

Staff Mobility to Action Resilient, Restorative, and Regenerative Transitions & Societies



I3X – Guiding Principles













- Innovate3X-Igniting Impactful Initiatives, or I3X, should aim to accelerate the understanding/scoping of a challenge (technological, market, societal etc), and the emergence/development of possible solutions. This can be interpreted as e.g. increased technological or societal readiness, once the I3X is completed.
- I3X should have a sufficient scale and scope (i.e. not being too narrowly-defined), and should require multi/cross/inter/trans disciplinary capabilities.
- I3X should align to the core concepts of SMAR3TS Resilience, Restoration, Regeneration (either R or all Rs).
- I3X should align to (at least) one WP WPs are the main coordination mechanism of the project, hence I3X should be connected to WPs.
- Any partner can initiate an I3X. Yet, shaping the I3X should be done collectively, and in collaboration with WP leader and SMAR3TS Team.
- At this stage, we are looking for initial I3X, which will be further defined during the Kick Off Meeting and where engagement across the consortium will be assessed.
- Overall, it is expected that each I3X will lead and enable about 10 person-months of secondment, across the consortium (i.e. not only between the initiator of the I3X and possible contributors), possibly more.
- I3X will serve as guiding instruments for secondments, as well as for events (i.e. hackathons, workshops, showcase)

13X – About the initiator



SMAR3TS

Name of Organization: Estonian HR Association PARE

Research Group/Department: none

Country: Estonia

1. Background info

Estonian HR Association PARE is a non-profit union of human resource management professionals established in 1993. PARE is Estonia's national community of HR professionals, advancing evidence-based people practices, strategic HRM, and healthy work ecosystems through advocacy, capability building, and research-practice partnerships. Our website: https://pare.ee/

3. Expertise and available technologies within SMAR3TS project

- Expertise/available technologies: convening employers; access to HR practitioner networks; stakeholder interviews; survey dissemination logistics; policy dialogue and knowledge translation.
- 2. Current status & expected maturity: Concept validated by scoping review and stakeholder interviews (SRL: problematization/early solution framing). Target SRL/TRL: tested prototypes in 2–3 pilots; validated measurement toolkit; guidance for employer adoption and municipal policy.
- 3. Examples of RDI partnerships: Actual: none formalised yet. Anticipated (to be pursued under I3X): University partner(s) for methods, GIS, and evaluation design; municipality/urban-planning unit for public-realm context and data access; 2–3 volunteer employers (SME/large mix) for site access and HR outcomes; real-estate/landlord partner for small public-realm improvements near worksites.

2. Research Group/Company Department

We do not have any specific research group. PARE convenes employers, municipalities, and researchers to co-produce actionable evidence on the future of work, including built-environment determinants of HR outcomes.

Contact person in the project is Managing Director Kai Saard, <u>kai@pare.ee</u>. Current project initiator is the Vice Chairman of the Board Maria Kütt, <u>mariakytt@gmail.com</u>

4. Examples of strategically relevant Innovate-3X Initiatives

We propose to scope and test how *multifunctional neighborhoods*—the public space and integration with residential functions, services, green/blue spaces, food and mobility infrastructure within a 5–15-minute catchment of worksites,— shape especially employee well-being, behavior, and organizational outcomes. In relation to the "15-minutes city" concept, the initiative integrates urban design, environmental psychology, HRM, and public health evidence; prototypes cross-sector pilots with employers and municipalities; and develops measurement tools and governance playbooks aligned with Resilience, Restoration, and Regeneration.

"Improving the Resilience of Multifunctional Neighborhoods within the 15-minutes City Concept: Workplaces Perspective" — build and validate the Workplace-Neighborhood Quality Index (WNQI) combining objective (GIS walkability, NDVI/greenness, transit access, food/amenity density, noise/PM_{2·5}) and subjective indicators (restorative micro-break opportunities, perceived safety). Validate against short-run outcomes (steps during workday, lunch-break behavior) and HR outcomes (engagement, absenteeism). Then co-design and test: shaded seating and pocket-park access during breaks; signed 10-minute walking loops; healthy-food availability within 400–800 m; noise/air-quality buffers on key frontages. Measure effects via pre/post and matched controls. Business-case and policy playbook: ROI models linking WNQI changes to HR outcomes; procurement and urban design recommendations for "15-minute districts"; open data and dashboards for HR and city partners. Evidence on pollution/noise productivity impacts strengthens the economic case.

13X – Alignment to R3 and to WPs



SMAR3TS

SMAR3TS domains:









1) Specify here: one or several SMAR3TS domains that are relevant to the work of your organization/research and innovation team.

Within the domain of HOUSING:

Sustainable cities and communities: the multifunctional or *workplace-neighborhood* as a micro-district (5–15-minute catchment) where public-realm quality (shade/green, crossings, seating, noise/air) influences workers' daily exposures and community vitality. Example questions: Which neighborhood attributes around worksites are associated with healthier daily routines and equitable access to restorative spaces? How can employer–city micro-investments upgrade these attributes? How can different functionalities (e.g housing, workplaces, services) be best integrated to support resilience of urban space?

