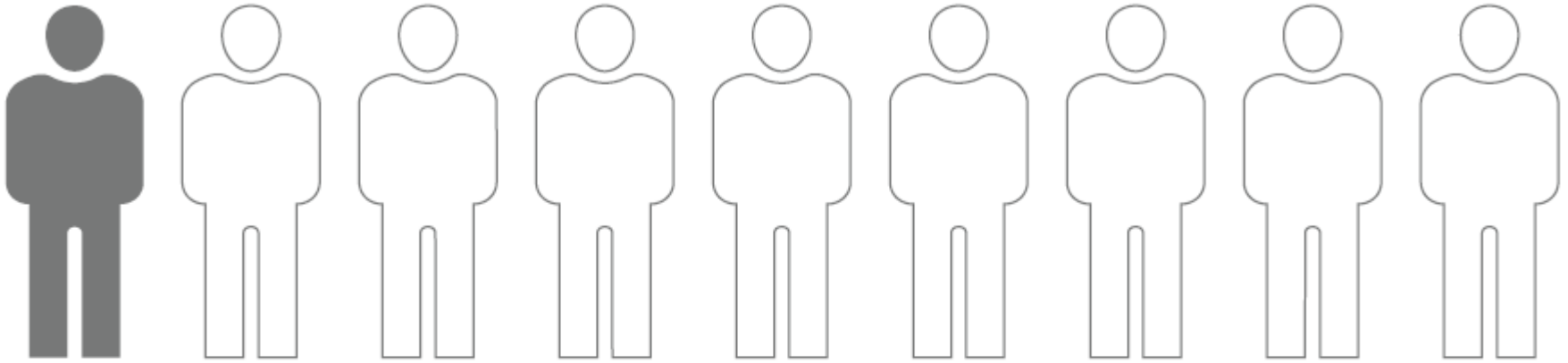
VELUX®

ECOFYS
A Navigant Company

Fraunhofer
IBP

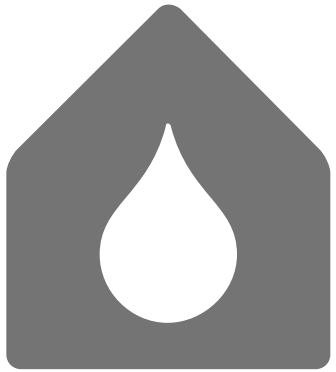
Copenhagen Economics
CE

# 1 OUT OF 9 AUSTRIANS LIVES IN UNHEALTHY BUILDINGS



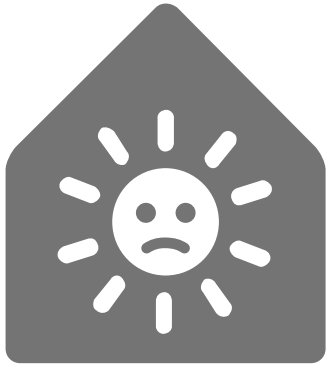
**1 von 9 Österreichern lebt in einem ungesunden Gebäude.**

# EUROPEANS LIVING IN DAMP OR DARK BUILDINGS ARE MORE LIKELY TO REPORT POOR HEALTH



**x1.7**

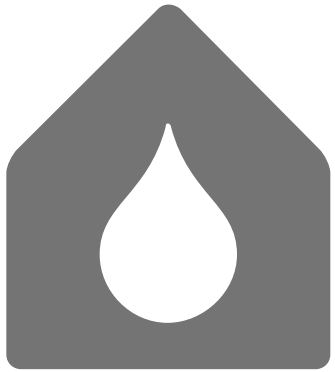
*Almost twice as many Europeans report poor health when living in a damp home*



**x1.5**

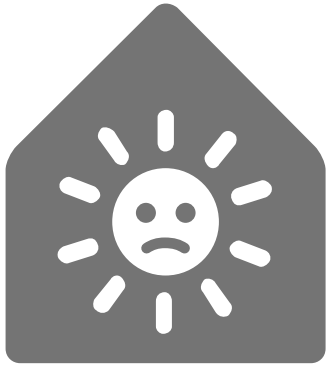
*1½ times as many Europeans report poor health when living in a dark home*

