

Digitalisation of Construction Planning in Poland

Stakeholders consultation 19 March 2020 - post meeting Questions and Answers

The questions below have been recorded in an online form shared with the meeting participants during the webinar (refer item 2.1.6 of the meeting notes dated 23 March).

Questions for International Experts

QUESTION 1

Once there was a statement from the market that for small tasks it is not profitable to implement BIM, and the implementation of large tasks on the contracting authority will not dare (without knowledge of small tasks and piloting) how was your place did you immediately enter into big tasks?

Arto Kiviniemi (UK)

This is an excellent question which comes up basically every time when people are discussing about adoption of BIM requirements in a new area. Although large projects have more resources to try something new, also the risks and costs of failures are much higher. In the UK the working group proposed that BIM would be required on projects with total budget over GBP 50 million, but the proposal was dismissed by Paul Morrell as "unambitious". He said the only exceptions would be when using BIM made the project more expensive. He said: "Within five years, all government procurement will be within 3D collaborative BIM, with specific exceptions where the cost might exceed the benefit, although I have to say I'm struggling to think of obvious examples of that." (https://www.building.co.uk/news/all-government-projects-to-use-bim-within-fiveyears/5018349.article). I fully agree with Paul Morrell and would highly recommend that the companies would learn how to use BIM in smaller projects (both in the piloting phase, but also in the first normal projects) before starting to use it in huge projects. Using BIM requires a learning process and usually it takes a couple of projects before companies are starting to get financial benefits from the use of BIM. Therefore, it is better to start learning in smaller projects where the risks are also smaller. In Finland the first pilot project in 2001-2002 was quite small, only a new main auditorium for Helsinki University of Technology (HUT 600), and its report can still be found at CIFE website (Stanford University, https://cife.stanford.edu/product-model-4d-cad-final-report). Although BIM technology has naturally advanced hugely from 2002, the CIFE report is still relevant in many ways. In Finland Senate Properties has been requiring BIM since 2007 in all projects with budget over EUR 1 million including renovations, and sometimes even in smaller projects.

David Delgado Vendrell (ES)

"BIM implementation applies to any activity within the AECO sector. It is not true that BIM applies just for the big scale. There is a misleading on that matter, especially in non-mature BIM markets. We should forget about setting BIM as a goal. Instead, we should use it as the main mean to transform the building sector into the new digital paradigm. Digital transformation won't be achieved in the construction sector unless we put the people and business processes as the main priority to be faced by a BIM implementation. And this circumstance is not related to scales, but it applies to any organization size, therefore any kind of task.

A good start point would be to stop talking about collaboration just as a nice word when we all know that silos are still there in our sector. openBIM processes and standardization culture become the keystone for that disruptive change, whether we advocate it from the governments or from the bottom of our sector: top-down + bottom-up. You herein Poland have both features to start driving towards that path."

Petr Matyas (CZ)

BIM can be profitable for all task. Does not matter if big or small. Question is different: For what do I need data in BIM model? For quality of project, construction, FM? Also use of CDE is helpful in small tasks. Of course, in big task is much more need it.

For everyone is important to gain experiences an to learn how to produce BIM models and how to work with them. For this reason, is better to start with a smaller project and also to focus just on few tasks – like coordination of project, connection to bill of quantities, schedule … When market and investors are more experienced, they can ask more. In Chechia we have a developers and public investors who started with BIM and now there are disappointed. They demanded BIM in "full scale" and result was, they had more expensive project (regarding to BIM) and just little profit from BIM. Everyone needs learn how to get profits from BIM.

In Chechia we discuss limits for BIM. From which size of the projects will be obligatory to use BIM. As first we had 3,8 mio € (which is difference between small and large project in procurement law). Now we think we will do it according of type and size of the buildings/projects. For example, office buildings from 1000m2; I. and II. class roads etc. Sometimes even in small project you can have big profit from data, because you will use them in another systems.

Questions for Polish Experts

QUESTION 2 Czy przewidywana jest certyfikacja BIMowców? / Do you envisage certifications for the BIM specialists?

Robert Szczepaniak (PL)

Tak samo, jak dla CAD nie było żadnych oficjalnych certyfikacji, tak samo nie są przewidywane urzędowe certyfikacje BIM. Rynek powinien tak się zorganizować, aby wyłonić i przysposobić najlepszych specjalistów w drodze selekcji na bazie zdobytego doświadczenia z procesów zintegrowanych w metodyce BIM. Teoretyczne certyfikacje nie zapewnią wymaganego standardu poziomu wyszkolenia fachowców BIM.

Just as there were no official certifications for CAD, no BIM official certifications are anticipated. The market should organize itself to select and adopt the best specialists through selection based on experience gained from integrated processes in the BIM methodology. Theoretical certifications will not provide the required standard of training level for BIM professionals.

QUESTION 3

Czy jest tzw. "roadmap" dla wdożenia BIMu u Nas? / Does Poland have a BIM implementation roadmap?

Robert Szczepaniak (PL)

Do tej pory, jak wynika także z prezentacji z dnia 2020-03-19, nie ma dokumentu ukierunkowującego rozwój BIM w Polsce. Stąd też trwające prace nad taką strategią w niniejszym projekcie, wspieranym finansowo i merytorycznie przez Unię Europejską dla Ministerstwa Rozwoju. Sprawa jest zatem priorytetowa na najwyższym szczeblu zarządzania. To date, as is also apparent from the presentation of 2020-03-19, there is no document directing the development of BIM in Poland. Hence the ongoing work on such a strategy in this project, supported financially and technically by the European Union for the Ministry of Development. The matter is therefore a priority at the highest management level.

QUESTION 4

What's your perspective on joining Project Management and BIM foundations within one standard? / Jakie jest Państwa zdanie na temat połączenia podstaw zarządzania projektami i BIM w ramach jednego standardu?

Robert Szczepaniak (PL)

This Road Map is aimed at integrating all existing and appearing standardising documents into one coherent future strategy for the Polish construction industry. It will consider all possible strategic aspects. All past, no more relevant aspects will be dropped. New, even vague trends will be considered.

Niniejsza mapa drogowa ma na celu zintegrowanie wszystkich istniejących i pojawiających się dokumentów standaryzujących w jeden spójny plan przyszłej strategii dla polskiego budownictwa. Rozważymy wszystkie możliwe aspekty strategiczne. Przeszłe, nieaktualne czynniki zostaną porzucone. Rozważone zostaną nowe, nawet niejasne trendy.