

Chapter 2: Creating shared value with data

The growth in passive workforce data—combined with other sources of information, analytics, and AI—is surfacing new opportunities to help create shared value at multiple levels of an organization: the individual worker; the team, group, or function; the enterprise; and greater society.

When an organization uses the data they collect about their workforce to benefit everyone—individual workers, teams and groups, the organization, and society as a whole—we call that creating shared value.

The value created at each level can flow between them, reinforcing and amplifying the value created at other levels. Consider worker happiness as an example. In addition to individual benefits of being happier at work, such as improved wellness and performance, worker happiness could also improve teamwork and social encounters at the group level.¹⁴ It has been linked to improved engagement, productivity, and culture, and reduces attrition risks at the enterprise level. Japan-based technology firm Hitachi experimented with improving the happiness levels of its employees using wearables and an accompanying mobile app that offered employees suggestions for increasing feelings of happiness.¹⁵

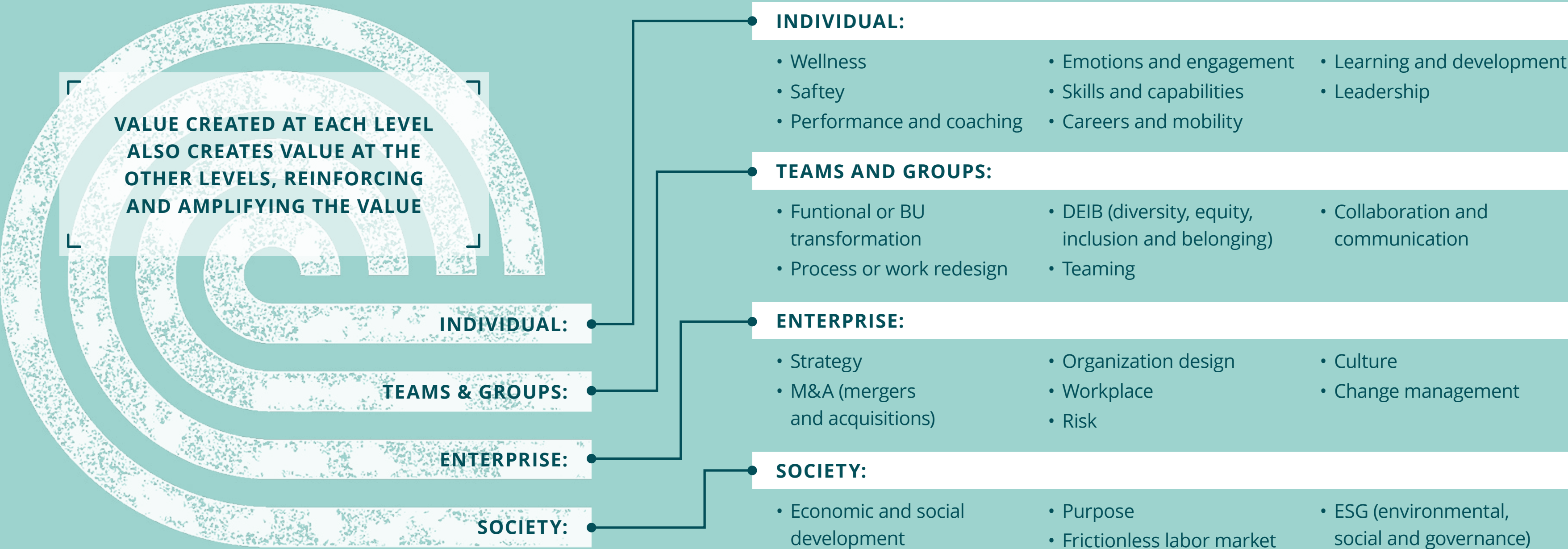
During testing, the psychological capital of workers rose by 33% and profits increased by 10%. Sales per hour increased 34% at call centers and retail sales increased by 15%, demonstrating how creating value at the employee level had far-reaching impacts on the business.¹⁶

Group or enterprise initiatives that achieve organizational benefits like cost savings or improved quality (e.g., a workplace or work redesign enabling more flexible or meaningful work) can also help amplify an individual's happiness. And as organizations improve their workforce's collective happiness, they could contribute to a better, happier society too.

By focusing on how to create value in and across these levels, organizations can magnify their impact while strengthening their long-term position.



The four levels of shared value



Source: Deloitte Analysis

Shared value for individual workers

Even as new and emerging technologies help enable organizations to measure and improve individual performance and activity in more detailed and helpful ways, a growing body of literature demonstrates that wellbeing and mental health are not only valuable to the worker, but important to team and organizational success. New advances in technology can now enable leaders and workers to better understand mental health, and take actions to improve it.

However, organizations could face a tricky balance between supporting wellness and happiness efforts and overstepping their bounds.

As the COO of a financial services organization told us, organizations may risk becoming “the be-all and end-all” for providing services that improve a person’s well-being and sense of belonging that used to come from civic groups, families and other entities. The COO also noted that obligations and liabilities, especially around sensitive health and wellness data, may not be clear. They said that other activities, such as facilitating skill and career development, offer clearer paths to creating shared value with workers by enabling them to develop in ways that enhance their skills and employability while also creating value for the enterprise.