# AUSTRIANS LIVING IN DAMP OR DARK BUILDINGS ARE MORE LIKELY TO REPORT POOR HEALTH



x1.3

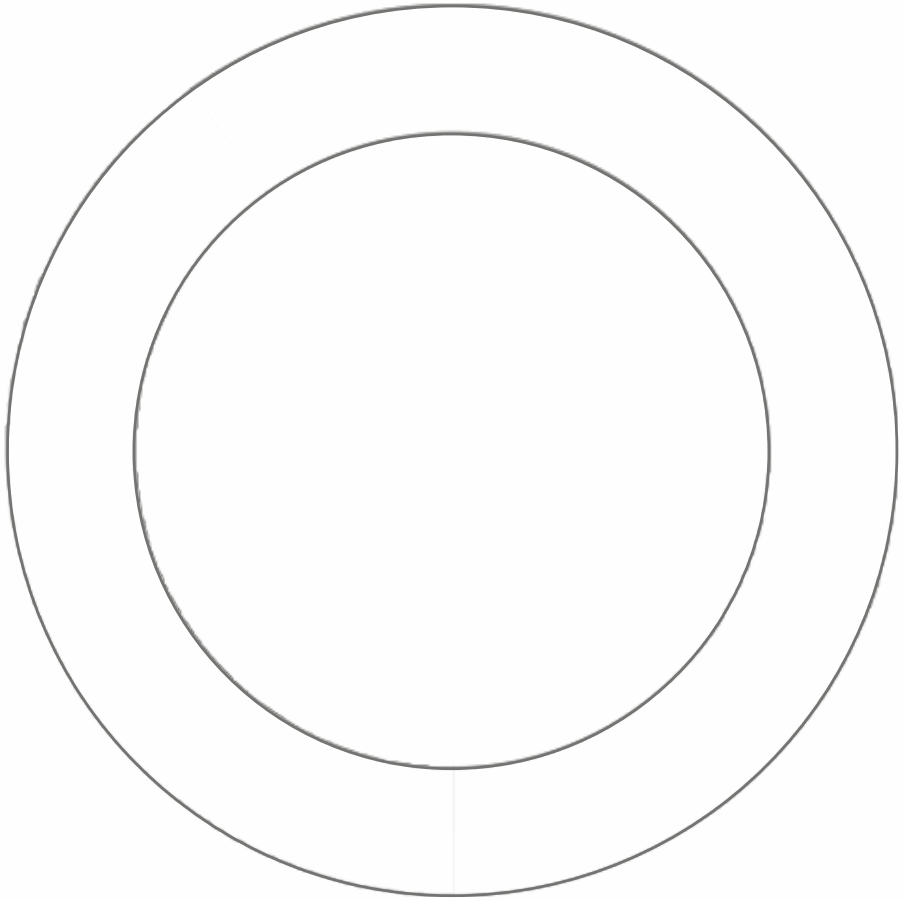
*More Austrians report poor health when living in a damp home*



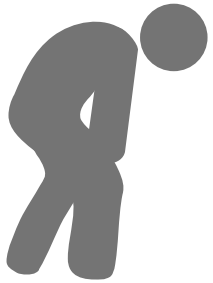
x2

*Almost twice as many Austrians report poor health when living in a dark home*

# EUROPEANS ARE 40% MORE LIKELY TO HAVE ASTHMA WHEN THEY LIVE IN A DAMP OR MOULDY HOME



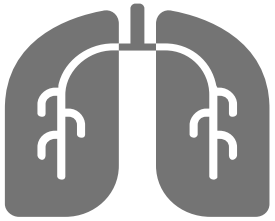
# UNHEALTHY BUILDINGS AND THEIR COSTS TO SOCIETY



*€40 bn*

*Indirect annual cost of asthma and chronic obstructive pulmonary disease, eg. loss of work productivity* [22]

+



€42 bn

*Direct annual cost of treating asthma and chronic disease, eg. medicine and care*

=

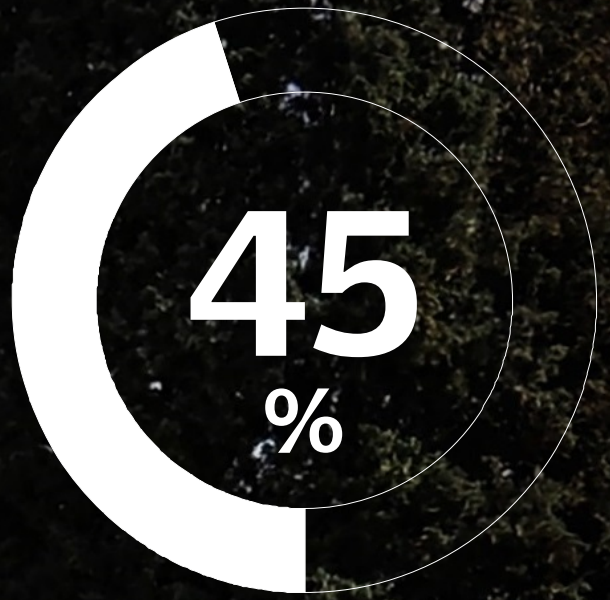
€82 bn

*Total annual cost for European societies attributable to asthma and chronic obstructive pulmonary disease*

