FILLING THE INFORMATION GAP ABOUT DIGITAL NOMADS
Contents

 ✓ Digital nomadism: a world to explore
 ✓ Results of two specific "surveys":
   1. Who are the digital nomads?
   2. Which countries are the most attractive?
 ✓ Conclusion
The term 'digital nomad' (Makimoto & Manners, 1997) was later recognised as a social phenomenon (Müller, 2016)

Digital nomads are professionals who work digitally on the internet to enable a lifestyle of constant travel and expatriation. (Schlagwein, 2018)

Digital nomadism is a modern phenomenon of the information society and digitalisation (Kuzheleva-Sagan & Nosova, 2017)

Most studies have focused on work-related aspects, (Jarrahi et al., 2019), employment (Thompson, 2018), and the benefits of remote working (Mouratidis, 2018)

It is a phenomenon difficult to quantify, there are no official statistics about it.
Trends in recent years

Worldwide, there were 35 million digital nomads in 2021.

Only pandemic effect?
Survey n. 1: Who are they?

Methodology

- Web scraping + data mining
  - Textual analysis of websites (facebook, twitter and LinkedIn), pages related to digital nomadism
  - R software
    Package: ‘Quanteda’ (Quantitative Analysis of Textual Data)
  - OPEN SOURCE supported by the European Research Council
Survey n. 1: Methodology

Statistical analysis

<table>
<thead>
<tr>
<th>Types of analyses</th>
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<tbody>
<tr>
<td>Word usage and frequencies</td>
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<tr>
<td>Word list</td>
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<tr>
<td>Comparison of word list</td>
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<tr>
<td>Key Word In Context</td>
</tr>
<tr>
<td>Text profile</td>
</tr>
<tr>
<td>Comparing the vocabularies of a number of texts</td>
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<td>Analysis of joint frequencies of words</td>
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<td>The vocabulary list</td>
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<td>Context units</td>
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<td>Text conventions</td>
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<td>Joint Frequencies</td>
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<td>Cluster analysis</td>
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<td>Non-hierarchical clustering</td>
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<td>Correspondence Analysis</td>
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<td>Using Correspondence Analysis</td>
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</table>
Who are digital nomads?

- BABY BOOMERS: 12%
- GEN X: 23%
- GEN Z: 21%
- MILLENNIALS: 44%

Medium average: 32 years old

Marital status (%): 
- Married: 61%
- Divorced: 39%

26% of digital nomads have children aged 18 or under. They travel with them? (%)
- Yes: 41%
- No: 59%
Accommodation, duration & life satisfaction

Where do they stay? (%)

- Sleep in a vehicle: 1%
- Choose youth hostels: 9%
- Live in hotels or B&B: 17%
- Stay with friends or family: 22%
- Use Airbnb or a similar service: 51%

Travelling but... for how long? (%)

- More than a year: 11%
- For 6 months to 1 year: 10%
- 3-6 months: 14%
- For 1 to 3 months: 65%

Life satisfaction (%)

- Are very satisfied: 81%
- Are less than satisfied: 10%
- Are satisfied: 9%

- ✓ 53% of the total plan to continue for at least two more years
- ✓ 96% would recommend this lifestyle to a friend
Jobs: employees or self-employed?

- Freelance for multiple companies: 38
- Run their own business: 33
- Employees for just one company: 23
- Jobseekers: 6

What kind/field of work?

- Marketing: 16
- IT Development: 15
- Digital Design: 12
- Online Courses: 9
- E-Commerce: 8
- Writing/Content: 7
- Photography: 7
- Customer care: 6
- Translation: 5
- Journalism: 5
- Coaching: 3
- Social media: 3
- Business: 2
- Architecture: 1
- Other: 1

UNECE EXPERT MEETING ON STATISTICAL DATA COLLECTION, Rome, October 28th 2022
Survey 2: Which countries are the most attractive?

The 22 most cited European cities in social media pages as "most liveable destinations".
These cities were analysed according to three broad categories:

✓ Costs and infrastructure (basic costs, availability of suitable office space, internet speed)
✓ Legislation and freedoms (special visa, tax deductions and regulations, extent of human rights and fundamental freedoms, as well as levels of security and support for gender equality and minority and LGBT inclusion etc)
✓ Habitability (factors that make a city a good place to live: access to culture and recreation, general weather and air levels, noise and light pollution, plus the percentage of vaccinated populations)

The resulting rankings offer an overview of the best cities for those looking for the ideal starting point for living and working remotely, as well as for those with the potential to attract this new generation of workers in the future.
Three broad categories under investigation

**Infrastructure**
Home (office) rental  
Availability of accommodation  
Coworking Infrastructure  
Income tax, incl. social security contributions  
Internet speed and capacity

**Habitability**
Covid-19 vaccination rate  
Cost of living  
Healthcare  
Culture & Leisure  
Weather  
Pollution - Air, Light, Noise

**Legislation & Freedoms**
Immigration for work reasons  
Visa requirements  
Security, freedom and rights  
Gender, LGBT and minority equality
The 15 scored factors consist of one or more indicators, that are normalised and summarised.

The composite indicator was calculated using the AMPI (Adjusted Mazziotta Pareto Index) formula, based on normalisation with the MIN-MAX method.

The synthetic index chosen is based on the method of penalties by coefficient of variation

\[ MPI^{+/−}_i = M_{ri} ± S_{ri} cv_i \]

Where M is the mean of the matrix of r observations.

S is the variance

cv is the coefficient of variation.
## Results

<table>
<thead>
<tr>
<th>City</th>
<th>Country</th>
<th>Synthetic index</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tallinn</td>
<td>Estonia</td>
<td>88,1</td>
</tr>
<tr>
<td>Berlin</td>
<td>Germany</td>
<td>82,9</td>
</tr>
<tr>
<td>Prague</td>
<td>Czech Republic</td>
<td>82,6</td>
</tr>
<tr>
<td>Lisbon</td>
<td>Portugal</td>
<td>81,2</td>
</tr>
<tr>
<td>Vienna</td>
<td>Austria</td>
<td>80,1</td>
</tr>
<tr>
<td>Madrid</td>
<td>Spain</td>
<td>79,2</td>
</tr>
<tr>
<td>Reykjavik</td>
<td>Iceland</td>
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<tr>
<td>Barcelona</td>
<td>Spain</td>
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<tr>
<td>Athens</td>
<td>Greece</td>
<td>76,9</td>
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<tr>
<td>Dublin</td>
<td>Ireland</td>
<td>76,9</td>
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<tr>
<td>Paris</td>
<td>France</td>
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<td>Zagreb</td>
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<td>Budapest</td>
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<td>Las Palmas</td>
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Conclusions I

✓ This analyses provide us with a lot of information on digital nomads but need to be refined as the research is only at an embryonic stage.

✓ A number of tools that help in analysis of text based data have been developed starting with dictionary-based methods, to classification methods, and state-of-the-art scaling methods and others models for estimating quantities from text using statistical techniques.

✓ This work will continue with the use of the Hamlet II software which allows further statistical analysis such as Singular Value Decomposition (Non-metric and metric multidimensional scaling methods), Using MINISSA and MRSCAL, Individual Differences Scaling (INDSCAL), Procrustean Individual Differences Scaling (PINDIS) and Multiple text comparison.

✓ About digital nomads there is still much to investigate…
Thank you, now I'm going to get on with my work!