Helping create value for the individual

Measuring and improving performance

Cultivating next-level leadership

Enhancing wellness

Ensuring safe working conditions

Supporting emotional well-being and engagement

Improving career mobility

Personalizing learning and development

Identifying skills and capabilities



Helping create value for the individual

Measuring and improving performance



Identify the activities, roles, actions, and workers that create the most value

Monitor workers and managers to identify the portfolio of activities, people, roles, or skill sets that determine 80% of effective outcomes. Use employee communication data and network analysis to identify “rockstar” performers and use AI to help others learn from them.

Provide evidence-based, real-time support

Use audio or video analytics (e.g., of a sales or call center employee, or a retail clerk) or work and collaboration data to identify behaviors that drive results. Use this data as input into algorithmic coaching. Individual worker data can also be mined to provide personalized insights that help improve skills such as communication, focus, self-awareness, and time management.

Enhance performance feedback

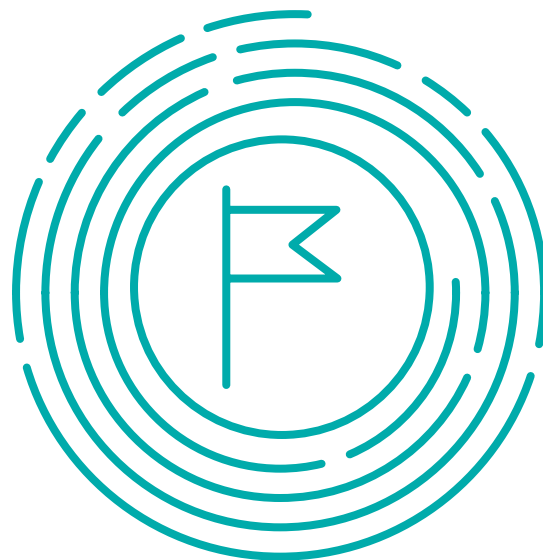
When gathering performance feedback, mine employee work application data to identify the coworkers an employee interacts with most frequently, who can provide the most relevant feedback.

Implement fact-based performance reviews

Quantify performance based on data from work applications or products to inform a manager’s assessment of performance, leading to more objective and less biased evaluations.

Helping create value for the individual

Cultivating next-level leadership



Identify inclusive leadership

Measure the degree of listening and communication with employees. Use video and audio analytics to infer qualities like a learning mindset.

Assess focus on strategic priorities

Assess the time spent on various activities as mined through work applications, comparing it to a leaders actual priorities and goals.

Unlock collaboration across boundaries

Use social network analysis to help determine presence of cross-functional leadership teams and the strength and type of a leaders connections across the enterprise.

Plan for succession

Use data based on projects, outcomes, or skills to identify the necessary skills and qualities of potential successors, as well as the number of potential successors per key role. Surface potential successors' flight risk through engagement data.



Spotlight: Fluid skill development

Jobs with narrowly defined boundaries are increasingly giving way to more fluid, skills-based work.

In a recent survey, we found that 63% of work being performed falls outside of a worker's core job description, requiring new models for understanding how to activate workers to get things done.¹⁷ These models have the potential to improve work processes for the organization and can provide development and growth opportunities for individuals

(e.g., taking on new tasks based on their transferrable or adjacent skills). Deloitte research found that those organizations that use skills data to make decisions about work and the workforce are not only more likely to have a reputation as a great place to grow and develop, but are also more likely to innovate and respond to change with agility.¹⁸

GE HealthCare recently launched an effort to apply machine learning to worker activity, learning history, job history and other workforce data to help identify opportunities for workers to use their existing skills to take on different work.

In addition to providing growth and development opportunities to workers, the company plans to use skill-based profiles to improve workforce planning and hiring efforts.¹⁹



The labor market is unbelievably competitive. So once you have someone you want to invest a lot of money in, what are the skills of this person? How can we grow those skills?

If we have openings in the company, how can we map their skills to other opportunities?"

Chief Operating Officer



Helping create value for the individual

Enhancing wellness



Improve physical well-being

Use wearables, sensors in the environment, or video analytics to track body movements to reveal patterns of physical wellness for those who opt in.

Enhance mental well-being

Detect patterns of stress, attention, and other mental states through wearable neuro-technologies like headphones and augmented reality headsets designed to measure mental state. Track amount of time spent on work (including after hours) through work applications to help detect potential burnout. Use audio, video, and wearable data to identify other signs of stress, as well as opportunities to help workers improve mental health.

Boost belonging and social connection

Collect data from employee communications, voice and video data, location data, or embedded sensors in the workplace to reveal relationship patterns, interactions, and socializing styles. Use this data to make suggestions to employees, managers, and leaders on improving interactions and relationships with others. This data can also be used to suggest mentors, coaches, or other colleagues an individual worker might want to connect with.



Helping create value for the individual

Ensuring safe working conditions



Create adaptive environments

Improve safety by connecting location or biometric data from wearables to smart devices in the physical environment that enable workspaces and processes to adapt to the worker (e.g., having robots or machinery move based on a workers' movements).

Practice cognitive ergonomics²⁰

Use neurotechnology wearables to measure the cognitive load of workers in physical work environments and detect and alert for overload, which can produce safety hazards, errors, and health issues.

Improve physical positioning

Use wearables, smart sensors on devices or in the environment, or video analytics to track and alert workers to improper physical movements (like posture) that could lead to injuries. Use this data to feed simulation tools that can predict injuries and lead to new safety policies.



Helping create value for the individual

Supporting emotional well-being and engagement



Use emotional data to help guide interventions

Deploy emotion detecting software that mines biometrics, voice and audio calls, and email and work application data to infer the emotional states of workers who agree to data collection efforts. This data can be used to improve learning and coach workers on how to be more attentive, less stressed, or work with customers.

