Skilled by Design: A Blueprint for Alberta's Future Workforce

Building the Most Adaptable, Innovative & Progressive Workforce in Canada
Work is about people.

We aspire to a future where Albertans, our businesses and the economy thrive. By embracing diversity, innovation and new ideas, Alberta will become the place where the brightest minds come together and solve the world’s biggest challenges.
# TABLE OF CONTENTS

## Introduction

### Building a Better Alberta

- Create Retraining Opportunities for Alberta’s Youth
- Address Chronic and Future Skills Gaps In Alberta
- Restore Alberta’s Reputation for Innovation and Dynamism
- Strengthen Alberta’s Reputation for Diversity and Inclusion

## A Culture of Lifelong Learning

- Catalogue and Consolidate Existing Micro-Credentialing Programs
- Expand Micro-Credentialing Programs for Both Technical and Soft Skills
- Increase Access to Assessment Opportunities

## Experience-Based Training

- Collect Better Data on Existing WIL Programs in Alberta
- Increase Information-Sharing on WIL Opportunities
- Expand the Range of WIL Programs Available in Alberta
- Incorporate a Reverse-Mentoring Component to WIL Placements

## Contributors

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Our goal is to create the best, most skilled, technologically sophisticated, progressive and adaptable workforce in the country. Alberta will be a place where people collaborate across businesses, industries and sectors. We build bridges, engage and solve problems together.

*To do this, the Business Council of Alberta is focusing on:*

**Building a Better Alberta.** To flourish in the 21st century, Alberta needs to be an attractive place for everyone to live and work. This means using the opportunity of an economic reset and recovery to build a reputation for openness and inclusion, and welcoming boldness in collaboration and innovation.

**A Culture of Lifelong Learning.** Technology is disrupting the nature of work at an accelerating rate. To help Albertans keep pace and maintain a competitive, highly employable labour force, businesses must provide an enabling environment for continuous improvement, re-skilling and upskilling, while fostering a growth mindset within their workforces.

**Experience-Based Training.** Education is just one part of the learning process. Real-world work experience is also critically important. Evidence shows work-integrated learning opportunities bridge the gap between employer and employee expectations, creating better-prepared, more confident and more widely skilled workers; while businesses gain exposure to new ideas, approaches and skills.

Business Council members commit to making significant and meaningful progress in these three areas. We have developed specific long-term goals for each and a series of commitments to help us meet them. We will work with governments and post-secondary institutions along the way, but we recognize that it is up to us to play a leadership role in creating the workforce of tomorrow.

Sustained efforts in these areas could greatly accelerate our recovery from the COVID-19 crisis and bear fruit within a few years. Alberta will be home to advanced and world-leading natural resource industries and a thriving technology ecosystem that not only propels our economy forward itself but also complements, enhances and enables our traditional industries. Alberta will boast a dynamic workforce where modern skills meet undaunted ambition to create strong and shared prosperity for all Albertans. It will be the place that people with a vision and drive to solve the world’s greatest challenges come together to embrace the future and the opportunities it brings.
Technology, demographics and social pressures combined with the lasting effects of the COVID-19 crisis are transforming the workplace. According to an RBC study, 50% of Canadian jobs will undergo a significant overhaul of the skills required in the coming decade. The World Economic Forum (WEF) estimates that the half-life of a professional skill is now just six years. Meanwhile, young workers are bringing new skills and ideas—as well as different generational values—to an otherwise ageing workplace.

How is the workplace transforming?

• Artificial intelligence and digitization are not eliminating jobs, but they are dramatically changing the skills that are needed in the workplace.

• The jobs that are being created today require not only more technological skill, but also more foundational skills such as creative and critical thinking, communication and social perceptiveness, problem-solving, teamwork and adaptability.

• Digital platforms are creating tremendous growth in the gig economy and task-based work.

• Individuals can expect to work in a more flexible environment and have multiple careers. Lifelong training and continual skills upgrading are a reality in the future of work.

• Data analytics and skills are unlocking new productive potential in businesses that embrace innovation.

• Though too early to know the lasting effect, the recent COVID-19 crisis has further amplified the value of many of these skills.
Alberta’s challenges:

- Our economy is on the long path to recovery from the COVID-19 shutdown and oil price crash, with considerable uncertainty about what the future will hold.
- Economic growth and business investment have slowed considerably since 2014.
- Businesses are having difficulty attracting skilled workers from outside the province.
- Alberta is not considered to be as open and inclusive as many other jurisdictions.
- Cross-industry collaboration networks are relatively underdeveloped.
- Labour shortages in technology-related occupations limit growth opportunities.
- We are losing our reputation as an innovative and entrepreneurial province.
- Like the rest of Canada, we are failing to fully capitalize on the talent and skills of our Indigenous and immigrant populations.

At the same time, some Alberta businesses, adjusting to a recovering economy in transition, find it difficult to find workers with the necessary skills. Labour shortages in certain jobs and businesses remain, in spite of high unemployment. The Information and Communications Technology Council (ICTC) reports that demand for digital occupations in Alberta is expected to grow twice as fast as overall employment, reaching 9,000 positions by 2023.

The Business Council of Alberta (BCA) convened the Task Force on Future Training and Skills to study how Alberta can best respond to these issues. The Task Force recognizes that meaningful progress requires close collaboration and alignment with government and post-secondary institutions. However, it also believes that success requires that businesses play a leadership role.

To that end, the Task Force and its research team have crafted a vision for Alberta’s future workforce and identified a path forward. That path requires restoring Alberta’s reputation as welcoming and innovative; expanding the availability of work-integrated learning opportunities; and building a culture of lifelong learning through a well-developed system of micro-credentialing.

This will not be a short process. However, by making concrete commitments in these areas now, the Alberta business community will help build critical momentum toward both economic recovery and achieving our longer-term goal: creating the best, most advanced and most progressive workforce in the country.
END GOAL: Alberta exemplifies innovation, inclusivity and entrepreneurship. It is recognized as the place where Canada's most talented workers solve the world's biggest challenges.

