The Ever-Increasing Digital World of Work
Critical Implications for Training Strategy and Governance

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With the acceleration of all things digital over the past five years, especially through the pandemic, training strategy and governance have become a priority for better practice human resources (HR) strategy and management across most industry sectors. It has also become a critical instrument for delivering and meeting customer/client/patient needs and expectations. Against this imperative, however, is the stark reality that many organizations do not recognize this reality, and the risks of not investing in and effectively managing this training and development priority.

With this “all things digital” context in mind, this article is focused on providing three key human resources strategy perspectives to elevate one’s approach to training strategy today, which include:

1. a proactive approach on how to think about to considering (and categorizing) digital work applications and practices; and
2. the heightened importance of related training strategy development, including segmented needs analysis and how it needs to be managed and governed; and
3. how to bring the approach and management of enabling digital training to life.

This article will also highlight select applied insights from the Canadian healthcare and professional services sectors. These examples of challenges, priorities, and better practices are generally applicable to most organizations across the broader private and public sector spectrum, and for both unionized and non-unionized employers.

**Market-Facing Realities and Operational Foundations**

Training strategy, as the words suggest, needs to be based on and aligned with a proactive and agile approach to the dynamic development and adoption of current and emerging types of digital applications. Whether online shopping, digital healthcare, emerging AI-driven scientific research, or back-office administration, technology and its outcomes are only as good as the deployed human capital – the teams and individuals that design, support, and deliver the digital value.

The strategic starting point, therefore, needs to begin with the scope and nature of the types/categories of digital applications that ultimately impact – directly and indirectly – one’s clients, customers, or patients. For the purpose of this article, and as illustrated below in Figure 1, the following three strategic categories of digital application trends
are highlighted for consideration, including the basis for better practice training and development strategy deployment:

**Figure 1 – Strategic Digital Categories**

Category 1 focuses on market-facing digital tools, processes, and outcomes – in other words, applications that directly interface with and provide direct benefits to patients (ranging from virtual healthcare, MRI diagnostic imaging, and laparoscopic surgery, to wearable devices), customers, and clients (including on-line shopping and banking, television streaming, EV and self-driving vehicles).

Category 2 focuses on operational applications – systems and processes – that enable and directly support patient and customer-facing digital value creation. Operational applications vary and can include medical health records (Electronic Medical Records), scheduling and booking systems, supply chain management, and AI-based analytics and predictive modelling.

Category 3 encompasses “back-office” administrative systems and processes covering financial management and accounting, human resources administration, administration services, and office/commercial real estate. Enterprise Resource Planning (ERP) systems such as Workday, SAP and Oracle are contemporary examples in this day and age.
These three categories of digital applications therefore provide a useful lens through which to strategically think about one’s human capital “capability” to deliver digital processes and solutions to end users – the foundational knowledge, skills, and behavioural competencies that front-line employees and managers need to deliver on prescribed performance processes and outcomes. These categories can also be used to frame training needs analysis, gap identification, risk profiling, priority setting, and mitigating and/or proactive training strategy deployment.

**A Strategic Approach**

A strategic approach to the management and governance of training and development for digital applications needs to be driven by a *vision* for digital market-facing capability and end-user success, and ideally with a set of key *guiding principles or values* – for instance, meeting and supporting dynamic customer needs, desired level of competitive positioning, cost-effectiveness, quality driven, and in the context of cyber security, safe and secure.

Secondly, better practice training and development for a digital world needs to flow from and align with one’s enterprise-wide human capital or HR strategy, and the impact of a digitally skilled workforce on core operations and marketplace priorities.

Thirdly, there is the need for an integrated set of HR and training-specific programs that efficiently and effectively align marketplace, operational and back-office digital systems, and intended outcomes. The scope can be broad and needs to include work and job design, workforce planning, aligned attraction and recruitment, investment and budget levels, quality management and measurement, and performance management.

It is with these considerations in mind that the following six-dimension framework is proposed for optimizing the management and governance of an organization’s digital applications training strategy:
Vision/Intent/Guiding Principles

A better practice tenet for all types of strategic prioritization and planning starts with a clear and formal articulation of the vision for what success looks like – in this case, an effective training strategy for all types of digital applications. This should include what the desired intent and outcomes are and are not. Then the need to articulate guiding principles – as cited earlier, these could include a priority for customer-facing training and capability, selective or broad employee participation, constrained cost management or broader investment planning, active governance and/or operational focus, and how training delivery will be done – for example, outsourced to software vendors or built and delivered internally. The guiding principles will then inform what the training strategies are going to focus on, how they are going to be delivered, and over what timeframes and contextual circumstances. These guiding principles also need to transcend staff turnover and extend over a longer period.

Stakeholder Segmentation and Needs Analysis

By way of introduction, the reference to “stakeholder”, rather than just employee segmentation, is deliberate and based on the fact that better practice training and education encompasses several system participants, beginning with “employees”.

