

QUALITY MANAGEMENT AS INTEGRATED PART AND STRATEGIC INSTRUMENT FOR BRANDING AND SUSTAINABLE DEVELOPMENT IN TECHNICAL HIGHER EDUCATION

Gheorghe Nagîț, Vasile Merticaru jr., Adrian Iosub

Technical University "Gh. Asachi" of Iasi, Romania email: nagit@tcm.tuiasi.ro

ABSTRACT

During the last years, Romanian technical higher education has undergone unprecedented transformations, forced by the complex present conditions of European integration. Globalisation, programme and qualification mixes, funding, are only a few of the aspects and problems to deal with. For a sustainable development in a strongly competing academic environment, technical higher education institutions have to simultaneously market and brand themselves. Branding becomes an imperative need for Romanian technical higher education institutions as they are not any longer operating in a protected, regulated market with a steady income. The present paper comes to offer a model of how quality management can be approached as integrated part and strategic instrument for branding a technical higher education institution, in the sense of targeting a sustainable development. The proposed model and strategy are based on the vision upon the quality management of the educational process as integrated part of what can be named experience economy, considering that the quality of internal practices have a deep impact on an institution's overall reputation and image, through the externalized results, respectively on the external perception and relevance. So, the internal branding is outstood as main objective and strategy in the integrated approach that could ultimately lead to successful external branding of a technical higher education institution. Some obtained quantified results for a specific technical higher education institution are also presented and analyzed in the paper. related to the above mentioned aspects.

KEYWORDS: quality management, branding, technical higher education

1. PROBLEM STATEMENT

1.1. Present realities in Romanian technical higher education

During the last years, Romanian technical higher education has undergone unprecedented transformations, forced by the complex present conditions of European integration. Globalisation, programme and qualification mixes, funding, are only a few of the aspects and problems to deal with.

Within these global economical and social conditions, the main goals to be targeted are a better harmonization of the Romanian technical higher education with the demands of the labour market and the European recognition of the delivered qualifications.

A very important action in this sense brings Romanian ITHEs - Institutions of Technical Higher Education - together with empowered governmental agencies, professional associations and industrials or other companies as employers, to participate actively in the process of elaboration, until 2010, of the National Qualification Frame for Higher Education, [3], for respecting the stipulations and terms of the Work Programme of BFUG – Bologna Follow-Up Group – in order to fulfil the imperative condition to align to the Recommendation of the European Parliament and of the Council of the European Union, [12], concerning the establishment of the European Qualifications Frame in the EHEA - European Higher Education Area – as part of lifelong learning.

Final and main goal of this approach is to improve the global market employability of Romanian ITHEs graduates.

1.2. The need for quality management and branding in Romanian ITHEs

For a sustainable development in a strongly competing academic environment, Romanian ITHEs must simultaneously market and brand themselves. Branding becomes more and more an imperative need for Romanian ITHEs, as they are not any longer operating in a protected, regulated market with a steady income.

On the other hand, for accomplishing a sustainable development for the Romanian ITHEs, a successful implementation of quality management, both for educational process and for institutional management, is absolutely necessary, in order to become more attractive by offering for Romanian and for foreign students the opportunity to complete internationally-compatible degrees and study fields and also to be able to create new opportunities for personal education paths and corporate human resources development.

2. BRIEF OVERVIEW ON SOME SIMILAR SITUATIONS AT INTERNATIONAL LEVEL

Problems like those presented above represent an actual concerning for a lot of other countries and for a lot of ITHE all over the world.

In the European Union, the aspect is treated as communitarian policy, an example in this sense being represented by the approach presented above, [12].

Within the European educational environment, the German approach can be presented as an adequate referential example, where the adapting of the higher education to the complex new conditions is coordinated by a governmental structure, under the name ASIIN - Accreditation Agency for Degree Programmes in Engineering, [13]. ASIIN mainly targets to make German higher education more flexible, to offer efficient and prompt processing of educational requests coupled with competent and client-oriented support, in order to adapt degree programmes more quickly and more flexibly to the requirements of the market. This is possible for ASIIN by having a very well-established and highly comprehensive position in science and education as well as in business and industry, which facilitates a close and real cooperation between the demand and supply sides of the educational services sector.