To flourish in the 21st century, Alberta needs to be an attractive place for everyone to live and work. This means using the opportunity of an economic reset and recovery to build a reputation for openness and inclusion, and welcoming boldness in collaboration and innovation.

Over time, Alberta's reputation as an exciting, dynamic and accepting place has faded, impacting our ability to draw the best and brightest workers to our province. The economic shutdown and recovery post-COVID-19 presents Alberta with an opportunity to rebuild our reputation, not by skirting around the edges or inauthentically making gestures, but by facing head-on the issues and perceptions that need to be addressed. This means making progress on three specific challenges:

**Economy:** For many people, Alberta is synonymous with fossil fuels. In the context of global climate change action, they see the traditional energy sector as a place with an uncertain future, and see limited prospects elsewhere in the province. The ongoing economic devastation of COVID-19 and the oil price collapse only compounded existing labour market stagnation.

**Innovation:** Alberta used to have a reputation as a place which embraced entrepreneurialism, new ideas and hard work. Over time, that perception has faded.

**Progressivity:** There is an impression outside the province that Alberta is stuck in the past—less inclusive than other parts of Canada and not as welcoming to people of diverse backgrounds.

The potential benefits of progress in these areas are considerable—both for accelerating the pace of economic recovery as well as for building lasting prosperity. Innovation is critical to ensuring that Alberta's industries are competitive in the future economy. Meanwhile, diversity—in opinions, skills, backgrounds, ages, identities and orientations—is essential in fostering that innovation. A study by the Boston Consulting Group shows that companies with more diverse management teams are more innovative and have, on average, 19% higher revenue as a result.

To create Alberta's optimal future workforce, the province needs to become a magnet for the best and brightest from around the world, and welcome all who are willing to work hard and put their diverse skills and perspectives to use tackling the biggest challenges facing the world today. If we can do this, we will:

- Widen the talent pool available to business;
- Create opportunities for under-represented groups and contribute to greater shared prosperity;
- Raise Alberta's innovation and productivity potential; and
- Unleash the passion and enthusiasm of young and diverse workers.

The Business Council of Alberta believes that it is our responsibility to change the story about what it means to live and work in this province. Only through demonstrated, concrete and authentic action can we attract the people we need.
Prior to the COVID-19 and oil price crises, the Alberta economy was already struggling with tepid growth, skills gaps, declining investment and a faltering reputation as a dynamic place in which to do business. As the province shifts to recovery, we have a unique opportunity to address these issues to reposition Alberta for future economic success.

We see four broad focus areas—centred on the themes of economy, innovation and inclusion—where meaningful action on the part of businesses, government and post-secondary institutions could help achieve this goal.

1 First, we need to take action to address high youth unemployment in Alberta—a problem which pre-dates the COVID-19 outbreak. Over the past five years, youth unemployment has emerged as a major policy challenge in the province, especially for young men. The COVID-19 outbreak further magnified this challenge, only in this case the impacts were more widely felt by young women.

2 Second, we need to address chronic skills gaps in Alberta. The province has a well-documented shortage of workers in tech-related fields, agriculture, transportation and several others. There are opportunities to pivot the workforce towards occupations in these high-demand areas.

3 Third, Alberta needs to restore its faded reputation for innovation and economic dynamism. The province was widely considered to be a place where ingenuity, ambition and hard work were prized—a place where people and businesses met challenges head-on and achieved remarkable results. Regaining that perception is critical to attracting and retaining investment and the best and brightest workers. It is vital to our future economic recovery.

4 Fourth, Alberta needs to be seen as a welcoming place for everyone. Diversity strengthens businesses, improves our innovation potential and increases the value of our companies. In a world competing for talent, we cannot afford to be overlooked by those who see Alberta as overly conservative and less open to diversity.
Create Retraining Opportunities for Alberta’s Youth

Even before the recent crises, Alberta was struggling with high youth unemployment. These concerns have only magnified since the economic shutdown and oil price crash in early 2020.

Left unaddressed, this issue results in two important impacts: first, it creates a training and experience gap for a cohort of Albertans; and second, long-term youth disengagement from the workforce can lead to high levels of social disenfranchisement and potential unrest. Failure to improve job prospects for young Albertans will accelerate migration out of the province, taking away our future talent base.

An immediate step towards resolving this issue is to ensure that young Albertans do not miss out on training and work experience during these difficult times. Businesses are willing to do their part to provide those opportunities, but the current economic context makes it difficult for them to commit to creating new permanent jobs in the short term.

The solution is for governments and businesses to work together to train and provide work experience opportunities for young Albertans today so that when labour demand picks up, there will be an engaged and trained workforce ready to fill those positions. The federal government has taken steps to address this issue through a range of COVID-19-related support programs aimed at Canadian students.

There are opportunities for the provincial government to expand on these programs and fill in their gaps. One option is to introduce a temporary wage subsidy for hiring Alberta youth, similar to the cancelled Summer Temporary Employment Program (STEP) but extending beyond the summer months. An expanded STEP would provide valuable job experience to Alberta youth, keeping them engaged in the labour market during the economic recovery.

We also believe the time is right for a significant expansion of federal supports to the provincial government under the Canada-Alberta Workforce Development Agreement (WDA). In light of the post-COVID-19 recovery and Alberta’s specific and unique challenges, we believe the federal government should provide a temporary but significant cash injection into the WDA to complement existing levels of provincial funding which should at least be maintained at present levels. Doubling federal WDA support would allow the provincial government to deploy half of the additional funds towards supporting training and work experience programs specifically for Alberta youth, while the other half would go towards enhancing the Canada-Alberta Job Grant (CAJG) (see Objective 2, below).

The quality of training and the results for both Alberta youth and businesses depend heavily on the work that businesses themselves put in. They need to be able to accurately understand and assess the skills and competencies they need in the workplace; create a learning plan; and provide dedicated resources to guide, mentor and assess the trainees. This effort and preparation is critical to delivering high-quality training and providing value for money.

