

*STREAM Newsletter 15  
May 2019*

# NEWS STREAM

*Sustainable  
Employability in the  
Netherlands*





# Sustainable employability in the Netherlands

For many years now, TNO has been running the programme '[Monitoring Work & Employment](#)', financially supported by the Dutch Ministry of Social Affairs and Employment. As a part of this programme, TNO monitors trends in the sustainable employability of the working population in the Netherlands. The programme contains several data sources, that each look at the Dutch labor market from a different perspective. STREAM is one of the data sources.

In the summer of 2018 TNO published a report containing the state of the art with regard to sustainable employability in the Netherlands, including new insights into the matter based on analysis of the data sources in the programme 'Monitoring Work & Employment'. The report is titled '[Duurzame Inzetbaarheid in Nederland](#)' (only available in Dutch).

In general, in the Netherlands, sustainable employability is relatively favourable. Dutch workers wish to, and think they are able to, work until a higher age than most workers in other European countries. However, workers with a lower education are lagging behind.

In this newsletter, we will focus on the results included in the report that are based on STREAM, or on STREAM's younger sister, CODI (see [Newsletter #11](#)). First, we will go into the role of health in early retirement. Then we will go into the effect of lifestyle on sustainable employability. Finally, we will focus on the quality of work.

We hope you enjoy this newsletter!

