PROJECT MANAGEMENT STANDARDIZATION

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Abstract: High demand factor of project environment and insufficient project efficiency have resulted in a need for creating project management standards. The need of today and tomorrow is to ensure education and certification of professional project managers. Standards dealing with project management and projects are promoted by IPMA and PMI companies (with the seats in Switzerland and the USA respectively). The IPMA Company standard is labelled as the ICB, version 3.0, and the PMI Company standard is labelled as the PMBoK. Both certificates of project managers are equal.

Key words: project management, project control, project manager, certification, standard, IPMA, PMI.

1. INTRODUCTION

The present times are very dynamic. Managers in these dynamic times apply several approaches to problem solving, i.e. managerial decision, work task, team solution and a project. According to a task given it is suitable to use some of the above mentioned approaches, which differ in the range of technical-organizational activities. From this point of view the managerial decision is the easiest approach while the project is the most difficult one.

This is probably one of the reasons why problems are not often solved in projects (although they are called projects) even in such cases in which it would be beneficial. Managers often become frightened of the difficulty applying apparent of project management principles, in some cases they even do not know or understand them. They do not realize that simple approaches to the solution of project-type problems contain many risks and it eventually leads to ineffectiveness, worthless work, the missing of deadlines, increased financial expenses, and other negative effects. In case a project-type proceeding is successfully completed by using the approaches of "lower level", it does not necessarily mean, and that it has been carried out correctly.

2. PROJECT CHARACTERISTICS

We can experience projects in any area of human activities, including military area. For this reason projects can be divided into investment and non-investment, or into so called hard and soft projects. ¹

Project can be defined as a unique process of coordinated activities with defined dates of beginning and end, carried out to reach a goal, complying with specific limitations in expenses and sources. Its product is what is defined in the project plan and is to be handed over to a customer.

As it has been said, without application of project management principles (project management defines a general way approaching the project) it difficult to realize the project successfully subset of project control is managing the project, which defines activities, approaches and methods (softskills a hardskills) with help of which the project can be realized successfully.²

¹ There are incorrect opinions, that only investment activities (especially in building trade) can be called projects.

² Terms of project management and project control are very often interchanged, which arises from unawareness of the content of these terms.

3. PROJECT MANAGEMENT STANDARDIZATION

When talking about project management standardization, we must realize that, unlike purely technical area, there are several fundamental problems. It is relatively abstract activity and many parameters are difficult to be measured (e.g. the project team members motivation degree). Projects vary greatly as to their content and size. Moreover, uniqueness and unrepeatability must be taken into consideration as two main project features.

That is why there are attempts standardize processes abstract to dynamically changeable over system. Standardization is based on standards processed by organizations for standardization.

In the Czech Republic there have been introduced the ISO standards (International Standards Organisation – http://www.iso.org/ – project management standardization within the standardization of quality systems) and IEC (International Electrotechnical Commission – http://www.iec.ch/ – risk management standardization).

Three standards for project management have been introduced. Two basic ISO standards deal with project management. One of them is the CSN EN ISO 10 006 – Management of Quality (includes the Quality Directive in Project Management). The other standards is the ČSN EN ISO 10 007 – Systems of Quality Management (Directive of Configuration Management which also includes control over changes in a project). The last standard is the CSN IEC 62198 Risk Management of Project (User's Directives).

There is also an effort of profession organizations to create a file of "best of practice" recommendations aimed at standardizing the project management.

oldest The biggest and profession organizations is the IPMA (International Project Management Association http://www.ipma.ch/ with the certification authority in Austria). The IMPA Company has been dealing with project management for over 40 years. It associates over 40 national organizations dealing with project management in Europe, Asia, Africa and America (It is the SPŘ – Company for Project Management – http://www.ipma.cz in the Czech Republic).³

The company develops recommended procedures and determines abilities needed for professional control of all types of projects with respect to specific cultural conventions. abilities are specified in The basic competences (so called ICB IPMA Competence Baseline). It organizes training, conferences and further education as to project management in general. The organizations process the basic ICB in their NICB (National Competence Baseline), which include specific, called national so competences. It is processed as the PM CzBoK (Project Management Czech Body Knowledge) in the Czech Republic.