Healthy work and mobility: links between immediate surroundings of the workplace and employee well-being, micro-restoration during breaks, and active travel at/around work hours. Example questions: Do walkability and proximate green/blue spaces shift sedentary time and affect during the workday? Do local food environments around worksites nudge healthier choices?

Data-driven decision-making and urban governance: translating neighborhood features into HR-salient indicators for employers and simple, governance-ready signals for city partners. Example questions: What minimal, privacy-preserving metrics allow employers to benchmark workplace-neighborhood quality and co-prioritize upgrades with cities?

2) Specify here: alignment of the work of your organization/research and innovation team with one or several SMAR3TS focus areas on Resilience, Restoration, and Regeneration. Share examples.

Resilience: Active-travel-supportive and amenity-rich worksite areas reduce sedentary time and promote everyday activity—protective against stress and chronic disease; organizational resilience via higher attendance and performance (Adlakha et al., 2015; Cantley et al., 2024).

Restoration: Nearby greenspace and restorative micro-break options are associated with better affect and well-being at work; nature-based interventions around worksites show benefits for creativity and mental health (Gilchrist et al., 2015; Lygum et al., 2023).

Regeneration: Employer–city partnerships can co-invest in public-realm upgrades (shade, seating, pocket parks, safe crossings), improving urban equity and environmental quality (air/noise), with productivity co-benefits. Evidence links air pollution and noise to lower worker productivity and cognitive performance, building a case for environmental regeneration near worksites (Dechezleprêtre & Vienne, 2025; Jafari et al., 2019).

I3X Description



Note: there can be several Innovate-3X descriptions, just duplicate this template slide

1) Innovate-3X:: Improving the Resilience of Multifunctional Neighborhoods within the 15-minutes City Concept: Workplaces Perspective

SMAR3TS

1. Description of Current Stage

PARE (Estonian HR Association) is at concept stage for a program on workplace-neighborhoods—how the immediate public realm around worksites (5–15-minute catchments) relates to HR outcomes (well-being, engagement, absenteeism/presenteeism, retention). PARE does not have an internal R&D unit; our role is to convene employers, broker academic–city partnerships, and translate evidence into HR practice.

We are currently in the stage of ideation and searching for partners to form a consortium (PARE + university methods lead + municipal/landlord partners).

Potential areas of research, innovation and engagement work that can be **conducted within the secondment:**

- Evidence & Theory: scoping review; theory of change (neighborhood → exposures/behaviors → HR outcomes).
- Measurement Design: WNQI v0.1 (objective GIS/remote-sensing candidates; short perception scales; HR-relevant outcomes); data protection plan.
- Stakeholder engagement: interviews/workshops with employers, city units, and landlords; site selection and MoUs.
- Pilot readiness: pre-analysis plans (DiD/event-study templates), instrument list (steps/usage, short affect scales), feasibility testing of data flows.

2. Necessary skills and capabilities, across disciplines:

Specify here: What gaps or barriers need to be addressed to move forward? Which new skills, knowledge, expertise, interdisciplinary approaches or collaborations are required?

- HR analytics and quasi-experimental causal inference (DiD, synthetic controls, event studies).
- Urban design & public-health expertise (walkability/greenness/food environment measurement; GIS, remote sensing).
- Environmental sensing (portable noise and air-quality monitors) and digital phenotyping (privacy-by-design).
- Economic evaluation (productivity, absenteeism/presenteeism, turnover) and business-case modelling.
- Stakeholder engagement & co-creation with employers, commercial landlords, and municipalities.
- Implementation science and impact evaluation (process + outcome metrics).

3. Examples of challenges that need to be addressed

Specify here: Please outline which challenges remain unresolved. You may answer in bullet points.

- Causality & internal validity: Separating neighbourhood effects from selection (e.g., high-performing firms choosing premium districts). Use natural experiments (streetscape upgrades), phased rollouts, or instrumental variables; triangulate survey, HRIS, and sensor data.
- Measurement: Standardizing WNQI across contexts; integrating objective GIS/sensor measures (walkability, greenness, noise, PM_{2·5}) with perceived quality and usage patterns. Existing studies emphasize activity and well-being but rarely tie to core HR metrics.
- Equity & inclusion: Ensure interventions benefit lower-income workers, shift workers, and SMEs with limited on-site amenities; avoid displacement.
- Data governance & privacy: GDPR-compliant handling of fine-grained mobility/sensor data; differential privacy for HR analytics.
- Adoption & scaling: Align incentives among employers, landlords, and cities; quantify ROI (absenteeism reduction, retention, engagement, productivity) vs. capital/operating costs.
- Environmental externalities: Coordinating with city policy on air/noise mitigation where evidence shows productivity penalties.