Finally, while workplace training initiatives are important in the short term, they do not replace the need for post-secondary education or the ancillary services—such as
counselling and tutoring—those institutions provide. In response to fiscal pressures, the provincial government has cut post-secondary education funding and lifted the cap on tuition rates to allow schools to make up the revenue difference. These steps place added financial pressure on Alberta youth. They should not end up limiting access to education especially at a time when it is more valuable than ever. If tuition rates rise, the provincial government also needs to ensure that students have access to adequate financing so that every Albertan who wants to attend post-secondary is able to do so.

**Recommendations and Calls to Action:**

**For the Government of Canada:**
- Double existing support payments to the Alberta government under the Canada-Alberta Workforce Development Agreement (WDA) for 2020 and 2021.

**For the Government of Alberta:**
- Introduce a temporary wage subsidy program similar to the Summer Temporary Employment Program (STEP) to make it easier for businesses to hire young Albertans during the recovery phase from the COVID-19 and oil price crises.
- Deploy half of any incremental WDA funds received from the federal government towards supporting training and work experience programs for Alberta youth.
- Review the existing suite of employment and training programs and services to focus on providing Alberta youth and displaced workers with enhanced upskilling opportunities in anticipated high-demand fields to help them secure meaningful employment once the job market recovers.
- Work with businesses to provide them with better tools to understand and articulate the skills and competencies they need in the workplace.
- Monitor the impact of tuition increases on access to post-secondary education and student debt. Improve the availability and credit conditions of Alberta student loans as needed to ensure that financial considerations are not a barrier to education for Albertans.

**For Alberta Businesses:**
- Commit to hiring as many young Albertans as possible through a renewed STEP-like program to provide job opportunities for Alberta youth.
- To guide the development of provincial upskilling programs for Alberta youth, work through the Business Council of Alberta to improve the quality of information shared with the provincial government about current and anticipated future skills gaps.
- To maximize the effectiveness of training programs; develop a learning plan; and provide dedicated resources to guide, mentor and evaluate trainees.

**Business Council of Alberta Commitments:**
- Inform BCA members about provincial government training and employment support programs for Alberta youth.
- Act as a liaison between the business community and the provincial government to identify skills needs for youth training programs.
- Advocate to the federal government for a significant increase in federal support under the WDA.
Address Chronic and Future Skills Gaps in Alberta

Alberta’s economic recovery will be a long process. However, it also creates an opportunity to act strategically to address chronic and anticipated skills gaps in the workforce and to position the province for long-term competitiveness and economic success.

Long before the economic shutdown, Alberta businesses struggled to find workers with the skills they needed. There were well-documented shortages in industries like agriculture, transportation and manufacturing. In an increasingly digitized workplace, there was also a growing premium on foundational skills such as creative thinking, problem-solving and adaptability. However, skills shortages were most acute in technology-related fields such as coding, software engineering and other digital occupations.

Tech-related skills are critical to Alberta’s long-term economic recovery. They are not simply needed in the province’s relatively small tech sector; they exist in, or directly support, every industry in the province. Put simply, tech jobs are about solving problems: reducing business costs; increasing productivity and competitiveness; expanding business capabilities; and reducing externalities like greenhouse gas emissions. There is no industry to which these benefits do not apply.

With many Albertans still out of work or underemployed, there is a unique opening for government, post-secondary institutions and the business community to work together to address these skills gaps with minimal disruption to the existing workforce.

As part of this process, we believe the time has come for the Alberta government to create a new Workforce Development Strategy (WDS). Such a strategy is needed not only to respond to the growing influence of technology on how we work and the skills/competencies we need, but also to chart a path forward as we rebuild from the COVID-19 economic shutdown.

Another, more immediate option is for the provincial government and businesses to leverage the Canada-Alberta Job Grant. Funded through the WDA, the CAJG is typically used to upskill current employees through an employer-led, three-way cost-sharing arrangement between the business, and the provincial and federal governments.

However, the CAJG can also be used to train unemployed individuals. In such cases, governments will cover 100% of the training costs if an employer submits a letter or conditional offer of employment as part of their application. This is a little-known feature of the CAJG; approximately 99% of grant funds typically go to training existing employees.

Businesses are in the best position to anticipate their future skills needs. As such, this employer-led program is an excellent tool to allow businesses to train present and future workers in the skills they will need when the economy fully recovers and employment demand picks back up.

As noted earlier, BCA recommended that the federal government double its WDA contribution to Alberta, with half of the new funds devoted to training programs for youth in the province. We propose the remaining half be earmarked for the CAJG, with those funds devoted exclusively to training unemployed Albertans. In addition, we recommend that until the end of 2021, the provincial government waive the requirement that funds be conditional on an offer of employment.
Recommendations and Calls to Action:

For the Government of Alberta

• Create a Workforce Development Strategy (WDS) that would set out the province’s objectives and goals in creating the workforce of the future in Alberta. The WDS should provide a coordinated approach to developing and deploying the programs needed to achieve those goals.

• Deploy half of any incremental Workforce Development Agreement funds received from the federal government through to the end of 2021 to the Canada-Alberta Job Grant. Those funds should be earmarked for employer-led training of unemployed Albertans and should not be tied to a formal or conditional job offer.

• Conduct an awareness campaign to promote the fact that businesses can use the CAJG to train/upskill workers without committing to hiring them after the training is complete, and that all training costs will be reimbursed.

For Alberta Businesses:

• Commit to expanding the provincial labour pool by providing on-site training through the CAJG for unemployed Albertans.

Business Council of Alberta Commitments:

• Inform BCA members about provincial government training and support programs.

• Work with the provincial government and businesses to identify current and future labour market gaps to focus training and upskilling efforts.
Restore Alberta’s Reputation for Innovation and Dynamism

A key part of Alberta’s economic recovery plan and building the workforce of tomorrow must be attracting and retaining the best and brightest to live and work in Alberta. While this might not seem like a critical priority while unemployment remains high, Alberta is in a global competition to attract investment and talent. That was true before the COVID-19 crisis hit. It will be no less true in the future.

