

# Results

of the CCA Hosted

## Non-Residential Construction Industry SUMMIT

held on January 21, 22, 2010

in Toronto



May 2010

## FOREWORD

On June 21 and 22<sup>nd</sup> in Toronto, CCA held a Non-Residential Construction Industry Summit for the purpose of:

1. Identifying the **major trends and developments** that will impact the non-residential construction industry going forward in the short and long term;
2. Determining **how the industry will be impacted** upon and altered by those trends/developments;
3. Determining **what industry associations need to do** at all levels to remain relevant and meaningful to their members in terms of the benefits, products and services they offer; and
4. Promoting **unity and partnership** among all industry associations.

The summit attracted over 110 participants consisting of CCA Executive Committee Members, CCA Provincial Vice-Chairs and the Chief Elected and Chief Operating Officers of CCA Partner Associations. CCA believes that the summit was a great success not only given the high participation rate, but the degree of constructive dialogue and the ability to bring together the CEOs of the various Partner Associations who do not normally have the opportunity to meet.

In all six themes were identified: New Technology, Recent Economic Downturn, Awareness of Environmental Issues, the Changing Workforce, P3 Projects, and the Increased Competition from Large and/or Global Firms

The findings of the summit were discussed at a special CCA Membership Forum convened during the most recent CCA Annual Conference. The following is what CCA perceives to be the outcome of the summit based on the discussions to date. These results will also be considered as part of the planned review of the CCA Strategic Plan to be held this fall.

\*Of note: It has been suggested that such a Summit be held from time to time for CCA to gather critical information from key industry stakeholders in a collaborative and structured manner.

## **1. NEW TECHNOLOGY**

Four areas were discussed within this theme: BIM, Electronic Plans Rooms, Electronic Information and Education and Understanding.

### Building Information Modeling

Regarding BIM, it was said that there is a lack of understanding, the smaller firms are not involved as the focus is more on large projects and there is great uncertainty as to how to implement it.

### Plans Rooms

Regarding the Plans rooms, it was said that there is a lack of standard protocols; firms have access to too many projects at once and on too many competing systems; concern was expressed with respect to the accuracy and integrity of the projects; and it was pointed out that there is less of a need for the traditional services offered by the plansrooms operations.

### Electronic information

On the topic of electronic information, it was stated that the industry lacks experience in storing and organizing information electronically. One specific question was posed in this regard and it was as follows: Is there a need for a one stop shop clearing-house information service? (this was actually one recommendation arising from the EDC Supply Chain Research project)

### Education and Understanding

Regarding education, it was agreed that the younger workers have a much better understanding of the new technology and have expectations that it is readily available in the workplace. Management must engage them in the process of identifying and implementing new technology.

The expected impact on our associations was characterized as follows:

- There will be a lot of pressure on the associations to provide training and education around all new technologies. A larger percentage of their budgets should be allocated for training purposes.
- The Associations should consider the use of webinars and other technology in their delivery programs.
- Pressure is on the Associations to set standards around BIM and how it fits in the tendering process.
- Associations need to develop an awareness program regarding BIM at the earliest possible time.

- Associations will need to preserve their relationships with tendering authorities in light of the pressure exercised by competing organizations in the plans room business.
- Associations will need to reassess the relevance of their information given the easy access by electronic means from other sources

***Proposed Activities:***

- Play an effective role in educating construction firms on the latest technologies being introduced in the marketplace so that they can assess the efficiencies these can bring to their operations.
- Ensure that, where appropriate, standards and proposed industry practices are established for the adoption of these technologies (electronic plansrooms, electronic bidding, BIM).

***CCA specific activities:***

At its last meeting, the CCA Board of directors endorsed the following position statements:

*“CCA embraces the introduction of technology that serves to maximize efficiency and productivity while preserving sound procurement and project delivery processes in the construction industry.”*

*“Building Information Modeling (BIM) has the potential to revolutionize the industry and significantly affect the construction procurement and delivery process. CCA advocates that BIM needs to be implemented in a way and at a pace that enables the stakeholders to understand their roles and responsibility and to assess their capacity to participate in this process.”*

*“CCA will not delegate its role and mandate to any other organization in assessing risk and responsibilities in the integration of BIM in the construction process. BIM is a process that supports the design and constructability of construction projects and CCA needs to address very carefully its impact, ramification, shortfalls and advantages and then suggest a sound approach for its adoption in the industry.”*

The Board also approved the following motion to help determine the best possible means of supporting and facilitating the adoption of BIM in the industry:

*“THAT CCA take a leadership role at establishing a national body with key stakeholders that would have the mandate of addressing BIM issues in the construction industry; and*

*THAT CCA makes available the financials means necessary to undertake this task.”*

CCA has since met with RAIC, ACEC and DCC to assess their support for this initiative. They welcomed this proposal and are seeking their respective Board approvals to take part in this initiative. CCA is in the process of securing additional resources to best serve this entity in terms of administrative and technical support.

