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Using real-time tourism data for smarter decision-making

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Data is the focus

Key areas of future research and practices in destination marketing and management:

- destination governance
- the role of DMOs
- sustainable development and resilience
- new technologies
- destinations and **data**
- destination marketing

<https://doi.org/10.1016/j.jdmm.2025.101038>

Contemporary challenges in destination management, particularly those related to sustainability, tourism behavior, and mobility, require granular, local-scale **data** to inform public and private sector decisions.

<https://doi.org/10.3390/su17041430>

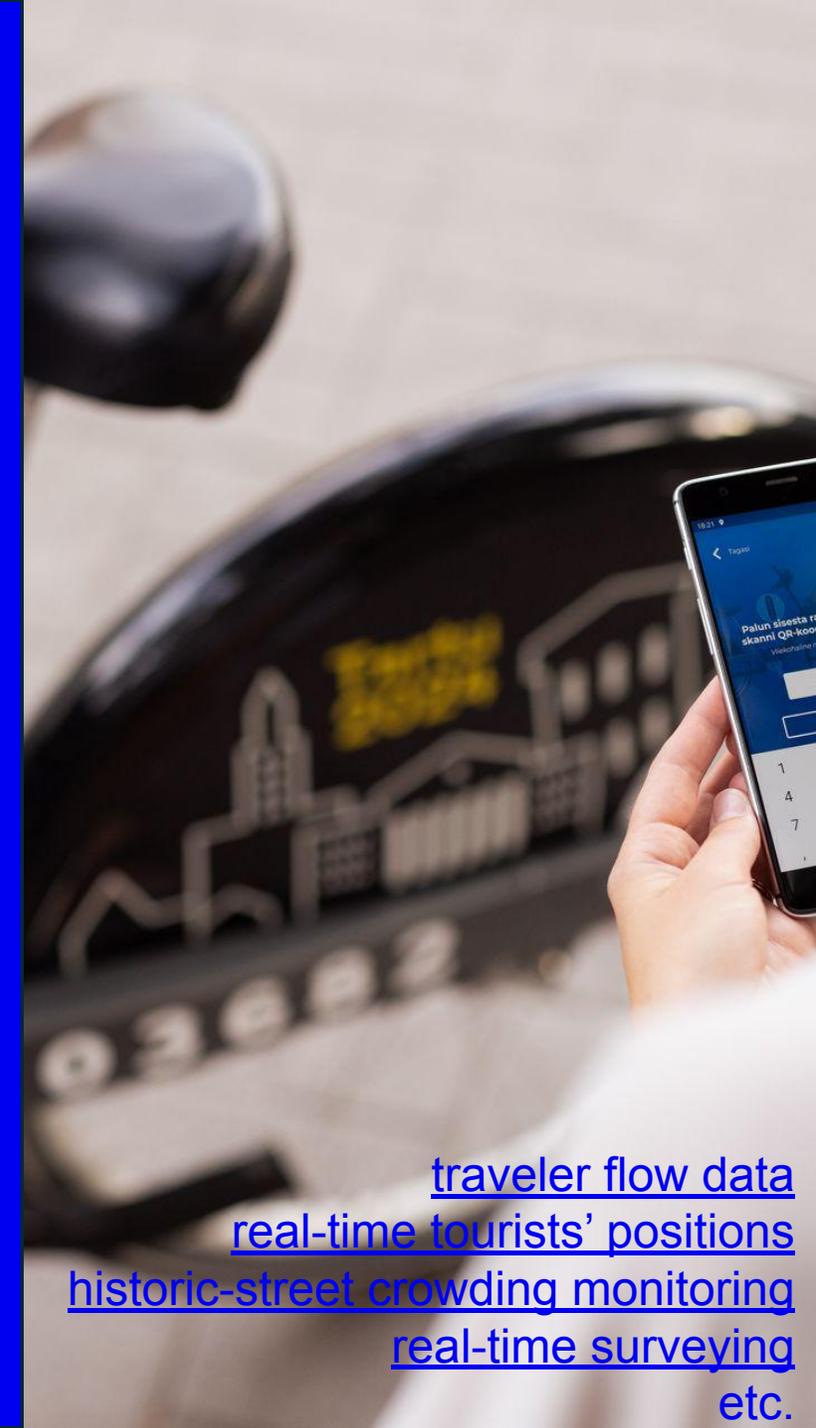


What is real-time data? 😊

- **real time**. Pertaining to a system or mode of operation in which computation is performed **during the actual time** that an external process occurs, in order that the computation results can be used to control, monitor, or respond in a timely manner to the external process.
- generated at a high frequency (e.g., daily or weekly)
- high spatial and temporal granularity

NB! Frequency for real-time depends on the field

- **Real-time data** - available instantly after its generation or collection
- **Near real-time data** - can take minutes or even hours to be accessible for analytics or other purposes
- Streaming data - continuously generated and flows into data pipelines from various sources



traveler flow data
real-time tourists' positions
historic-street crowding monitoring
real-time surveying
etc.