Keep workers engaged

Use emotional data combined with other data such as degree of belonging, interactions with managers and peers, purpose, learning and growth, culture, and more to assess engagement and predict attrition.



Improving career mobility



Create opportunities for growth and movement

Use data on transferable or adjacent skills, interests, and worker activity to suggest which skills employees can develop to be more marketable and employable as organizations evolve. Also use this data to match them to new opportunities, projects, learning, or roles.

Access diverse and hidden talent

Identify hidden talents during recruitment and hire based on skills, cultural fit, or team fit instead of education and experience listed on resumes.

Spotlight: Automated coaching

Cogito is a provider of real-time data analytics for customer service centers.

They analyze customer service calls for tone, word frequency, speaking pace and more to understand agent interactions with customers and look for signs of distress. The tool is designed to then suggest subtle adjustments—such as encouraging an agent to speak faster or slower—to help improve the quality of the call. In a recent test with MetLife, call agents using this tool improved resolution rates by 3.5% and increased customer satisfaction by 13%.²¹

In work environments like call centers that feel more anonymized, a model like Cogito's can provide real-time coaching to individual workers about how best to communicate with customers, helping achieve organization-wide outcomes. Other technologies can analyze interactions with colleagues in a similar way, augmenting traditional approaches to mentorship and coaching by providing targeted, real-time feedback at scale.

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Helping create value for the individual

Personalizing learning and development



Deliver adaptive learning

Track how well people are learning through VR/AR that captures reactions in real-time or through neurotechnology wearables that use AI to tailor learning to the individual.

Overlay learning onto the physical environment

Use wearables like AR goggles to overlay learning on top of physical reality as people move (e.g., providing directions on how to place objects in fulfillment centers).

Provide just-in-time learning opportunities

Track what workers are working on to recommend learning opportunities relevant to their work just-in-time, and suggest others with whom they may want to connect.

Capture informal learning and measure impact of learning

Mine work application data to track informal learning from social discussions, metaverse interactions, videos watched, articles read, use of performance support tools, and calls with mentors. Track behavior changes by capturing digital work products to visualize the impact of learning.

Helping create value for the individual

Identifying skills and capabilities



Infer skills, capabilities, and adjacent skills

Infer skills and adjacent skills from project and work histories (including volunteering, military service, or other lived experiences), digital work products (e.g., code or support tickets), work applications (e.g., project systems), and text analysis (e.g., performance feedback, collaboration sites, etc.). Digital scenarios (e.g., simulations, job previews in VR, and games) can be used to assess human capabilities like emotional intelligence.

Identify next horizon skills needed internally

Analyze external data from job and project postings, social profiles, skilled vendor industry benchmarks, and more to predictively see future skills needed and skills migrations. Connect these trends with each workers' existing skills to suggest learning and work experiences needed to develop future skills, or to provide leaders with aggregate supply and demand data.

Spot hidden high potentials

Use organization network analysis to spot influencers with natural leadership skills and outsized impact.

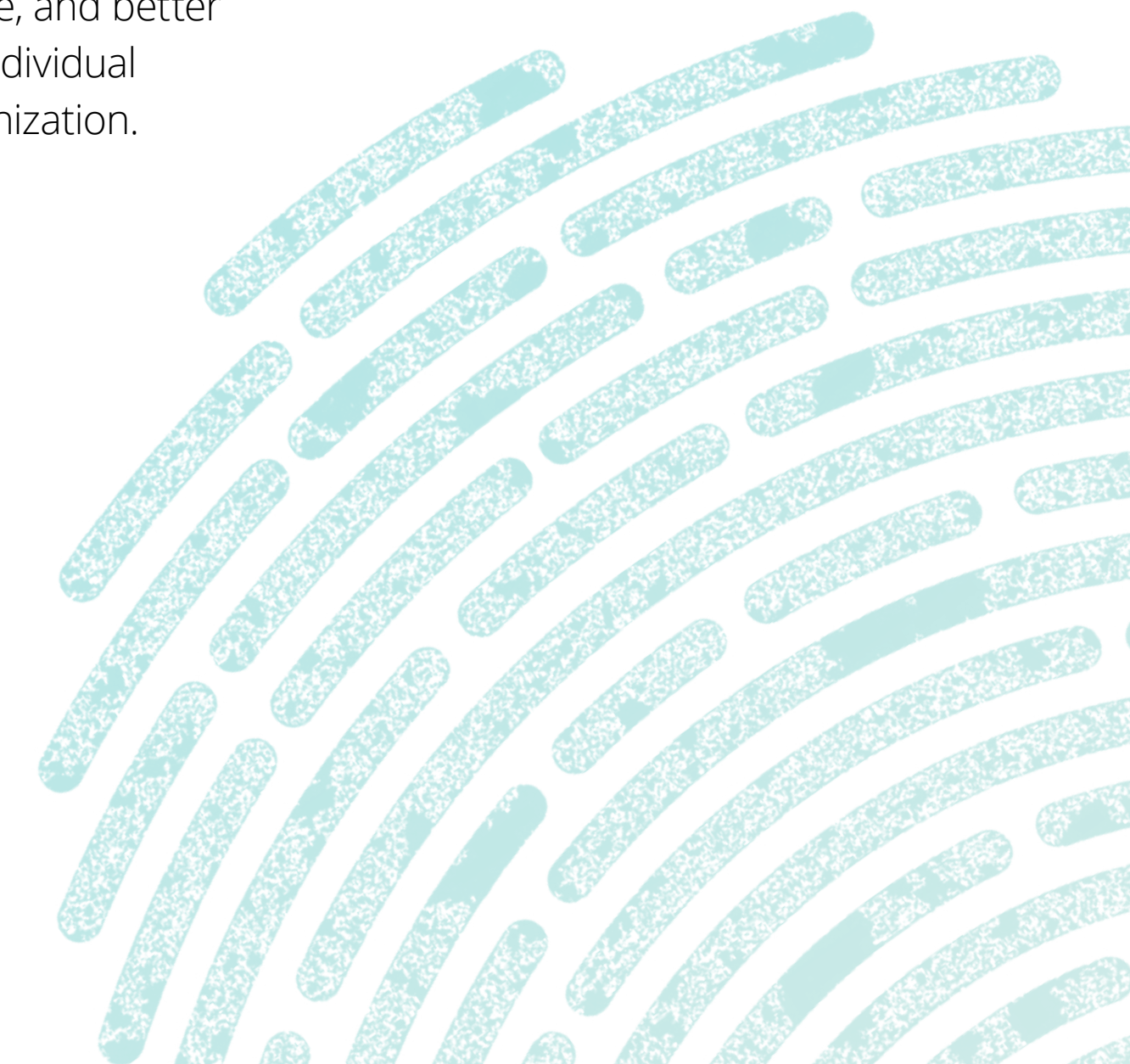
Shared value at the team and group level