## The STREAM team



## STREAM TNO STAFF

DR. SWENNEKE VAN DEN HEUVEL

DR. GOEDELE GEUSKENS

DR. KAREN OUDE HENGEL

DR. LINDA KOOPMANS

DR. IRENE NIKS

DR. ERNEST DE VROOME

LENNART VAN DER ZWAAN

STEF BOUWHUIS

PROF. DR. PAULIEN BONGERS

## IN COLLABORATION WITH

PROF. DR. ALLARD VAN DER BEEK, VUMC

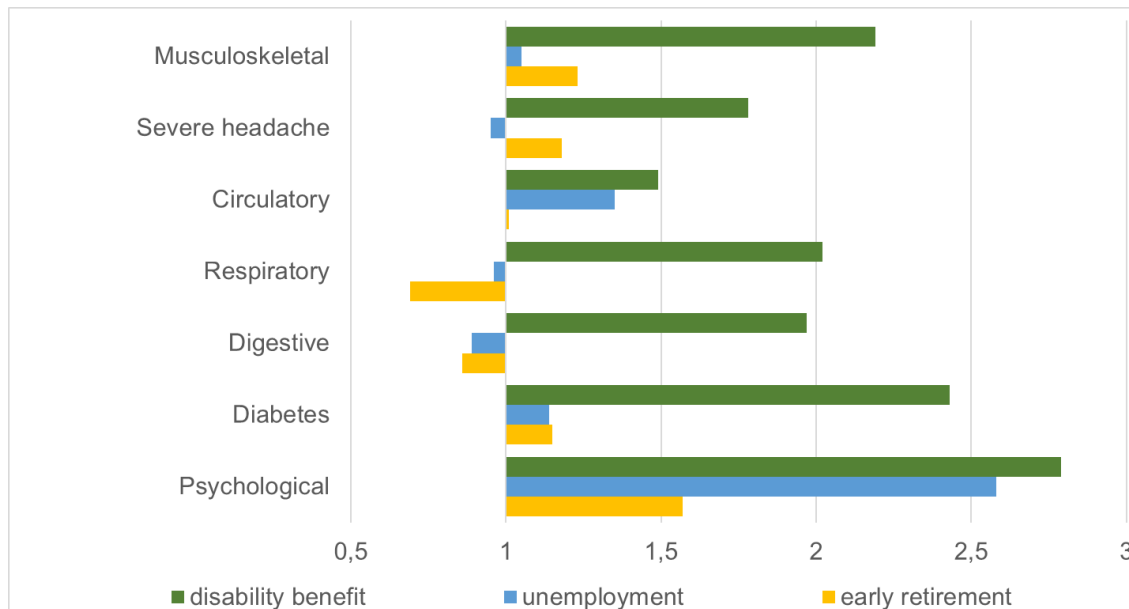
PROF. DR. KÈNE HENKENS, NIDI

PROF. DR. ALEX BURDORF, ERASMUS MC



# Sustainable employability – the role of health

It will come as no surprise that many studies identify health as a very important determinant of sustainable employability. Since health problems increase with age, and the working population is ageing, health will become even more important in the future. Our analyses show that mental as well as physical health are the main predictors of work disability. The figure below shows the hazard ratio's by type of disease for exit from paid employment in the next three years in the STREAM population. Almost all health problems were related to an increased risk of disability benefits. Workers with psychological problems were also at an increased risk of unemployment or early retirement. Workers with musculoskeletal problems were also at an increased risk of early retirement, while workers with circulatory problems were at risk of unemployment.



Health problems seem to be stronger predictors of exit from paid employment than work characteristics. However, work characteristics may buffer the effect of health on work participation. The same study using STREAM data also looked at the interaction of work characteristics and health in their influence on exit from paid employment. No significant interactions were found in exit to unemployment or to early retirement. Regarding disability benefits, the results showed that high autonomy could buffer the effect of health problems on this exit route. Of the workers with health problems and low autonomy, 2.6% left their job in the next three years to receive disability benefits, while only 1.4% of the workers with health problems and high autonomy left to receive disability benefits.

Based on the following publications:

Swenneke van den Heuvel, Martine van Egmond. Duurzame inzetbaarheid en gezondheid. [Sustainable Employability and Health]. In Niks IMW, Sanders JMAF, Van den Heuvel SG (eds.) Duurzame inzetbaarheid in Nederland. Leiden, TNO, 2018. Available at: [link](#) (only in Dutch)

Leijten, F. R. M., De Wind, A., Van den Heuvel, S. G., Ybema, J. F., van der Beek, A. J., Robroek, S. J. W., & Burdorf, A. The influence of chronic health problems and work-related factors on loss of paid employment among older workers. *Journal of Epidemiology and Community Health* 2015;69(11):1058-1065.



## Sustainable employability – Lifestyle

To explore the effect of lifestyle factors on sustainable employability we used data from CODI, another cohort study on sustainable employability that also includes younger age groups. We studied whether employees, self-employed and non working persons differ regarding lifestyle, and whether work transitions are related to lifestyle factors. As lifestyle factors we included smoking (yes/no), alcohol consumption (glasses p/w) and meeting the activity guideline. The activity guideline is based on the advice of the Dutch Health Council and advises moderate to intensive activity for at least 150 minutes every week, and muscle-strengthening exercises at least twice a week .

The results show that employees meet the activity guideline less often than self-employed and non working persons, while their alcohol consumption is lower. Work ability, productivity and sickness absence seems to be hardly related to lifestyle factors, except that on average smokers have one more day of sickness absence. Possibly, lifestyle mainly has long term effects.



**Lifestyle** (meeting the activity guideline, alcohol consumption and smoking) **in relation to work status and indicators of sustainable employability in CODI (n=18.038); the grey printed figures are not statistically significant**

	Activity guideline	Alcohol-consumption	Smokers
	% that meets the guideline	Glasses per week	% smokers
Employed	56%	4.5	17%
Self-employed	61%	6.8	18%
Not working	62%	5.4	17%
Working in 2015 and 2016	57%	4.8	17%
Stopped working in 2015-2016	62%	5.4	17%
	When meeting the guideline	Correlation-coefficient	When smoking
Work ability (scale 0-10; mean 8.00)	8.05	0.01	7.96
Productivity (scale 0-10; mean 7.92)	7.94	-0.01	7.94
Sickness absence (mean 6.17 days/year)	6.03	-0.03	7.22

Based on:

Swenneke van den Heuvel, Martine van Egmond. Duurzame inzetbaarheid en gezondheid. [Sustainable Employability and Health]. In Niks IMW, Sanders JMAF, Van den Heuvel SG (eds.) Duurzame inzetbaarheid in Nederland. Leiden, TNO, 2018. Available at: [link](#) (only in Dutch)

# Sustainable employability – quality of work

‘Good jobs’ and ‘bad jobs’, what is the difference and how do they affect the sustainability of careers? In good jobs, high quality of work is supposed to keep workers from leaving the workforce. However, the quality of work seems to be decreasing; work is less challenging and workers have less autonomy, contracts are more often flexible and job security is decreasing.