To attract and retain that investment and talent, Alberta needs to restore its reputation as a place of economic opportunity, openness and dynamism. We need to be seen as a place that welcomes bright people with bold new ideas—people willing to put their talents to use solving the world’s problems. If we succeed, we create a virtuous cycle where attracting the best and brightest in turn attracts more of the same.

The first part of restoring that reputation is to better communicate and celebrate our current successes, both as a province and as a country. Alberta businesses are leaders in innovation—including in clean energy and climate change. The oil and gas sector conducts an estimated 75% of all clean technology research in Canada. Similarly, BCA members have invested more than $20 billion into reducing emissions through energy efficiency, clean tech and renewables.

Second, we need to reframe our existing economic and social challenges as opportunities. Our research and experience show that younger workers are attracted to meaningful jobs that allow them to solve problems and make a difference in the world. Whether it is research and development of vaccines, climate and clean energy solutions, agricultural sustainability or any of a number of other issues, Alberta can be the place where that work happens. There is a role for governments to play in supporting that message, but it is ultimately up to businesses to pursue those goals and modify their job descriptions along those lines.

Finally, Alberta needs to take bold initiative to demonstrate our commitment to innovation, ingenuity and doing things better. For example, Alberta’s energy sector is a leading source of greenhouse gas (GHG) emissions across Canada. We can also be a leader in contributing to solutions: developing and commercializing the technologies and innovations that can decarbonize the globe. The same is true for any of a number of other major challenges.

To demonstrate that commitment, we propose the creation of an annual Alberta A-Prize public competition to incentivize individuals, businesses and other organizations to develop innovative ideas and technologies to help solve the biggest challenges facing the world today. We recognize that fiscal and economic realities make it difficult for both the business community and the provincial government to commit to long-term financing for such an initiative at present. However, a visionary Alberta A-Prize, co-funded by the province and the business community, would demonstrate our commitment to innovation, ingenuity and embracing dynamic new ideas.

Alberta needs to restore its reputation as a place of economic opportunity, openness and dynamism.
Recommendations and Calls to Action:

**For Alberta Businesses:**
- Explore the viability of creating an annual Alberta A-Prize competition aimed at developing creative solutions to the world’s most intractable challenges.
- Develop cross-business and cross-industry innovation and collaboration opportunities for seconded employees to work together to solve innovation and technology challenges, using the Canadian Oil Sands Innovation Alliance as a model.
- Explore options to reframe future job openings away from the traditional occupation-specific approach and more towards problem-solving opportunities.

**For the Government of Alberta:**
- Enhance Alberta’s reputation for innovation by celebrating the province’s business-sector innovation successes nationally and globally.

**Business Council of Alberta Commitments:**
- Work with the business community to explore the viability of creating an Alberta A-Prize competition, including identifying the required funding, operating structure and selection criteria.
- Communicate members’ innovation success stories to the federal and provincial governments as well as to the public.
- Build a national consensus on energy, environment and economy, including Alberta’s role as a productive part of Canada’s net zero goals.

**For the Government of Canada:**
- Enhance Alberta’s reputation for innovation by celebrating the province’s business-sector innovation successes, including in the energy sector.
Strengthen Alberta’s Reputation for Diversity and Inclusion

Part of Alberta’s cultural identity is the belief that if you have good ideas and are willing to work hard, there is a place for you in this province—money, heritage, culture, gender expression and identity, sexual orientation and family connections are irrelevant.

Unfortunately, many outside Alberta do not share that view of the province. Rather, there is a sense among many that Alberta is overly conservative, intolerant and closed to new ideas. This perception, inaccurate as it may be, has a negative impact on our ability to attract people to Alberta or retain our home-grown talent. It limits the number of people who want to build a life in Alberta. And perhaps more importantly, it limits the type of people we attract. Left unaddressed, these issues will impact our future economic and social prosperity. As noted earlier, diversity is linked to greater levels of innovation, higher productivity and more business revenues.

Businesses are in the best position to change the perception of Alberta. They are, in a sense, ambassadors for the province. Through hiring practices, community involvement and philanthropy, actions in times of crisis and public policy positions, Alberta’s corporate community shapes the province’s reputation. In short, we need to embody the values we wish to create—an Alberta that demonstrates its commitment to diversity, inclusion and equity.

BCA members are committed to these values. We know that having diverse voices at the table helps us make better decisions at all levels and increases the value of our companies.

OBJECTIVE FOUR

BCA members know that having diverse voices at the table helps us make better decisions at all levels and increases the value of our companies.

work environment, but recognize that much more needs to be done. We are committed to continuing that work.

As a step in demonstrating that commitment, Alberta businesses should establish diversity targets within their companies with the long-term goal of balanced representation in executive and board positions. This process begins with acting decisively to remove the barriers faced by under-represented groups in full participation and advancement in the workplace. It also involves creating mentorship, sponsorship and coaching opportunities to connect leaders in their organization with employees of different backgrounds and tenure; implementing codes of workplace conduct that eliminate harassment and discrimination; and providing workers with appropriate recourse options in the event that harassment and discrimination claims do take place.

BCA understands that establishing diversity targets will not happen overnight and that they are just the first step in strengthening Alberta’s reputation as an inclusive province. But they are important. Alberta will be overlooking talent and new ideas, and we will become a lesser version of ourselves, if we do not adopt progressive hiring practices and offer a welcoming environment to all.

One step that business leaders can take is to work to better understand the challenges and obstacles that under-represented groups face in the workplace. BCA members propose CEO-level participation in workshops on diversity, inclusion and equity, with the goal of implementing progressive hiring practices and enrichment of organizational culture. Only with
an improved understanding can Alberta and the business community move forward together. Most importantly, BCA members recognize that this challenge cannot be solved overnight with a few simple steps. We commit to continuous learning, open-mindedness, humility and doing all we can to ensure that all people are welcome in this province.