Efforts to understand individual workers can be analyzed, streamlined and remixed to help improve both formal and informal collaboration throughout an organization. These opportunities for shared value creation can cut across multiple dimensions. Some aim to use data on work and the workforce to improve outcomes like agility, speed, quality, or customer satisfaction while also improving the worker experience. Others, such as redesigning work processes, can point toward opportunities to develop evidence-based approaches to creating successful human—and machine—work teams.

These kinds of efforts can help organize and optimize teams based on preferred communications styles and provide feedback and coaching to enable more effective communication.

In addition to improving real-time interactions, some organizations may be able to use new data and analytics to identify underlying structural factors that should be addressed rather than re-enforce pre-existing biases and blind spots. For example, tools that help identify intentional, toxic efforts to undermine diversity, equity and inclusion (DEI) activities or pinpoint

microaggressions and unconscious biases can help improve DEI efforts. Taken together, these approaches to value creation at the team level can help teams be higher functioning, more inclusive, more flexible, and better aligned with the needs of individual workers as well as the organization.



Helping create value for teams and groups

Redesigning work

Building better teams

Enhancing collaboration and ways of working

Transforming functions or business units

Boosting DEI and belonging efforts



Helping create value for teams and groups

Redesigning work



Simulate work processes or human/machine interactions

Collect data on how workers interact with others and/or machines to create a digital twin of the workforce to simulate work redesigns and their impact.

Understand hidden work patterns

Use process mining of enterprise transaction systems, workflow data, or video analytics to help identify root causes of issues, the tasks underlying each job, and the strongest opportunities for improvements.

Identify bottlenecks and supplement formal processes with informal conversations

Use organizational network data to help identify employees who are bottlenecks or spots where more interaction can improve a process, adjusting communication patterns accordingly.

Helping create value for teams and groups

Building better teams



Optimize team composition

Mine data on skills, work styles, values, collaborative abilities, and more to optimize team composition and predict team performance based on the impact of each newly added member.

Enhance team performance

Mine data from team collaboration and project management sites to determine factors like interpersonal relationships that require special attention, points of conflict, and project decision makers using AI as a coach to suggest improvements.



Spotlight: Improving quality and cycle time



Sometimes you see a problem appearing, but it appears at a totally different place where it has its root cause... This is called process mining. It's very interesting that you see that what you perhaps consider as the standard process is absolutely not the standard process, but there are many workarounds which are used which create many disturbances at other places. These connections or dependencies you only understand if you use data."

COO, Industrial Services Company

Advances in technology like AI-powered audio and video analytics can help people understand how work is performed with employees, customers, or machines.

These tools can provide valuable insights into communication and collaboration patterns, continuous improvement of customer interactions, and speed and quality.

For example, a Tier 1 automotive supplier used AI-powered video analytics to provide detailed visibility into the activities that workers perform in the factory. Analytics revealed a slowdown in stations whose configurations inhibited workers and caused ergonomic issues. As a result, the organization reconfigured the stations and improved line balancing, reducing cycle time and helping their workers become healthier, happier, and more productive.²²



Helping create value for teams and groups

Enhancing collaboration and ways of working



Make meetings more effective

Use audio and video analytics to automatically summarize meetings and surface relevant information real-time. Personalize action items for each person using facial or voice recognition. Automatically set up future meetings with relevant people.

Improve emotional and relational intelligence

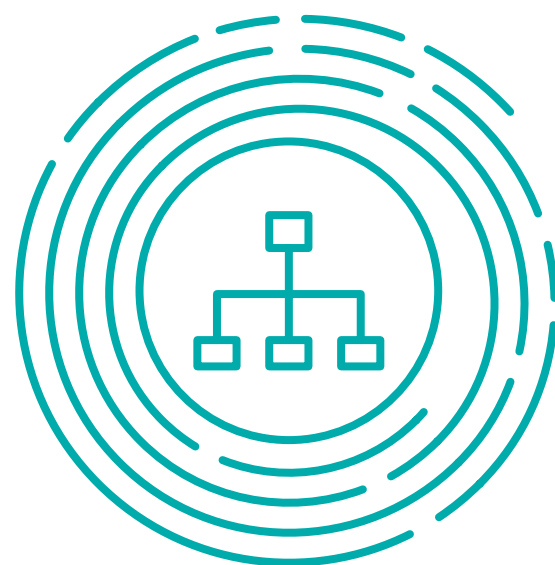
Use organizational network data to reveal relationship patterns and interactions. Or use audio and video analytics to reflect the emotional tenor of interactions, prompting individuals to improve communications (e.g., stop interrupting). Advance customer communications by identifying which worker might be best matched to a customer based on personality and communications style.