What abilities does a project manager need to project control? The IPMA Company has set three basic areas of abilities (ICB version 3.0):

- 1. *contextual* (project orientation, objective, portfolio; implementation of plans and portfolio; permanent organisation; business; system, product and technology; personnel management; health, safety, security and environment; finance and legality),
- 2. **behavioural** (leadership, liability and motivation; self-control; self-confidence; relaxation; openness; creativity; outcome orientation; efficiency; consultation; negotiation; conflicts and crisis; reliability, appreciation values, etiquette),
- 3. *technical* (successful project management; interested parties; project requirements and objectives; risk and opportunity; quality; project organisation; teamwork, problem resolution; project structure; scope, area and capability of fulfilment; time and project phases; resources: costs and finance: delivery contract: changes of management and administration; information documentation: communication: initialization: termination).

Certification of project managers is probably the most distinct area of responsibility

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³ Authors are members of SPŘ.

of the organisation, which is carried out through sophisticated certification programmes with several levels of certification.

The project manager abilities mentioned above are tested during the certification proceeding. IPMA Company carries out the project manager certification in the following four levels:

- 1. Project Management Associate level D (primarily aimed at students),
- 2. Project Manager level C,
- 3. Senior Project Manager level B,
- 4. Projects Director level A.

Certificates are acknowledged in all countries all over the world. It is authorized to carry out D-B levels certification in the Czech Republic.

Similar institution is PMI (Project Management Institute – http://www.pmi.org/), whose primary area of interest is in the United States of America. Due to the investments and activities of American companies the PMI has become widespread all over the world.

Both PMI and IPMA organisations develop procedures and determine abilities which are necessary for project control (PMBoK). The PMI certification program is a little bit different but the objective is the same – to provide project managers with certificate referring to the certain level of acquired knowledge, skills and practice. It is used by employers very often.⁴

Both companies acknowledge certifications of each other. Both certifications are also acknowledged by companies all over the world.

4. PROJECT MANAGEMENT AT THE UNIVERSITY OF DEFENCE

The Project Management Company which

⁴ ISO and IEC Standards are written generally despite their relative comprehensiveness. The IPMA and PMI recommendations are more specific in many areas. ISO and IEC standards are not in contradiction with IPMA and PMI. They support each other. ISO standards more accentuate integration of project management into the quality management of organization. (according to 9000 standards).

carries out the certification of project managers according to the IPMA standards has been operating in the Czech Republic since the beginning of 90s.

Therefore the certification according to these standards is more accessible than according to the PMI standards. It allows carrying out certification from a student to top management.

The University of Defence carries out the project management training in accordance with both the ICB standardization and the PM CzBoK National Standard. The National Standard set up by the SPR is elaborated with regard to the Czech Republic Environment and is highly suitable for our specifications.

The first step was the implementation of standards into project management training. The next necessary prerequisite is the certification of the teachers who teach project management. The essential prerequisite is the certification of at least one teacher for B level. This teacher will guarantee the curriculum of subject in compliance with the ICB and MP CzBoK Standards. Other teachers should be certified for C level. As the first teacher has completed level B certification process, the University of Defence has got an expert who is able to guarantee the training in accordance with the IPMA Standard. It enables to train the students for level D certification.

The application of project management to the ACR environment appears to be the most complicated step (especially in the areas of specific military activities – projects). It is necessary to develop the implementation of project management (project approach) also into other special subjects, including those special subjects in which the university students are trained to fulfil their tasks while working in units e.g. during tactical training, command and staff duty.

By fulfilling individual steps within the implementation of project management standardization there are created prerequisites allowing the students to proceed to level D certification. The students must master the subjects necessary for particular competences in accordance with the ICB, acquire knowledge defined in the PM CzBoK

and master the subject called "Project Management".

5. CONCLUSION

The decision to enrol particular standardization is not essential. However, it is essential to apply principles in the area of project management.

The acquirement of international certificate can increase the possibilities of our students to assert themselves in both military and civil careers.

The increasing of the quality of education corresponds to current trends and also makes the University of Defence more attractive for prospective students.

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