Recommendations and Calls to Action:

For Alberta Businesses:

• Implement and participate in BCA member-organized, expert-led workshops on issues related to diversity, inclusion and progressive and equitable hiring practices.
• Demonstrate leadership within the Canadian corporate community by developing inclusive, equitable and non-discriminatory hiring, pay and operational practices. Work collectively with other Canadian corporations to develop reporting and progress monitoring platforms.
• Work with community leaders to address and remove the systemic barriers that under-represented groups (including culturally diverse individuals, Indigenous persons and those of all sexual orientations) face in the workplace.

Business Council of Alberta Commitment:

• Provide a vehicle through which BCA members can convene to participate in workshops on subjects related to diversity, inclusion and progressive and equitable hiring practices.
Our goal is to create the best, most skilled, technologically sophisticated, progressive and adaptable workforce in the country.
END GOAL: Alberta has a strong culture of lifelong learning leading to a resilient and highly employable workforce and enabled by a recognized, integrated system of micro-credentialing.

Technology is disrupting the nature of work at an accelerating rate. To help Albertans keep pace and maintain a competitive, highly employable labour force, businesses must provide an enabling environment for continuous improvement, re-skilling and upskilling, while fostering a growth mindset within their workforces.

With the half-life of skills reduced from 30 years to six, Albertans need to be continuously updating and enhancing their skills at every stage of their careers to stay ahead of technological change. The old model of formal multi-year education that leads to a stable career no longer applies. Increasingly, Albertans will need to embrace a philosophy of lifelong learning through continuous education and curiosity. This holds especially true as we emerge from the COVID-19 economic crisis with a changed economy and varied skill expectations and needs for our workforce.

Despite high unemployment in the province, some Alberta businesses continue to have trouble finding workers with the skills they need. With youth unemployment rates reaching nearly 30% in April 2020, and 50% of Canadian jobs expected to be disrupted by technology in the coming decade, matching people, skills and jobs is as critical as ever. Global companies have similar challenges, but many have recognized that if they cannot find the right people in the job market, they need to focus their attention on training and cultivating the talent they already have in place.

Competency-based micro-credentialing programs offer a solution to these challenges. These programs effectively break down continuous learning into courses spanning a few weeks or months, often alongside ongoing employment. They can be extremely effective in allowing individuals to develop, tailor and update their own skills quickly and efficiently through accumulating stackable and transferable credentials. As well as helping to accelerate our economic recovery, the benefits include:

- A more adaptable and responsive system of education and training that keeps pace with technological change and evolving workplace needs;
- Workers that are better insulated against technological disruption;
- Higher income potential for workers through increased portability of recognized credentials and greater occupational professionalization; and
- Increased business efficiencies through better harmonization of standards and qualifications.

The Business Council of Alberta believes that businesses must work together, and with post-secondary institutions, to expand the availability and recognition of micro-credentialing programs across the province. As business leaders, it is our responsibility to take the first step and to demonstrate our commitment to advancing this goal.
The Business Council of Alberta believes that businesses must work together with post-secondary institutions and the provincial government to expand training, upskilling and re-skilling opportunities for Albertans. Creating a culture of lifelong learning and developing up-to-date, transferrable skills is critical to building a more resilient and prosperous Alberta economy as we climb back from the COVID-19 economic shutdown and oil price crash and begin to rebuild.

Given rapidly-evolving skills needs in the workforce, we believe the best way to accomplish this goal is to expand the availability and recognition of micro-credentialing programs across the province.

We envision a three-step process to achieve this goal.

1. **First**, before expanding the availability of micro-credentialing, more work is needed to catalogue, harmonize and consolidate existing programs. While businesses see value in expanding micro-credentials, they also struggle with a lack of clarity within the existing system.

2. **Second**, once the consolidation effort is well underway, businesses, governments and post-secondary institutions need to work together to expand the number and range of micro-credentialing programs in the province. To succeed, those programs must be developed according to the following guidelines:
   - In close co-operation with the business community;
   - Resulting in widely recognized, respected and transferable certificates; and
   - Harmonized across institutions so each program teaches the same skills and develops the same competencies regardless of which is providing the service.

3. **Third**, in some cases Albertans may have acquired credentiable skills through work experience, informal mentoring or through self-teaching. They should have the ability to challenge micro-credential tests without needing to take the associated course.
Catalogue and Consolidate Existing Micro-Credentialing Programs

Expanding the availability of micro-credentialing programs creates significant opportunities for Albertans to continually update, upgrade and tailor their skills according to their preferences and to employers’ needs. The result is a more resilient, well-trained and adaptable workforce with demonstrated and transferrable skills and competencies. Businesses are eager to help make this happen.

Expansion, however, is the second step. The first step is to properly catalogue the existing programs and to focus on consolidation and standardization. Many Alberta post-secondary institutions are actively building micro-credentialing programs. Bow Valley College (BVC) in Calgary is perhaps the leader in this area, but nearly all of Alberta’s major post-secondary education providers are doing so as well.

These institutions deserve credit for responding to changing education needs through this kind of innovation. At the same time, however, the present approach creates a twofold challenge for many businesses: in many cases, they do not know what programs are available or which among them is best; and when they do know what is available, they see significant overlap and duplication.

In addition, while the rise of private education providers helps to democratize the education system, it also creates uncertainty because businesses do not always know which institutions and credentials are most reputable. Businesses need to have confidence that when they invest in workforce training, they are going to receive value for their money. They need to have a clear, comprehensive list of the programs that are available and the skills and competencies that are taught in each. They need to know that outcomes and competencies are consistent for each type of credential offered, regardless of the institution providing the service.

The end goal should be that a credential from any one Alberta institution is equivalent (in terms of outcomes) to the same credential from another institution. To work towards this goal, the Alberta government and the province’s post-secondary institutions need to begin by cataloguing and standardizing the skills being developed within existing post-secondary education programs. While this should be done across the range of education services, micro-credentialing programs are a good place to start because they are smaller and more discrete.
Recommendations and Calls to Action:

For the Government of Alberta:

• Work with post-secondary institutions and private education providers to catalogue, consolidate and standardize the skills being developed and assessed in micro-credentialing programs across the province. Where relevant, these programs should conform to existing international standards.