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Boards of Directors, HR Standing Committees, executive leaders, operational managers, colleges and universities, unions and their educational/professional practice specialists (in the case of healthcare), as well as regulators and public policy leaders as applicable, all have varying degrees of interests and needs.

Before time and resources are expended on training strategy development or refinements, key stakeholders need to be identified and segmented, and related needs analysis undertaken on content priorities, delivery platforms and programs, and on learning styles. The starting point needs to begin with employees – but segmented against key dimensions and characteristics such as unique and standardized customer digital needs and preferences, categories and types of digital tools, processes and applications, job or occupational families, and of critical importance, employee demographics. As most of us have experienced and observed, technology capability varies significantly by age and experience – millennials are very technologically adept and digital savvy, and learn through related tools and channels with ease; Gen X and especially Baby Boomers are less adept and have very different learning styles and preferences. These differences and learning styles need to be taken into account and ideally tailored to optimize learned concepts and technical skills.

Needs analysis for other stakeholders and interested parties needs to begin with their role and degree of interdependent participation in a particular digital process and/or tool application. For example, the introduction of a digital scheduling system in an operational clinical healthcare setting should ideally include some degree of education and process training for nursing/allied health union leaders and shop stewards. Further, "concept" education, business case rationale, and risk management training should arguably also be provided to select Board members when the digital system and application represent the essence of the product or service being delivered to the marketplace.

Training Strategy Development

While training strategy development is a major topic unto itself, and increasingly based on sophisticated learning and curriculum design, the implementation of market-facing digital processes and tools requires particular focus on the needs of front-line employees, supervisors, and managers.
Clarity of expected digital customer/patient outcomes and impact, the scope and nature of the technology tools and applications (including software and hardware), related risks and controls, and key interdependencies across various direct and indirect roles are key considerations when developing the training strategy and a “go live” plan.

A fundamental enabler to an “all things digital” training strategy, especially in the case of direct applications and benefits to end-users (customers, clients and patients), is the range of tools and equipment required to deliver digital value – the mobile devices (i-phones and tablets), medical devices, interactive imaging screens, let alone laptops for at home portability and usage. This range of tools and devices also needs to include budget and/or capital cost considerations, let alone help-desk support and maintenance.

These considerations should drive the knowledge and skill acquisition priorities, to whom and when the training is to be provided, and how the training will be delivered (i.e., through virtual and e-learning platforms, and/or in-class and with hands-on simulations). As noted earlier, varying demographic and learning styles also need to be considered, as well as the extent to which formal assessment needs are required (i.e., testing methods, multiple languages, and/or certification standards).

Additionally, the intended training strategy needs to factor in employee and manager time requirements, and when the training will be delivered – during core working hours or on one’s shift, or, after hours and an overtime pay expectation. Whether unionized or not, this then drives related compensation and expense administration, resourcing levels and vacancy back-filling, workload management, and all in the context of not compromising customer service or patient care.

Finally, training for digital application capability needs to factor in the scope and nature of ongoing support provided to employees and managers from early adoption stages to continuous learning concerning subsequent version changes and upgrades. In short, the importance of an integrated approach to aligned operational and human resources planning, training, deployment, and workload management cannot be overstated when it comes to implementing digital work practices and market-facing solutions. These investment efforts ideally should include direct input and feedback from employees and managers themselves.
Quality Management

Another key consideration when developing and managing a learning and training strategy focused on a range of digital tools and applications (see Figure 1) is the need for an effective quality management system. This is especially true for digital applications directly impacting customers or patients where the risk of compromised delivery or failure is immediate, and possibly devastating from a health and wellness perspective.

As such, the philosophy, framework, and scope of enabling practices for ensuring an effective quality management system is in place are critically important dimensions of digital training strategy design and execution. A focus on prescribed process and outcomes standards, one’s ERM strategy and risk identification and mitigation controls, key performance indicators, clarity of delegated authorities and approval levels, and of course, cyber security and its full realm of system and impact considerations.

Communications and Support

Enabling communications and support mechanisms should be a prime consideration – including process and performance levels and standards, in addition to change management strategies for “going live” in the case of a major digital transformation initiative.

Communications and support practices should address both end-users and employees, and include 1) clarity of sources and ease of access to information and updates (likely in a variety of languages) about digital applications and training programs), 2) internal websites, Call or Support Centre sites and response times and resolution expectations, 3) sources of procuring and maintaining hardware and software methods and tools, through to 4) the scope and nature of decentralized front-line delegations and authorities.

Finally, a better practice change and communications plan needs to embrace some degree of disclosure and awareness building – schedules and timelines, milestone performance expectations, key roles and responsibilities, applicable advisors and support people, and an updated Questions/Answers website or homepage.
Governance

Better practice governance of emerging digital business models, customer-facing products and services, and the mission-critical capability of staff and teams to deliver this digital transformation needs to span both formal external governance through one’s Board of Directors and internal governance through one’s management hierarchy and practices such as delegated authorities.