Using the STREAM data, we studied the quality of work. How is the quality for different groups of workers, different sectors and how does quality of work relate to exit from work? The quality indicators are partly based on those developed by the European Foundation for the improvement of living and working conditions.

The results show that the quality of the physical work environment is higher among highly educated workers and that they have more autonomy (job discretion). However, they are more often confronted with high demands and high emotional load, resulting in a higher job intensity. Differences between sectors are large. Quality of work in business services (e.g. banks and insurance companies) is generally high, whereas quality in transport and hotel and catering industry is low on most indicators.

In the table, it is shown how quality indicators relate to early exit from the workforce. A favourable physical and social work environment and high job discretion, seem to decrease the risk of early exit. Lower quality of the physical work environment is related to disability benefits but not to other exit routes. Better job discretion decreases the risk of unemployment and disability benefits, but is not related to early retirement.

The effect of quality indicators on exit from the workforce, adjusted for age, sex, and the other quality indicators (n=9,772)

	Exit from work			
	Total	Unemployment	Early retirement	Disability
	odds ratio	odds ratio	odds ratio	odds ratio
<b>Physical environment</b>	0.97▼	1.01	0.98	0.85▼
<b>Work intensity</b>	1.01	1.05	0.89▼	0.92
<b>Social environment</b>	0.94▼	0.89▼	1.01	0.97
<b>Job discretion</b>	0.92▼	0.87▼	0.99	0.88▼
<b>Earnings</b>	0.99	0.98	1.00	1.00

▲ or ▼: means a statistically significant higher/lower risk of exit from work ( $p < 0.05$ ).

Based on:

Swenneke van den Heuvel, Liza van Dam, Karen Oude Hengel. Kwaliteit van werk – invloed op vervroegde uitstroom. [Quality of work - effect on early exit]. In Niks IMW, Sanders JMAF, Van den Heuvel SG (eds.) Duurzame inzetbaarheid in Nederland. Leiden, TNO, 2018. Available at: [link](#) (only in Dutch)

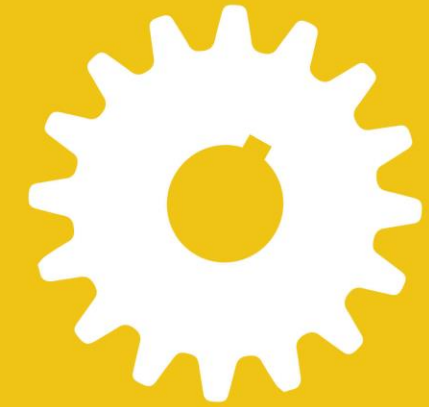


## What is STREAM?

STREAM is short for **Study on Transitions in Employment, Ability and Motivation**. STREAM is a **longitudinal study** among persons **aged 45-64** in the Netherlands. Participants fill in an online questionnaire on topics such as: health, work, knowledge and skills, social circumstances, and financial situation. More than **12,000 employees, 1,000 self-employed persons, and 2,000 non-employed** persons participated at baseline (2010). In 2017, over 40% had participated in each wave. In 2015, a **new cohort** was invited to participate, to again include persons aged 45-49 and to include more working persons in the other age groups (N=6,738). For data collection an existing Intomart GfK internet panel is used. For 89% of baseline participants, **data linkage** with information from **Statistics Netherlands** is possible.

In addition to STREAM, TNO started a new cohort study in 2016: **CODI**. Participants had previously participated in either the Netherlands Working Conditions Survey or the Netherlands Employers Work Survey.

STREAM and CODI are conducted by **TNO**. Collaborating partners are VU University Medical Center, Erasmus Medical Center and the Netherlands Interdisciplinary Demographic Institute. STREAM is funded by the Dutch Ministry of Social Affairs and Employment.



**TNO** innovation  
for life

**STREAM** is interested in **(inter)national and multidisciplinary collaborations** to conduct **innovative research with practical implications**.

Contact us for possible **partnerships!**

More information on STREAM is available at:

[www.monitorarbeid.nl/STREAM](http://www.monitorarbeid.nl/STREAM)

Contact: [infostream@tno.nl](mailto:infostream@tno.nl)