For Alberta Businesses:

• Help the standardization effort by providing information about existing programs, sharing experiences on program effectiveness, and clearly communicating their skills and competency training needs to post-secondary institutions and the provincial government.
Expand Micro-Credentialing Programs for Both Technical and Soft Skills

Once the work on inventorying, consolidating and standardizing is well underway, then attention can turn to identifying new opportunities to expand micro-credentialing programs in Alberta.

The business community supports a competency-based approach to building micro-credentialing programs. Part of this process should involve creating a standardized model for how micro-credentialing programs work. Specifically, each program should identify the precise competencies required for completion. Individuals who train for a second micro-credential with overlapping competencies should only be trained on the ones they lack.

Success requires that the business community coordinate efforts with post-secondary institutions that are leaders in this area. Bow Valley College, for example, is looking to the business community to help them identify specific technical and non-technical skills that could potentially be micro-credentialed. Since the effectiveness of these programs depends heavily on business input, there is an important role for BCA members to play in influencing, shaping and prioritizing the programs that are being developed.

That process begins with the business community working together to identify specific micro-credentialing opportunities across a range of sectors and employers. For this to succeed, a critical mass of Alberta businesses needs to agree on which skills can be micro-credentialed, develop a precise list of competencies for each and provide criteria for evaluating those competencies. This is a role that BCA members need to play.

The next step is curriculum development. For these programs to be as effective and widely adopted as possible, post-secondary institutions need to work together as a single co-operative unit. There is no need for institutions to compete with one another by creating overlapping programs or duplicating efforts. Our long-term objective should be that a degree, diploma or micro-credentialing certificate program teaches students the same skills and competencies, and delivers the same outcomes, regardless of which institution is providing the service. Programs that are partially completed should be seamlessly transferrable from one institution to the next. And, depending on enrolment demand, not all institutions need to offer all programs, so long as student accessibility is preserved.

Finally, there is the need to begin the work on stackable credentials. This is a long and time-consuming process and we recognize it to be a distant goal. As a first step, however, institutions can begin by mapping micro-credentials onto existing courses or programs. If a student can, through micro-credentialing, demonstrate the competencies needed to complete a specific course in a degree or diploma program, then the requirement to take that course could be waived.
Recommendations and Calls to Action:

For Alberta Businesses:

• Work together to create a list of no fewer than 15 new micro-credentialing program opportunities to present to post-secondary institutions and the Alberta government by the end of 2021.
• Provide the provincial government with input into:
  • which degree/diploma programs or courses are best suited to be broken down into stages that can be micro-credentialed; and
  • the competencies that should be included within each of those stages.

Business Council of Alberta Commitment:

• Support business-sector-led initiatives to identify micro-credentialing opportunities by playing a convening role in those efforts, as well as an intermediary role in advancing business proposals to the provincial government and post-secondary institutions.

For the Government of Alberta:

• Assess and harmonize the competencies and outcomes that are required for completing any given education/training program across the province, regardless of the institution providing the service. As a first step, this concept should be applied to the development of new micro-credentialing programs in Alberta.
• Work with post-secondary institutions in Alberta to break down existing degree and diploma programs into small portions that could be micro-credentialed. Students would receive formal recognition for each step completed. As a first step, begin the process of mapping competencies that can be micro-credentialed onto existing courses or programs.

Features critical for building a successful micro-credentialing program framework in Alberta:

• Widespread business recognition of the value of the credential;
• Portability across industries and disciplines;
• Recognition of both the technical and soft skills needed for any given credential; and
• In the long term, making credentials stackable, allowing Albertans to build towards a formal university degree or college diploma.
Increase Access to Assessment Opportunities

While micro-credentialing offers a way for workers to acquire specific skills more quickly and efficiently, some may possess those skills already through a combination of work experience, informal mentoring or self-directed learning. From the business perspective, it does not matter from where Albertans learned their skills. What matters is that those skills can be identified, assessed and verified through a credible, respected process.

Bow Valley College (BVC) is developing a program called Pivot-Ed that serves as a useful model in this regard. Micro-credentialing programs begin with the test. If the student passes, then they receive their credential without needing to take the course. If they do not pass the test, they are trained only on the specific competencies/modules within that program that they failed. Students are free to train with BVC or whomever else they wish, including through self-directed learning, until they wish to re-test. The result is a streamlined, efficient and tailored training process that allows Albertans to gain their credentials as quickly and efficiently as possible.

In our view, this is an outstanding model for workforce training and upskilling and should be broadly applied across the post-secondary education system. BCA members have an opportunity to contribute to a significantly improved model for micro-credentialing by being actively involved in the timely development and expansion of this program.

Recommendations and Calls to Action:

For Alberta Businesses:

• Pay for any employee to challenge any micro-credentialing test they wish prior to taking the course, provided the individual can make a reasonable case for why they should be able to pass that test.

• Work with Bow Valley College to develop and enhance the Pivot-Ed program by providing input and feedback into identifying workplace competencies, assessment criteria and micro-credentialing program opportunities.

For the Government of Alberta:

• Use Bow Valley College’s Pivot-Ed program as a model for the development and execution of all micro-credential testing and training procedures across post-secondary institutions in Alberta.
As we think big about economic recovery and the current workforce, it is time to think just as big about building the next generation of the workforce.
END GOAL: All Alberta post-secondary students have access to some form of work-integrated learning before they graduate.

Education is just one part of the learning process. Real-world work experience is also critically important. Evidence shows work-integrated learning opportunities bridge the gap between employer and employee expectations, creating better-prepared, more confident and more widely skilled workers; while businesses gain exposure to new ideas, approaches and skills.