Personalize communications

Use data from communication applications to suggest the optimal way to communicate with others. Emphasize communications important to you (e.g., if increasing the diversity of your connections is important, then e-mails from people in other social groups would be emphasized).

Helping create value for teams and groups

Transforming functions or business units



Improve agility

Use data from embedded sensors in plants that track workers and equipment to create self-adapting, non-linear assembly lines or work orders. These orders can be generated by AI and modify the steps in the process to meet changing demands and build customized products.

Reduce time to market

Mine communications or work application data to spot and improve work/collaboration patterns within or across functional groups that can reduce time to market.

Capture continuous improvement

Evaluate the digital trail of people's routines and actions to capture the details of how workers creatively try new approaches to continuous improvement. Use this data to help improve outcomes and suggest areas for improvement.

Boost customer satisfaction

Use sound sensors to understand how employees interact with customers to help identify potential improvements in customer service or reduce the need for managers to intervene.



Helping create value for teams and groups

Boosting DEI and belonging efforts



Understand how attitudes and behaviors spread

Based on the strength, diversity, and number of connections with others as determined through organizational network data, identify influencers who can drive greater DEI and Belonging efforts, as well as gaps in belonging or inclusion.

Spot and mitigate implicit bias

Mine text in work, communications, and performance feedback platforms to identify biases, gaps in inclusion efforts, and toxic pockets of conversation that undermine broader DEI and Belonging efforts. Provide personalized feedback on factors like tone and language choice in emails to help limit bias or microaggressions.

Increase inclusion

Use calendar and communications data to measure indicators of inclusion, including formal and informal interactions with senior leadership and mentors across diverse populations, and participation in resource groups.

Create greater pay equity

Instead of relying solely on jobs to benchmark pay, create greater equity in gender compensation by mining work applications and performance management data to benchmark pay based on actual responsibilities and performance.

Spotlight: DEI beyond representation

In addition to mining collaboration, communication, and voice data to identify bias or microaggressions, data and technology can also provide insights into inclusion based on people's interactions with leaders, mentors, and resource or affinity groups.

Organizational network analysis (ONA)—a way to measure and graph connections and patterns of collaboration between people within and across organizations—performed on this data could be particularly helpful in identifying inequities and strengthening DEI efforts.²³

One large service-based organization wanted to better understand whether it was achieving true gender diversity on its teams. On the surface, gender diversity appeared balanced with approximately 44% of the teams made up of women. But how were the teams functioning?

Using ONA, the organization was able to map its networks by gender, revealing that while there was some gender clustering present, the center of the network was solidly gender-mixed—confirming that diverse perspectives were represented at the core of their organization. This is the kind of deep analysis of diversity organizations can use to extend beyond traditional representation metrics to help gain a more nuanced understanding of diversity.²⁴ This also highlights the importance of not zeroing in on an identity characteristic but using new sources of data to understand diversity in more holistic ways.



“If you never go to a social event, never go to a Christmas party, never go to a coffee talk, lunch-and-learn thing and your performance is poor, is that a direct reflection or is it something else? We have that data, but I’m really trying to identify answers to questions like: Are managers doing the right thing? Are they discriminatory? Do they bring in the right development to the right staff? Are we supporting our high performers, or are they just high performers regardless of what you do for them?”

**Managing Director,
Head of Technology,
Financial Services Firm**



Shared value across the organization

By aggregating data across the enterprise, organizations can gain new insights on how practices, behaviors, and decisions may impact the organization. New tools are going beyond a qualitative and imprecise understanding of culture and can now quantify how subtle elements of culture—such as the use of different terms and phrases across the enterprise—highlight potential issues and opportunities for improvement. Similarly, data around how individual workers move, work, and interact throughout the day can greatly improve understanding of how to optimize workplace design, help accelerate change management, and mitigate workforce risk.

Data on work and the workforce can also be used to take a broader, evidence-based approach to strategic decisions and execution. Passively generated, enterprise data on work and the workforce can be combined with other data sources to identify competitive threats, spot acquisition targets, and gain insight into how an organization is positioned in the market. In addition, it can help leaders take a fact-based approach to creating organizational designs that align to core strategies.