3. RESEARCH APPROACH

3.1. Research basic idea

The research basic idea of the paper is to propose a model of how quality management can be approached as integrated part and strategic instrument for branding a Romanian ITHE, in the sense of targeting a sustainable development.

The research idea derived from a vision, proposed by a South-African specialist, [11], upon the quality management of the educational process as integrated part of what can be named experience economy, considering that the quality of internal practices have a deep impact on an institution's overall reputation and image, through the externalized results, respectively on the external perception and relevance.

3.2. ITHEs within the conceptual frame of human development and sustainable development

For developing the intended research approach, the ITHEs must be located within the frame of general concepts as sustainable development and human development.

As a most simple definition, the concept of "sustainability" literally means the ability to maintain oneself over time. Just since 1987, The World Commission on Environment and Development proposed a definition of "Sustainable Development" as "meeting the needs of the present without compromising the ability of future generations to meet their own needs", [7].

In the conditions of the above presented definitions, a sustainable future development of any society must be established basing on at least three pillars, as it is shown in fig. 1, respectively: ecological health, economic vitality, and social equity, [4]. The Herman Daly's conditions located in the basement of the sustainable development for a society, from Fig. 1, refers to the relations between the rate of pollution emission and the assimilative capacity of the natural environment, respectively between the rates of use of resources and the rates of resources regeneration or renewal.



Fig.1. Basement of the sustainable development, [4]

The vision upon the sustainable development, presented Fig. 1, can and must be extended by

considering the following four dimensions for the development of a society or a country:

- economic dimension;
- o social dimension;
- technological dimension;
- ecological dimension.

The above mentioned four dimensions must be considered in their interaction and it is an imperative to permanently provide for them the compatibility and the simultaneity of progress.

In relation with the above mentioned concepts and considerations, the concept of human development must be considered, referring to the providing of both material and spiritual basis necessary for satisfying the continuously increasing needs of the human factor.

Any human activity, productive, scientific, institutional, educational etc. must be developed always respecting the human development principles and targeting the simultaneous and compatible progress of the four dimensions of the sustainable development.

3.3. Clearly defined purpose and identity – first step in quality management and branding for ITHEs

A rigorous approach for analyzing, studying, implementing or developing quality management – QM – or branding activities for ITHEs must start with clearly defining the institutional purpose and identity.

In this sense, many specialists agree that a lot of higher education institutions spend a great amount of money for branding or for developing "identity" strategies and also for updating their mission and value statements. Only then they work with marketers and advertisers to fine-tune and communicate the new perspective to their customers and stakeholders, [8].

Beyond the individual purpose and identity of each ITHE, considered as separate, we consider very important the idea that an educational institution must be seen as being part of the basement for human development and particularly for the professional development of human beings, as it is illustrated in the model presented in Fig. 2. Education as process and institution should also be part of the further stages in the professional development of human beings, considering here the lifelong learning process.

This idea has derived from considering the main purpose of education being to provide adequate competences to the graduates for assuring later professional independence and performance.

So, the purpose and identity of any ITHE must be defined and clarified in relation to the ability to offer prompt and efficient processing of educational requests coupled with competent and client-oriented support, in order to adapt degree programmes more quickly and more flexibly to the requirements of the employers and also of all the other categories of customers existing on the market.

As the concept of entrepreneurial university is today more and more actual, an entrepreneurial point of view, [5], considers that an ITHE must finally very clearly define what educational services sells to the students, seen as customers and what kind of products, meaning graduates, delivers to the employers, seen as another category of customers.



Fig.2. Model for the professional development

3.4. Clearly defined relationships system –second step in QM and branding for ITHEs

Ideas as the immediately above presented ones deserved a lot to be disseminated, sustained and promoted within all the factors involved in the educational process, being able to clarify and to evidence the importance that must be accorded to education activities and to education institutions, by all the social, economical and political factors related to them.

As long as it is generally accepted that this millennium has definitely started under the sign of the relationship age, [2, 9], to clearly define their relationships system seems to become another important step in QM and branding for the ITHEs. In these conditions, we must agree that the system of relationships of an ITHE is much more complex than a simple linear chain starting from the high schools, which deliver candidates for being students and ending with the employers as final users of the graduates delivered by the ITHE.