Through its e-Construction Committee CCA will continue to provide a platform for discussion on such issues as Electronic Bidding, National Plansroom Services and new software developments and applications.

## **2. RECENT ECONOMIC DOWNTURN**

Three specific areas were debated within this theme: Financing, Tendering, Instability.

### Financing

Regarding the financing of construction projects, it was noted that although the stimulus package is having a positive impact, concern remains over the long-term investments in our infrastructure given large deficits and tight budgets our government will be faced with.

### Tendering

Concern was expressed over the tendering process regarding the stimulus package, more particularly as it relates to the March 31, 2011 deadline for project completion. The quality of the drawings remains a concern and so is the transfer of risk.

### Instability

The current flow of projects being tendered in the industry is going to create some instability as the market starts to decline. Will there be overcapacity? Or should we remain confident, as some reports indicate, that the growth rate will pick up yet again in our sector? How about private sector investment?

The expected impact on our associations was characterized as follows:

- In a depressed economy, Associations will have to focus on showing value to remain relevant to their membership.
- Associations will need to continue their lobbying efforts for continued investment in our infrastructure. We will need to keep governments accountable. The creation of coalitions may prove to be the best solution. Our main message will need to be that infrastructure investment is tied to economic growth.

- Associations should together create a multi-year plan for increased funding in infrastructure and hence address the issue of instability.
- New funding mechanisms ought to be promoted. For example: tax free municipal infrastructure bonds.

***Proposed Activities:***

- Immediately put pressure on governments to advocate for long-term investment; business friendly policies; better project planning and coordination with links to short-term and long-term labour force development.
- Governments must create an economic climate that encourages and sustains private sector investment in commercial buildings and industrial facilities while at the same time not losing sight of the need to ensure sustainable investments in public infrastructure post-recession, even if the face of fiscal challenges.
- Develop a strategy to be rolled out in a coordinated fashion. This strategy must focus on the development of a Canadian solution that will support innovation, growth, competitiveness and global positioning. Consider establishing a strong coalition if need be.

**CCA specific activities to date:**

CCA has been very vocal with the Federal Government. CCA has made the case for continued investment in infrastructure through the House of Commons Standing Committee on Finance and through the Senate Finance Committee on the Federal Stimulus Deadline. There have also been press releases with radio and television interviews.

**3. AWARENESS OF ENVIRONMENTAL ISSUES**

Three specific areas were discussed: LEED, Green Building in general and the Public Perception of environmental issues as they relate to construction.

**Leadership in Energy and Environmental Design (LEED)**

With respect to LEED, it was felt that more information is needed about this standard. Contractors do not necessarily understand their roles, the costs of implementing LEED projects, the legal implications, and the paperwork requirements. Owners are jumping on board without knowing the implications.

## Green Building

Concerning Green Building in general, there is also a lack of information, lack of standards and the pace of change is not well understood. Recycling remains an issue in many jurisdictions.

## Public Perception

The participants indicated that the Associations are not fulfilling their mandate in informing the public as to the role that the construction industry is playing in greening the environment.

The expected impact on our associations was characterized as follows:

- Associations need to stay on top of environmental issues.
- Associations need to play a leadership role at ensuring that standards are reasonable for local markets.
- Association needs to educate members and stakeholders, owners included, about key construction issues resulting from environmental movements, trends, standards.
- We should consider the development an environmental sustainability strategy.
- Perhaps that a multi-stakeholder conference (with owners, architects, engineers, etc.) should be organized to discuss the development of a construction paper on environmental issues.

## ***Proposed Activities:***

- Play an effective educational role on all matters that relate to the environment: regulation, standards, trends (LEED, Green Building, etc.).
- Ensure that the industry continues to be, and is seen by governments, the public and all stakeholders to be a key partner and active participant in achieving sustainable development solutions that address prudent environmental public policy objectives.
- Develop a sustainable development strategy; environmental regulation must be practical, efficient and effective

## **CCA specific activities to date:**

CCA has just created a CaGBC approved LEED for contractors course that is now available to Partner Associations for delivery. The actual objectives of this course, titled “*The Contractor’s Toolbox for Projects Seeking LEED® Certification*” are as follows:

- Analyze the LEED® Green Building Rating System for New Construction and Renovation and investigate the project certification process

- Identify project stakeholders and address their roles and responsibilities
- Analyze how LEED is specified
- Address the procurement and delivery process, evaluate the risk, and contract issues on LEED projects, and construct a LEED Documentation Manual
- Predict the impact of LEED Certification on project cost
- Identify the Tools for Successfully Managing Projects Seeking LEED® Certification

CCA is considering the development of a generic course/seminar on Green Construction.

CCA will be updating its Guide on Construction Environmental Management Planning.