Helping create value for the organization

Strengthening agility and change

Building strong cultures

Making the most of M&As

Shaping strategy

Designing organizational structures

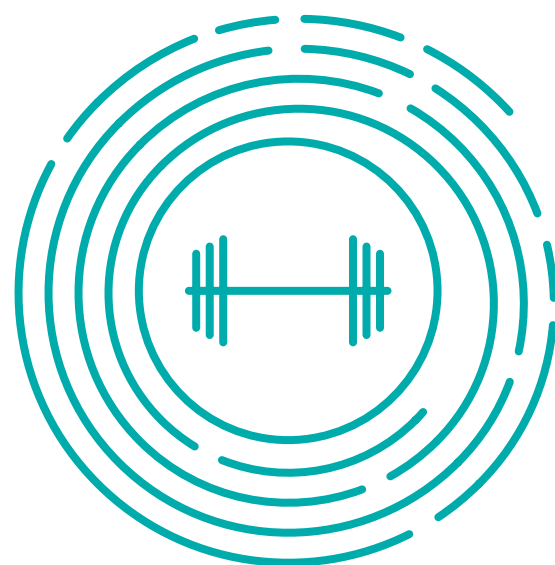
Optimizing the physical workplace

Managing and mitigating risk



Helping create value for the organization

Strengthening agility and change



Determine “as is” state

Use process mining of enterprise transaction systems to start with an “as is” picture of the way people perform work through a process, identifying root causes of issues and opportunities for improvements. Once implemented, measure new process compliance.

Identify change agents

Use organization network data from work applications to help identify influencers who can help organizations navigate change.

Match people to work

Use AI to analyze a change project and map the skills required at each stage based on learning from previous projects. Use individual data on skills and work styles to predict the potential synergy of team members. Analytics can also be used to identify people most likely to flourish in the new, changed environment so people can move into roles and work that best motivate them.

Create a heat map to localize solutions

Take an employee-centric, end-to-end view of change to understand how each employee is being asked to change across multiple change initiatives. Adjust accordingly to prevent change fatigue. Use AI to comb through data from sensors or email and social networks to determine what works for various employee groups and replicate or scale around those efforts. Tailor local solutions based on emotions related to change, trust levels, and hot button issues or concerns.

Helping create value for the organization

Building strong cultures



Analyze culture

Use natural language processing, text analysis, computational linguistics, audio analysis of business meetings, and biometrics to identify and quantify potential declines in sentiment across the workforce or identify microcultures.

Drive culture change

Use organizational network analysis to identify barriers to cultural change as well as target opportunities to spread new values and practices.

Making the most of M&As



Spot potential deals

Use automated tools to scout for potential acquisition or merger opportunities, using data from public social media sites that reveal data on engagement and culture; data on leaders or founders that is predictive of results or indicative of cultural fit; and data on work such as open-source contributions, patents, and citations.

Integrate acquisitions

Use organizational network analysis to spot and solve for organizational silos and bottlenecks. Use this same data to identify informal leaders and those who can act as cultural ambassadors in the acquisition to prioritize for retention and monitor integration effectiveness.

Spotlight: Organizing for innovation

Advances in organizational network analysis are creating new insights into creating connections among individuals and, when appropriate, when to let some members of a group stay separate from the larger organization.

In his book *Adaptive Space*, Michael Arena, former Chief Talent Officer at General Motors (GM) and former Vice President of Talent and Development at Amazon Web Services, writes about how he used data from organizational network analysis to drive innovation and change through agile teams. Teams were formed using four identified network roles—brokers (or boundary spanners), connectors, energizers, and challengers, with these roles being leveraged in different ways depending on whether the goal was to drive innovation in products, services, or new ways of working.

When GM acquired self-driving technology company Cruise Automation, it was careful to not fully absorb the team in order to protect its cohesion and its leadership by the founder—a connector acting as a passionate expert within a network of similarly focused experts. As Arena notes in his book, GM leveraged brokers to connect the entrepreneurial team with the core operational side of the business as needed for access to additional resources such as engineering or testing. This approach helped GM become the first in self-driving test vehicle assembly in a mass-production facility.²⁵



Helping create value for the organization

Shaping strategy



Inform strategic direction

Infer skills and adjacent skills to determine existing capabilities that could lead to new strategic directions.

Use data to create predictive KPIs

Mine data on workers, coupled with financial, customer, and operational data, to derive strategic KPIs based on facts rather than assumptions.²⁶

Perform competitive analysis

Analyze competitor's job posting data to determine competitors' strategy, timing of execution, and create early warning signals of potential workforce poaching.

Execute strategy

Analyze workflow and performance management data to reveal alignment with strategy.

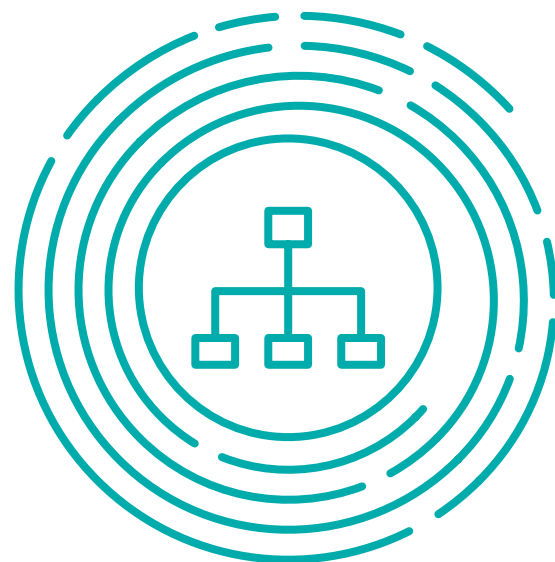
Speed innovation

Use organization network analysis to uncover information about brokers or energizers who can infuse new ideas throughout the organization.



Helping create value for the organization

Designing organizational structures



Determine how work really gets done

Mine work applications to understand what people are really working on and how.²⁷ Use organization network analysis to see the informal organization and roles to inform a new organization design.