As we think big about economic recovery and the current workforce, it is time to think just as big about building the next generation of the workforce. Many employers believe that, in spite of Alberta’s high-quality education system, new graduates often lack a range of skills and experience needed in the workplace. Work-integrated learning (WIL) initiatives such as apprenticeships, internships and co-op programs have been recognized by the Business + Higher Education Roundtable (BHER) and many others as a solution to this problem. WIL programs, available to students at universities, colleges and technical institutes, allow students to apply their skills in a real-world setting, developing both technical and practical aptitudes, as well as the soft skills needed to work effectively in business. At its best, work-integrated learning not only creates more work-ready graduates, it also formalizes reverse-mentoring—a form of two-way learning where senior leaders regularly meet with WIL placement students to hear their ideas, thoughts and concerns.

However, our system of work-integrated learning is relatively underdeveloped. While data in this area is severely limited, a national survey suggests that only about 55% of graduating students across Canada were involved in some type of work and learning program over the course of their studies.

BHER identified four main barriers to implementing WIL initiatives: the cost to business in terms of both compensation and resource allocation; the administrative burden of participating; inadequate supply of WIL opportunities; and difficulty in evaluating student performance in a work environment.

Even so, WIL programs offer considerable benefits to both students and businesses. Expanding the availability of these programs:

- Helps industry reduce the cost and risk of employee recruitment: studies show that employers who provide WIL opportunities strongly prefer to hire graduates who gained experience at their own workplace;
- Improves alignment between student and employer expectations as graduates enter the workforce;
- Fosters multi-generational information sharing and reverse-mentoring: students learn practical skills and companies gain exposure to new ideas and technical skills;
- Results in higher entry-level salaries for students (22% higher according to one study); and
- Helps enhance Alberta’s reputation as a place to develop world-class skills.

The Business Council of Alberta believes that WIL programs offer significant value to both workers and businesses in the province. Because businesses create the supply of WIL spaces, it is our responsibility to play a leadership role in expanding the availability of these programs in Alberta—both in technical and non-technical fields.
BCA members strongly support expanding access to work-integrated learning in Alberta. Incorporating a work-based component to education will produce better, more work-ready graduates who have more exposure to, and better knowledge of, the business world. Moreover, building a great WIL experience in Alberta will help to keep the best and brightest students in the province once they graduate.

Accomplishing this goal requires business leadership, along with supporting parallel actions from the provincial government and post-secondary institutions. We envision a four-step process that will improve policy decision-making around WIL; increase the number of experience-based training programs available in the province; and improve results for students and companies alike.

1. **First**, better information is needed. There is a surprising lack of basic data available on work-integrated learning in Alberta and across Canada. That knowledge gap needs to be closed for effective policy decisions to be made.

2. **Second**, the delivery of effective WIL programs is a three-way partnership between the government, post-secondary institutions and the business community. Better information sharing between all three parties is vital for WIL programs to be successful.

3. **Third**, once progress has been made on the first two steps, BCA members are committed to working with post-secondary schools to expand the number and range of WIL programs available in the province.

4. **Fourth**, businesses recognize that experience-based training is not a one-way street. Companies stand to benefit from new ideas as much as students benefit from work placements. Formalizing reverse-mentoring is a business-led initiative that will lead to a more positive WIL experience for all parties involved.
Collect Better Data on Existing Work-Integrated Learning Programs in Alberta

BCA members broadly support the expansion of work-integrated learning programs in Alberta. However, they also pointed to a key barrier: a lack of information. Specifically, there is little or no data available on WIL placements, programs, graduation rates or best practices in Alberta—or even elsewhere in Canada. This gap was noted by the Business + Higher Education Roundtable, which observed that, “In the absence of relevant national data, we have no way of knowing exactly how many students are involved in school-to-work transition programs at Canadian post-secondary institutions.”

Without this baseline knowledge, it is impossible to develop sound policies around expanding WIL in Alberta; or make an informed commitment on opening new WIL placement spaces in the business sector. An understanding of the current gaps is critical to making progress towards our end goal of 100% of Alberta students having access to WIL opportunities in the province. Alberta businesses need the provincial government and post-secondary institutions to work together to collect this vital data.

Recommendations and Calls to Action:

For the Government of Alberta:

• Work with post-secondary institutions to collect and publish high-quality, timely statistics on work-integrated learning in the province, including which programs are being offered by which institutions; enrolment, graduation and placement rates by program and institution; the number of placements available by each program; and an assessment of which programs are oversubscribed and which are undersubscribed.

For Alberta Businesses:

• Provide any information to the provincial government needed to improve data collection on WIL programs in Alberta.
OBJECTIVE TWO

Increase Information-Sharing on Work-Integrated Learning Opportunities

An effective work-integrated learning system requires seamless integration between all participants. However, that integration is lacking in Alberta because of important information-sharing gaps between government, businesses, post-secondary institutions and other stakeholders.

From the business perspective, many companies—especially smaller ones—do not have the information they need to effectively participate in WIL programs. They see the value of WIL, but are looking for a “playbook” —a guide from the provincial government to help them navigate the process. Specifically, they would like accessible, easy-to-understand information on the following:

- **Existing WIL programs:** A catalogue of the programs available in the province; the schools that are teaching them; the skills the students are learning; and the kinds of occupations that would be a good fit for students from each program.

- **Best practices:** How companies without WIL experience can set up placement programs; how to develop on-boarding and training programs; and how to ensure a positive experience for the student and business alike.

- **Providing feedback:** How to provide post-secondary institutions with feedback on knowledge gaps in the education students are receiving; ensuring curricula are up to date; and, where applicable, teaching the tools, practices and technologies used in the business world.

- **Access to supports:** The government programs/incentives that are available to help businesses offset the cost of participating in WIL programs—whether that be up-front administrative costs; wage supports for students; or assistance with reduced productive capacity if a company’s employees are training students instead of working.

Companies are looking for a guide from the provincial government to help them navigate the WIL process.

While businesses need more information about WIL programs, governments and post-secondary institutions need better information about available placements for their students so that both students and employers benefit. This speaks to the need for effective matching services that link the right students with the right placements. Other non-governmental organizations are working to address this gap. Calgary Economic Development, for example, is building a database that matches WIL programs in the province with available placement spaces within the business community. These types of efforts need to be supported and expanded. To assist, BCA will, as necessary, work as a liaison with the provincial government and other stakeholders to provide any business-level information needed to link WIL students with placement opportunities.
Recommendations and Calls to Action:

For the Government of Alberta:

• Publish a catalogue of existing WIL programs and placement opportunities within the province. This information should include details about the skills learned in each program, as well as advice to businesses about which placement programs are the best fit for any given occupation.