Actually, the system of relationships of an ITHE must be seen under an extended vision, which considers multiple roles for the involved factors, [5]. Accordingly to such an extended vision, high schools, which basically are seen only as supplier of raw human material for the educational process in the ITHEs, must also be considered as valuable customer for the post-graduating educational services designated for teachers and they also can be treated as very important stakeholders. In a similar manner, the employers of graduates from ITHEs are basically seen as direct beneficiaries of the final product of the educational process, but they also must be considered as stakeholders and as suppliers and also as customers for ITHEs, [5].

3.5. Basic relationship between branding and QM for ITHEs

For surviving in the overall competing environment, the key issue for any organization and particularly for any ITHE, is represented by its marketplace value. For achieving a better marketplace value, ITHEs have to perform branding and marketing for them, but there must not be forgotten that the marketplace value distinguishes one's performance from all others. In these conditions, the branding process must be seen under both its two basic aspects, identified as it is presented in the model from Fig. 3, where the internal aspects are related directly to the internal practices and the external aspects are related to the visual identity of the ITHE, as it is defined and promoted by external communication and by marketing activities.



Fig.3. Model for the branding process for ITHE

External branding not only cannot be viewed in isolation from the internal branding, but, in the present situation of acute financial crisis, an aggressive and extended advertising does not seem any longer to be a viable solution.

A solution for these conditions is to put the accent on an effective internal branding and such an approach can be based on demand management, [5], developed following the model presented in Fig. 4.



Fig. 4. Branding by demand management, [5]

From the point of view of considering internal branding versus external branding, QM becomes a strategic tool for an effective process management in the ITHEs and the main idea for success in this direction is to sell results not images and to switch from narrow interests towards judiciousness and pragmatism.

3.6. Institutional structures as tools for QM and branding for ITHEs

There is generally accepted that no effective branding, for any organization, can take place without a total commitment by executive management, of course firstly to recognise institutional processes that may effect branding and not at last to provide an effective quality management for their internal processes, such as admission of students, examination and the related results, students accommodation, different kinds of events, sport and student life etc.

From the authors' experience it seems that all these kind of internal processes and activities in Romanian ITHEs are usually managed individually by different decision factors and as consequence, their finality and message are just as different from one another as the activities.

For all the Romanian ITHEs there is nowadays an imperative condition to have established a functional system for quality assurance, in all their areas of activity, both by establishing adequate structures with attributions in this direction and by establishing procedures and regulations at institutional level.

3.7. QM and branding principles for ITHEs' relationships

Specialists indicate that the value of every organization falls into one of three major categories of value discipline, [6]: customer intimacy, when the companies try to understand their individual customer's needed and will try to accommodate their customers; product leadership; operational excellence.

So each ITHE has to effectively manage its relationships and partnerships with customers and stakeholders, based on their specific expectations and on best practices recommended by specialists, [10].

In this sense, an ITHE must clearly identify and know its customers and stakeholders, understand how to interact with its customers and stakeholders and how would like to interact with its customers and stakeholders. More than that, it must be able to categorize customers and stakeholders, to identify key stakeholders, to document their specific expectations, to identify gaps and to develop corrective actions.

The final target must be to satisfy and enchant its customers and stakeholders, because its customers and stakeholders can and must become its best sellers.

3.8. The role of the students in QM and branding for Romanian ITHEs

ITHEs as organizations have to be agile, for surviving in the relationship age. There is known that speed of execution is identified as the fourth cornerstone, together with integration, innovation and flexibility, in the square of the new success factors for the relationship age, [1]. As one of the best practices in this sense, the development of a clearer understanding of customer expectations, needs and requirements is nominated by specialists, [9].

In these conditions, the role of the students in quality management – QM – and branding for ITHEs becomes essential.

The relation between students and ITHE and respectively the teaching staff must of partnership, each of the parts assuming the responsibility of accomplishing the learning results. The learning results must be explained and discussed with the students from the perspective of their relevance for their professional development.

The educational process must be established based on knowing very well the inputs, respectively the performance level of the incoming students, as it is shown in Fig. 5, being necessary to develop adequate strategies also for the students under the presumed level and for the students over the targeted level. For example, in order to increase the performance level for the students initially situated under the expected level, ITHE can offer a number of optional courses (Elementary Mathematics, etc.). For those students situated above the targeted level, there may be developed additional activities: membership in students' league, competitions and courses offered by international or national students' organizations, stages of practice and participation in Erasmus Programme.