CCA is very much involved in the current Federal Government review of the Canadian Environmental Assessment Act.

#### **4. CHANGING WORKFORCE**

Three specific areas were discussed by the participants: Demography and Availability of Construction Personnel, Career Promotion and Training,

##### Demography

Concerning demography and the availability of construction personnel, it was noted that it will be very difficult to replace those trained individuals who will soon be leaving the industry in masses for retirement. Temporary workers will be required and we will also need immigrants who will require special training, including language training. Labour shortages will cause major delays on construction projects. The lack of management expertise will hurt many firms in their ability to compete.

##### Career Promotion

Concerning career promotion, it was felt that it is getting harder to attract people and retain them in our industry. Young people do not tend to see construction as a career of first choice.

##### Training

The participants stated that there is a lack of training opportunities with fewer job fairs, fewer school programs and fewer on-the-job programs.

The implications for our associations were deemed to be as follows:

- Organize youth oriented job fairs and develop career promotional products. Overcome stereotype that construction is low tech and develop marketing tools with the latest technology.
- Work with governments and other key stakeholders at promoting construction trades
- Lobby government to establish more training programs. Re-purpose the EI funds to include apprentice retention
- Lobby government to promote and facilitate the entry of immigrant workers
- Collect and disseminate data on succession planning
- Provide employers with HR Tools to identify and retain employees
- Develop mentoring programs that could also address such issues as ethics, values, corporate cultures and performance incentives.
- Develop scholarship and bursary programs

### ***Proposed Activities:***

A top priority for the construction industry in Canada must continue to be labour supply, training and retention.

- Continue to share best practices in career promotion
- Engage industry leaders to maximize influence
- Expand the Gold Seal Program

### **CCA specific activities to date:**

A new website promoting careers in civil construction is being developed. CCA sponsored a national conference organized by the Aboriginal Human Resource Council to reach out to the Aboriginal Community which represents a tremendous resource in addressing our labour shortages. CCA continues to support the Employers' Coalition for Advanced Skills, chaired by CCA Immediate Past Chair Paul Charette.

## **5. Private-Public Partnership Projects – P3 Projects**

Three specific areas of concern were discussed within this theme: Impact on Smaller Firms and Local Markets, Best Practices, Suitability of P3 Projects in Canadian Market.

### **Impact on local markets**

It was noted that there is very limited opportunities for SMEs to get involved in P3 projects. Only a very limited number of contractors can become part of the consortia

that are needed to bid these projects. The involvement of international firms may have detrimental impact on the industry.

### Best practices

Regarding best practices, concern was expressed over the amount of risk that is transferred to contractors. The quality of the tender documents is a real concern given the complexity of these projects.

### Suitability

A consensus ought to be reached on the suitability of P3 projects in the Canadian context. What should be the criteria: size, complexity, financial? Is bundling acceptable?

The implications for our associations were characterized as follows:

- Develop a best practices guide
- Develop a seminar on this very topic to be offered at the local level
- Keep the industry abreast of the developments regarding this procurement process: trends, success, pitfalls, etc.
- Educate government tendering authorities, who have no experience with P3 projects, of the issues that need to be considered with this procurement method.
- Assess the impact that this approach may have on the Associations as they will be left out of the picture in terms of the tendering process.

### ***Proposed Activities:***

Canadian construction firms must have the ability and capacity to participate successfully on P3 projects within Canada.

- Educate stakeholders with respect to P3s. Risk transfer is a major issue.
- Explain and promote the involvement of the local construction community in P3 projects for the many benefits that this entails.
- Pay special attention to SMEs as they form the bulk of the associations' membership.

### **CCA specific activities to date:**

- CCA is completing its P3 Guide.
- CCA is liaising with the Federal Government on this topic.

## **6. INCREASED COMPETITION FROM LARGE AND/OR GLOBAL COMPANIES**

It was noted that this trend will have an effect on the smaller firms not being able to compete on some of the projects being targeted by these firms: for lack of expertise, financial capacity and leading-edge technologies and practices. Also, the larger companies are better equipped to assess and deal with risk transfer and this may create a negative trend in the industry. Concern was also expressed over the contract terms being imposed by the international companies who do not necessarily understand the Canadian culture and practices.

The role of the associations in these specific areas was characterized as follows:

- Lobby owners for the use of standard documents.
- Promote association membership.
- Build relationships with international firms.
- Educate and familiarize international firms on industry practices.

### ***Proposed Activities:***

- Find ways to support Canadian firms so that they have the ability to compete and work successfully with international firms operating within Canada.
- Promote Canadian-approved industry practices through the adoption of CCA-CCDC documents to alleviate the potential imposition of foreign practices by international firms.
- Facilitate networks and gather intelligence.

### **CCA specific activities to date:**

CCA is developing the aforementioned P3 guide that seeks to help SMEs understand how they can participate in such projects.