• Map out and publish the process for participating in WIL programs, suggest best practices, and provide a one-stop access point for existing and future government supports.

For Alberta Businesses:

• Share information with governments, post-secondary institutions and other stakeholders about the number and type of WIL placement spaces available. As well, provide feedback on the effectiveness and quality of existing programs.

Business Council of Alberta Commitment:

• Improve two-way information sharing about WIL placement opportunities in the province by working with the provincial government and other stakeholders to provide any business-level information needed to better match existing WIL programs with placement opportunities.
Expand the Range of Work-Integrated Learning Programs Available in Alberta

Armed with the right data and improved information-sharing, Alberta will be in a better position to expand the number and range of WIL programs and placements available in the province. While the COVID-19 outbreak has made this considerably more challenging than it was early in 2020, BCA members remain committed to working with the government and post-secondary institutions to make it happen.

BCA members feel that the relationship between the business community and post-secondary institutions needs improvement. A strong system of work-integrated learning requires close co-operation and communication between the two to ensure up-to-date and relevant curriculum design; feedback on how programs could be improved; and the identification, creation and development of new WIL opportunities.

There is a leadership role for the business community to play in this area. As with micro-credentialing, a key to expanding the availability of work-integrated learning in the province is to identify opportunities for new programs with matching placements. Business leaders have suggested that non-technical fields should be a priority. They also believe that placements need not be directly tied to a specific field of study. For example, math majors could receive placements in an accounting business or supply chain position for a construction company. The primary goal is providing students with a diversity of experience, and exposure to how businesses operate.

The Business Council of Alberta can play an important intermediary role in advancing this objective. By leveraging its membership base, BCA can act as a convener, helping businesses identify new WIL opportunities and advancing business-led proposals and concerns to the provincial government and post-secondary institutions.

It is also worth highlighting that many other organizations are heavily involved in this field. From the business perspective, there is significant overlap between the Business Council of Alberta’s end goal and that of the Business + Higher Education Roundtable. There is little value in BCA re-inventing the wheel or duplicating the efforts of organizations that are already steeped in this issue. Rather, BCA will collaborate with the BHER and other groups to advance our shared interest in expanding access to WIL opportunities.

Finally, WIL does not have to mean direct on-the-job training. Problem-based learning at post-secondary institutions can achieve similar results and should not be overlooked as a learning opportunity. BCA members can work with post-secondary institutions to present real-world problems that can be used as case studies in the classroom, and also provide feedback on the results and solutions that students generate.

A key goal of WIL programs is to provide students with a diversity of experience, and exposure to how businesses operate.
Recommendations and Calls to Action:

For Alberta Businesses:

• Work together to identify and develop a list of 10 proposed new WIL occupations/programs to share with the Alberta government by the end of 2021. This list will include new non-technical occupations and programs that could benefit from incorporating a WIL component.

• Provide post-secondary institutions with real-world business challenges that can be used to advance problem-based learning in the classroom component of WIL programs.

• Support business-sector-led initiatives to identify new work-integrated learning opportunities.

Business Council of Alberta Commitments:

• Play a convening role in helping businesses identify WIL opportunities, and an intermediary role in advancing business proposals to the provincial government and post-secondary institutions.

• Engage closely with the BHER and other stakeholder organizations that share similar goals to coordinate policy development and advocacy efforts to advance WIL in Alberta and across the country.
OBJECTIVE FOUR

Incorporate a Reverse-Mentoring Component to Work-Integrated Learning Placements

Most of the focus of WIL programs is on the benefits they offer to students: a chance to apply their skills in a real-world setting; gain valuable work experience; and earn some money to help pay for their post-secondary education. But there are benefits to business as well, and these can be expanded.

Businesses get the chance to shape their potential future workforce; identify promising new permanent employees; and if they do permanently hire WIL students, those workers will already be familiar with the organization and its culture.

However, there is another benefit that is often overlooked: the opportunity to learn from their placement students. Some businesses approach WIL placements as if only the student stands to learn from the experience. This is short-sighted. Businesses can become set in their ways and not all are as nimble or up-to-date as they could be. They are not always aware of new technologies, new organizational practices, or even the full range of capabilities of their existing tools.

Placement students come into a business with a fresh and unfettered perspective, and often with a firm command of the latest technologies. If allowed to do so, they can offer new ideas, new approaches and new ways of doing things that can benefit the company.

Unlocking this potential learning opportunity requires an open mind on the part of businesses and a formalized reverse-mentoring component to work-integrated learning. BCA members recognize the potential of reverse-mentoring but were unsure what that would look like in practice. Some companies have taken a step in this direction by offering “skip level meetings”—a chance for junior employees to meet with their supervisor’s boss on an informal basis. Companies that incorporate skip level meetings report that they are an excellent tool for engaging young workers, many of whom want to have a better understanding of the rationale and strategy behind corporate decisions. These meetings give them a more direct line of sight to the company’s actions, plans and overarching goals. Companies also benefit from feedback or new ideas for how existing operations might be enhanced or otherwise improved.

The idea of skip level meetings offers a potential solution to the problem of formalizing reverse-mentoring relationships as part of a WIL program. It also provides a more specific way of achieving the goal of cross-fertilization of ideas and best practices across the generations; and it sends a signal to young workers in Alberta that they can make a valuable contribution to their workplace.

Recommendations and Calls to Action:

For Alberta Businesses:

- As part of any work-integrated learning program, BCA members commit to holding one skip level meeting every quarter with all WIL placement students.

- To encourage the widespread use of reverse-mentoring in Alberta, BCA members that currently offer reverse-mentoring as part of their WIL placement programs should share best practices with other Alberta businesses.
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