Decentralize decision-making rights

Mine project histories, goal setting, project assessments, and more to help track decisions and grant those successful in making decisions more decision-making power. Consider creating a system in which employees transparently rate one another's credibility on several dimensions to create a "believability" rating, giving those with higher believability ratings greater weight in decision-making.²⁸

Empower self-organizing teams

Use AI to help people create self-organizing teams, by mining skills and interests data to suggest people who might wish to join a team. Use data in work applications to help identify others who are working on similar work or objectives.

Helping create value for the organization

Optimizing the physical workplace



Monitor movement

Track movements of people in physical space through smart sensors in the workplace, digital badges, or wearables to inform collaboration strategies or real estate design.

Optimize physical and hybrid workplace design

Pair communications and organizational network data with people’s movement data to inform strategies around hybrid and physical workplace design.

Create augmented social reality

Use location tracking from devices to layer social context on top of everyday interactions, surfacing information about people as you encounter them to increase the likelihood of “collisionable encounters.”

Helping create value for the organization

Managing and mitigating risk



Monitor workforce risk in real-time

Drawing on data from work applications, wearables, and more, create a dashboard that surfaces workforce risks such as attrition, burnout or wellness risks, compliance challenges, or failures to create an inclusive environment.

Improve cybersecurity

Use advanced analytics to identify deviations from normal employee digital behavior to identify threats and other issues before they become serious.



Spotlight: Rethinking physical proximity

Formal workflows aren't the only processes that can improve with data.

Organizations can also identify areas where informal conversations can augment and improve formal processes. A major energy company recently used workplace badge data to analyze where and how different groups were interacting.

It found, for example, that as cross-functional teams became more dispersed, they had fewer informal interactions and instead relied too heavily on occasional, informal meetings. The company used this information to inform how to best locate teams during an office relocation and, in the process, improved workflow efficiency by 5.3%.²⁹



Shared value for society

Beyond the traditional pressures associated with running an organization, many leaders are likely facing new expectations to add greater value for external stakeholders and society at large. Some investors are raising expectations around ESG goals, while the public is increasingly looking to private businesses to fill the gaps left by civic and government institutions.

In a recent survey, seven in 10 people said the ability for their job to have a societal impact would affect whether they would accept or reject a job.³⁰ Likewise, executives see a strong link between an organization's purpose and its ability to retain talent.

A recent Deloitte survey of C-suite leaders found that 79% agreed that purpose supports talent recruitment, engagement and retention.³¹

Despite this, there is a gap between the perceived importance of purpose and what organizations are currently measuring. The same survey showed that while 79% of executives said their company had a clear and defined purpose strategy, 22% of that group said their company does not prioritize collecting and reporting on purpose-related data.

As new sources of data and technology continue to emerge, organizations can work to overcome this gap and directly connect workforce and organizational measures to larger goals around shared societal priorities. This can allow better alignment of worker activities with an enterprise's purpose, and can create value for workers, as well as the larger ecosystem, by connecting their work to economic development efforts or efforts to develop a more frictionless labor market, for example.

Leading organizations value human sustainability as much as environmental stewardship—which can create value for workers as human beings, not just employees. Society at large could benefit in the long run, as organizations unleash individuals' potential, and help them become healthier, more skilled, employable, and have a greater sense of belonging and purpose.

Helping create value for society

Supporting a frictionless labor market

Meeting ESG goals

Unleashing and reinforcing purpose

Contribute to economic growth and resilience



Helping create value for society

Supporting a frictionless labor market



Share skills demand and supply data

Share data on the supply and demand for skills publicly and in data-sharing consortiums with other organizations to help workers and educational institutions develop high-priority skills.

Make data portable

Using technologies like skills passports, make worker data on skills, performance, training, etc. portable across organizations.

Create talent-sharing consortiums

Share data regarding tasks, projects, and skills needed with other organizations so workers can be temporarily shared across organizations. Talent sharing can serve as an alternative to layoffs, to smooth supply and demand differences across industries, or to spur innovation or worker development.



Helping create value for society

Meeting ESG goals



Monitor and improve the “S” in ESG

Benefits to worker wellbeing and happiness can add up to broader impacts. Organizations can mine data from work applications, and wearables to understand how an organization is contributing to worker’s emotional and physical well-being, skills development, social and relational health, and more.

Measure and report emissions per employee

Mine data on employee commuting (e.g., through company provided cell phone data), business travel, and remote work habits through work applications to assess energy use and emissions. Combine this data with fleet or logistics data, office energy consumption, and supplier data on the same factors to measure and report emissions per employee.

Dynamically quantify reputational risk on ESG issues

Combine private workforce data with social media scraping and other public data sources to identify reputational ESG risks, identifying whether an organization walks their talk when it comes to human rights, labor standards, corruption, and environmental issues.³²

Spotlight: Measuring office activity to reduce emissions

Workforce data can be a key component of how organizations measure their progress toward meeting ESG goals and emission reduction targets.

For instance, Deloitte has equipped more than 2,500 video conference rooms with machine learning capabilities to analyze how many people are in each space and how long they are expected to be there.

This information is used to adjust thermostats to optimal levels for comfort, while lowering energy consumption within a building. This small change—aggregated to an entire workforce and physical real estate space—have the potential to contribute to an organization's efforts to hit sustainability goals.³³

In the coming years, it may be possible to connect these data sources such as those from conference rooms to other sources of activity within a building to lower emissions while improving the experience of working in a building.



Helping create value for society

Unleashing and reinforcing purpose



Align organizational purpose with how workers understand and experience it

Use natural language processing tools to analyze data from internal social and communication tools to pick up on worker skepticism around authenticity of commitments, awareness, or inconsistent workforce experiences when it comes to organizational purpose.³⁴ Mine data on individuals' goal setting to see workforce alignment with purpose and correlate with satisfaction, engagement, turnover, performance, and other metrics.