OECD (2025) Benefits of real-time data

For policy makers:

- to gain a deeper understanding of tourism dynamics,
- supporting them to identify emerging trends,
- anticipate future challenges, and
- capitalise on opportunities for sustainable tourism development.

For tourists:

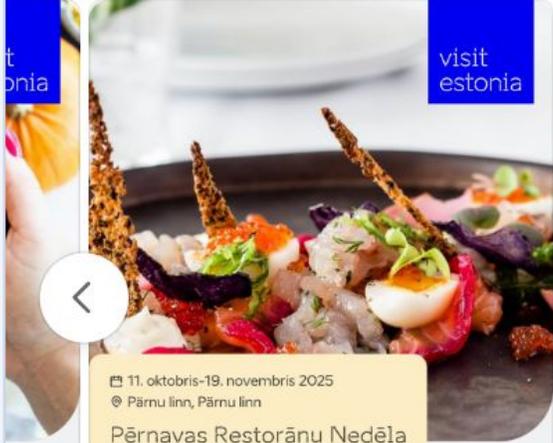
- to help plan their travel,
- for example, for changes in travel, response to changing weather and traffic, and for local events and attractions.



Visit Estonia Meta auto-banner Example | Food Festivals

Visit Estonia (Default)  Sponsored (demo) · 

Izbaudi Igaunijas garšas brīvdabas ēdienu svētkos 🍴🇺🇸



11. oktobris-19. novembris 2025
Pärnu linn, Pärnu linn
Pärnavas Restorānu Nedēļa

Pärnavas Restorānu... [Learn more](#)



27. septembris 2025
Narva-Jõesuu linn, Narva-Jõesuu linn
Nēgu Festivāls Narva-Jēsū

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Rietumigaunija

Pärnavas Restorānu Nedēļa

[PIEVENOT IZLASEI](#)

Pärnavas restorānu nedēļas ietvaros iepazīstināsim viesiem ļoti labus vasaras galvaspilsētas restorānus un lieliskus pavārus, kā arī uzicināsim nobaudīt a la carte ēdienkartes labākos ēdienus.

Pärnavas restorānu nedēļas laikā par īpašu cenu tiks piedāvātas 3 ēdienu vakariņas. Turklāt apmeklētājiem piedāvāsim daudz jaunu pārsteigumu. Si ir lieliska iespēja iepazīties ar ēdienu gatavošanas tendencēm, izbaudīt vietējo ēdienu kultūru un prezentēt Pērmavu kā aizraujošu kulinārijas galamērķi.

Uz tikšanos Pärnavas restorānos!

Datums
11. nov - 19. nov 2025

Atrašanās
Pärnu restorānīd - Lai tīnāv T3, Pärnu linn, Pärnu linn, Pärnu maakond

[Homepage](#) [Facebook](#)
[Instagram](#)

E-pasts
info@parnurestaurantweek.ee

FOODIE

Other examples at national and local level

Web activity – search trends, Google Analytics, insights for marketing decisions

Flight bookings and search data (weekly) – understanding market potential and campaign effects

Hotel benchmarking (daily) – monitoring sector performance, assessing the impact of events, and providing data for municipal managers' meetings

Scraped short-term rental data – monitoring the sector, supporting analysis and research, planning interventions and evaluating event impacts

Tallinn Card sales – tracking purchases

Sensors in the Old Town – monitoring visitor load

Mobile data – mapping people's movement in the city



Real-time Economy (RTE)

A digital ecosystem where transactions between different parties take place **in real time or with minimal delay**. This means replacing paper-based economic transactions and administrative processes with **automated data exchange** in a digital, structured, machine-readable, and standardized format.

ESTIMATED SAVINGS

14 MLN WORKING HOURS = 7000 FTEd = 200 MLN EUR PER YEAR

In Estonia, from 2025 micro-enterprises can automatically generate their annual financial reports through a new data-bridge service, using data directly from accounting systems.

<https://realtimeeconomy-bsr.eu/>



Timeliness

...insights available as events unfold, not months later

Relevance

...data reflects current traveller behaviour and demand

Granularity

...detail by day, place, or even hour, not just monthly totals

Costs

...investment in systems, licences, and data management

Quality

...accuracy, representativeness, and reliability must be ensured

Privacy

...GDPR compliance and protection of personal information

Integration

...combining new feeds with traditional statistics and decision processes