# THE RISING THREAT OF ENERGY POVERTY

*Energy poverty:*

- *Rising energy prices*
- *Low income*
- *Non energy-efficient building*




*keep their temperatures down in order to lower their energy bills*

# HEALTH RISKS OF LIVING IN A COLD HOME

*When Europeans cannot keep their homes comfortably warm in winter:*

*Twice as many Europeans report poor health*

*Twice as many Europeans report lack of daylight*

*Almost three times as many Europeans report dampness*

# HEALTH RISKS OF LIVING IN A COLD HOME

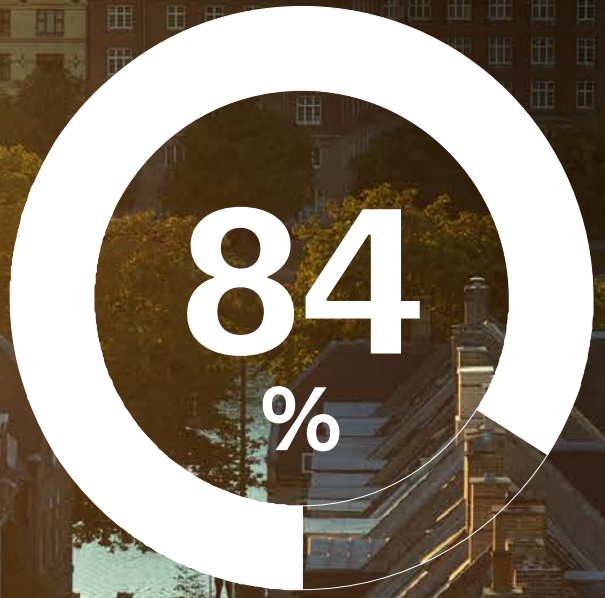
*When **Austrians** cannot keep their homes comfortably warm in winter*

*Three times as many Austrians report poor health*

# PRIVATE HOMEOWNERS ARE KEY TO INCREASE RENOVATION RATE

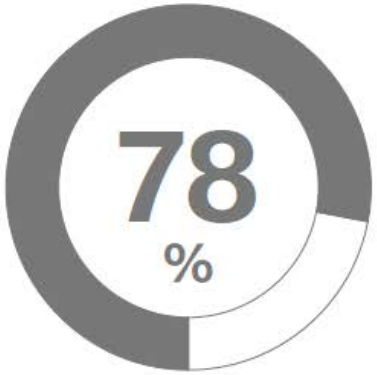
**110 million**

*is the numer of single-family homes in Europe*

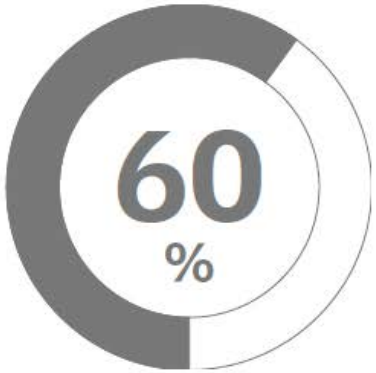



*of single-family homes are privately owned*

# PRIVATE HOMEOWNERS ARE KEY TO INCREASE RENOVATION RATE




78% der Einfamilienhäuser sind im Privatbesitz.

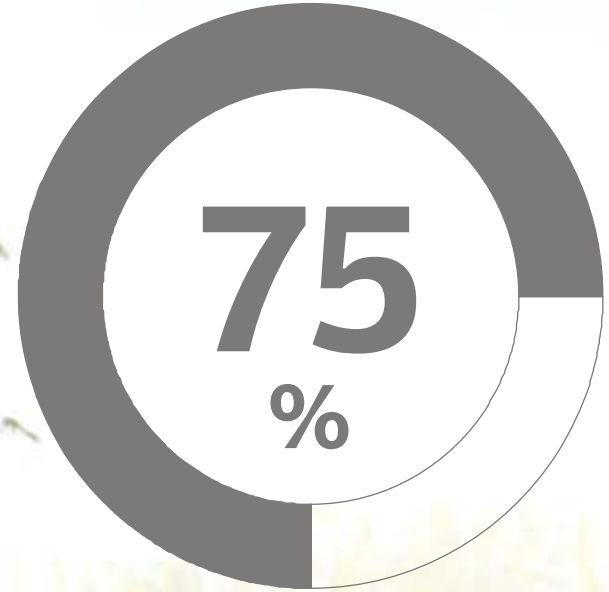



60% der österreichischen Haushalte können sich eine Renovierung leisten.

# COMFORT AND WELL-BEING DRIVE RENOVATION

*What motivates Europeans to renovate their homes*

*Improve well-being*




*Save energy costs*

VELUX®

# THANK YOU FOR LISTENING

# HEALTHY HOMES BAROMETER

GEBÄUDE QUALITÄTEN IM GESPRÄCH

SEPTEMBER 11, 2017

PETER FOLDBJERG, DAYLIGHT, ENERGY AND INDOOR CLIMATE AT VELUX A/S
PETER.FOLDBJERG@VELUX.COM