Personalize digital nudges

Mine data on the type of work employees are doing to create personalized digital nudges that remind them how their purpose is connected to their everyday work.

Helping create value for society

Contribute to economic growth and resilience

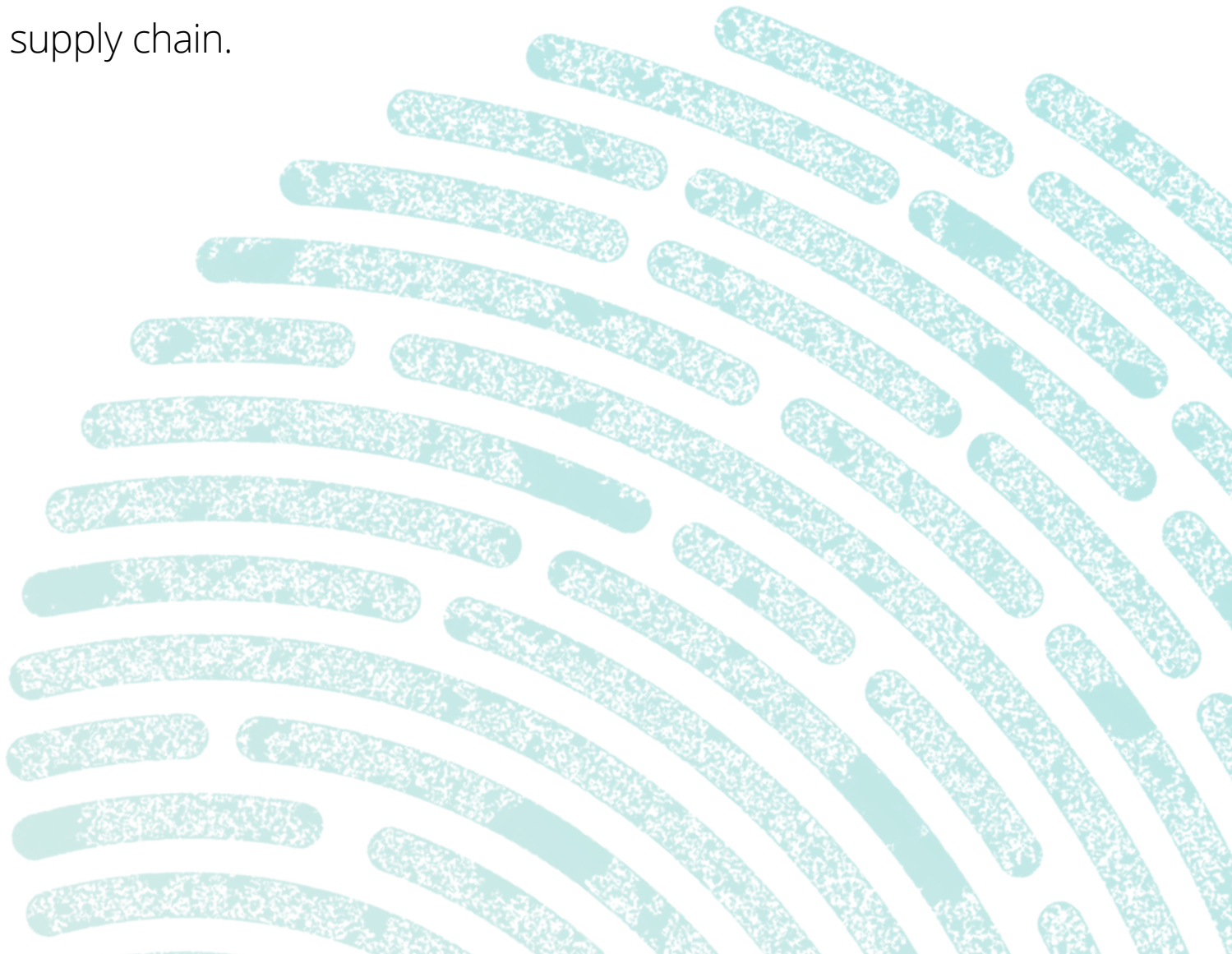


Use location data to spur economic development

Share employee location data (e.g., through company provided cell phones) with other organizations to track mobility patterns of workers across organizations and in local communities to address issues of social equity, racial and socio-economic segregation, and economic development.

Develop thriving communities

Use data on latent, adjacent, and transferrable skills in disadvantaged or pre-worker populations to create public-private partnerships that develop in-demand skills, place workers in jobs, or build their own businesses to contribute to the supply chain.



Spotlight: Advancing economic development through geolocation data

The pandemic scrambled traditional relationships between employers and local communities and undermined many of the casual connections between organizations that can spark innovation.

Understanding how mobility patterns and networking habits have changed, it is possible to track and encourage casual connections between workers of different organizations, improving development and innovation.

In a joint effort funded by the National Science Foundation that launched in early 2023, scientists from Northeastern University and Massachusetts Institute of Technology plan to build a public mobility data platform for the Boston area that is meant to help communities use cell phone-generated data to address issues of social equity, racial and socioeconomic segregation, economic development, and climate resilience.

Knowing how and where people move can help organizations better understand how innovative community networks form, and how they can contribute to economic growth and partnership with diverse communities.³⁵ As the project roles out, researchers hope that this knowledge will contribute to business innovation while improving community resilience.



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