Given the strategic magnitude of scale, cost, and complexity of the digital transformation opportunity and its impact on an organization’s mission and mandate, Boards of Directors need to actively understand digital intent and related risks, and hold the ultimate decision-making authority on whether to move the agenda forward or not. As such, Boards, and through their Standing Committees, need to play an active oversight role that includes monitoring and assessing strategic, customer, operational and human resources investments, processes, and outcomes. This is ideally carried out through a focused set of principles and criteria, key performance, and risk indicators, reporting and disclosure protocols, and delegated authorities and decision rights – all calibrated to the logical and interdependent participants in the digital strategy from the Board to management to front-line employees and vendors.

From an employee perspective, the scope of external and internal governance oversight should also consider the extent to which key (employee) partners and stakeholders should be involved. Better practice includes employers engaging with unions, professional/occupational bodies, and apprenticeships/colleges/universities to, at a minimum, inform them about pending digital investments and transformational priorities. Ideally they engage and solicit input on such things as content priorities and curriculum design and delivery, work and job redesign, change management and communications, and even the impact of changing competency and performance processes and standards on employee engagement and productivity.

Finally, the external and internal governance approach to digital transformation and mission-critical employee training and education can be complex and highly impactful. As such, its planning and execution should be proactive, thoughtful, and consultative, and not prescriptive and narrowly directive. This takes time and patience, but the governance and operational outcomes will be worth it.
**Making It Happen**

Given the context and importance of digital transformation today, and its impact on the direct customer or patient experience, business models, and the capability of employees and teams to deliver in this dynamic environment, implementing an effective strategic training and learning framework, should be based on the following foundational priorities:

1. Confirm the scope and nature of your **categories of digital applications**, and their respective prioritization and interdependencies for training and education delivery. This may include customer- or patient-facing systems, operational (including supply chain or scheduling) applications, and back-office systems focused on human resources, finance and other types of administration.

2. Clarify the extent to which your digital training priorities align with one’s **overarching operational and human resources** plans and budgets, and possibly including a formal “learning organization” philosophy – this includes guiding values and principles that drive customer/patient commitments, employee value propositions (i.e., development, learning, and career paths), and enterprise-wide risk management.

3. Using this article’s proposed framework or a similar facsimile as a reference point, conduct a **diagnostic assessment** with input from key stakeholders, starting with employees across various demographic and occupational segments, and possibly with customers, vendors, and one’s Board of Directors. The assessment should include criteria identification, process and outcome intentions, performance levels determination (i.e., developing, contemporary, or advanced), and then identification of training gaps, risks, and prioritization strategies.

4. The “high level” scope and nature of the **training strategy** need to be clarified and confirmed including content, approach, schedule, and delivery platforms (i.e., e-learning, simulations, in-class, etc.), employee segmentation or not, budget and resource requirements both internally and externally, and the extent to which system experts or role models/mentors/advisors and pilot testing will be used to
both implement and support ongoing applications.

5. The scope and nature of quality measurement and reporting across the training and learning cycle – from planning and curriculum development, resource deployment, delivery approach and segmentation, skill and knowledge acquisition, through to impact and value creation. This effort needs to include how quality measurement and reporting will be undertaken and to whom – to the Board, senior management, front-line managers, the employees themselves, and interested and vested parties such as unions, professional licensing bodies, colleges and universities, and digital systems vendors.

6. Finally, determine how mission-critical internal governance is going to be managed, starting with:
   a. clarity of roles, accountabilities, and responsibilities;
   b. delegated authorities, both financial and non-financial;
   c. ongoing quality management and improvement decision making and under what circumstances; and
   d. what and when performance and/or risk updates need to be brought to the Board of Directors.

Internal governance effectiveness needs to be a core element of training strategy development and program delivery, especially given the interdependent and complex nature of digital applications. Effective knowledge and skill acquisition and deployment will be at risk if the various participants are confused about their respective roles and accountabilities, and how they need to work together to deliver complex digital practices and outcomes.

In conclusion, while this article has focused on core types of digital transformation, related training strategy considerations, and an enabling framework for effective internal governance and management, it also highlights the need for taking a proactive, broad, and risk-managed approach to digital training program development and execution.

Digital transformation of customer products and services, through operational and administrative processes, has a profound impact on the entire business model; all
aspects of work and job design, and of critical importance, the employees (and their knowledge and skills) who deliver the essence of the direct and indirect value proposition. Given the scope and nature of the digital transformation opportunity and its inherent risks, related education and training strategies need to consider an array of multi-functional and interdependent stakeholder needs and interests, who ideally need to be engaged to drive sustainable success and risk mitigation. Anything less will ultimately compromise or put at risk end-user customer satisfaction, patient care, and related brand quality.

Finally, a strategic approach to the effective governance and management of training and education practices for digital application success requires a concerted and teamed effort between human resources, operational line managers and leaders, and related support and oversight from governing bodies and representatives. While this requires an aligned mindset, meaningful resources, and enabling practices, the net impact will invariably be process and outcome excellence, focused risk mitigation, and ultimately end-user satisfaction and brand loyalty.

**About the Author**

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