Fig. 5. Model for establishing the range of educational activities

Students should be informed about their role in branding the ITHE and about the benefits in their own evolution. The future engineers in production, research, in technical education will be good ambassadors of ITHE.

Also, the students involved in research activities on such issues as QM and branding for ITHEs can become good specialists in reforming and developing Higher Technical Education.

3.9. Results of the study for a Romanian ITHE

The authors of this paper have lately been concerned about the above presented aspects and studied the impact of such approaches and strategies upon some of the qualitative and quantitative results within the internal and external processes of the ITHE they are affiliated to.

Examples of statistical results of some investigations developed in this sense at the Faculty of Machine Manufacturing and Industrial Management from the Technical University "Gh. Asachi" of Iasi, are further on presented respectively in Fig. 6, Fig. 7 and Fig. 8, in relation with the results at the admission process in the last four years.



Fig. 6. Distribution of the number of candidates function of comingfrom counties



Fig. 7. Distribution of the percentages of candidates function of comingfrom counties



Fig. 8. Distribution of admitted students function of admission scoring, in 2008

5. CONCLUSIONS

The present paper comes to offer a model of how quality management can be approached as integrated part and strategic instrument for branding a technical higher education institution, in the sense of targeting a sustainable development. The proposed model and strategy are based on the vision upon the quality management of the educational process as integrated part of what can be named experience economy, considering that the quality of internal practices have a deep impact on an institution's overall reputation and image, through the externalized results, respectively on the external perception and relevance. So, the internal branding is outstood as main objective and strategy in the integrated approach that could ultimately lead to successful external branding of a technical higher education institution. Some obtained quantified results for a specific technical higher education institution are also presented and analyzed in the paper, related to the above mentioned aspects.

REFERENCES

[1] Ashkenas, R., Ulrich, D., Todd, J., Kerr, S., A New World Order: Rising to the Challenge of New Success Factors, in: The Boundaryless Organization. Breaking the Chains of Organizational Structure, Jossey-Bass Publishers, San Francisco, CA, 1995, pp.1-30;

[2] Galbreath, J., Success in the Relationship Age: Building Quality relationship assets for market value creation, The TQM Magazine, Vol.14, No. 1, 2002, pp.8-24;

[3] Ivan, M., Proiectarea și implementarea Metodologiei cadrului Național al Calificărilor din Învățământul Superior. Seminar Phare TVET RO 2006/018 – 147.04.01.02.03.01, Instruire și consultanță pentru dezvoltarea continuă a sectorului ÎPT – componenta Învățământ Superior, 29th-31st January 2009, Sinaia, Romania;

[4] Merticaru, V.jr., Musca, G., Axinte, E., *PLM in Relation to SCM and CRM, for Integrating Manufacturing with Sustainable Industrial Design*, Proceedings of ICOVACS 2008: International Conference On Value Chain Sustainability: Integrating Design, Logistics and Branding for Sustainable Value Creation, Izmir, Turkey, November 12-14, 2008, Izmir University of Economics Publication No: IEU-026, ISBN 978-975-8789-25-2, pp.109-118;

[5] Merticaru, V.jr., Demirbag-Kaplan, M., Some CRM principles and strategies applied in branding an institution of engineering education, in Proceedings of The 13th International Conference ModTech 2009 (Modern Technologies, Quality and Innovation - New face of TMCR), 21st-23rd May 2009, Iasi, Romania, ISSN 2066-3919, pp. 395-398;

[6] Roşu, S.-M., Guran, M., Knowledge Capitalization & Transfer in the Enterprise Business Inteligence, *Academic Journal of Manufacturing Engineering*, Vol.6, issue 2/2008, Ed. Politehnica, Timisoara, p.143-150, ISSN 1583-7904;

[7] Strong, M., Introduction to Agenda 21, U.N. Conference on Environment & Development, June 3-14, 1992, United Nations, N.Y.; Available from: http://www.freedom21santacruz.net/A21SC/ introduction/intro.html. Accessed: 2008-02-02.

[8] Sullivan, J., *Why branding is important in HR.* Available from: http://www.erexhange.com/articles/db.asp, Accessed: 04/08/2004.

[9] Torkia, E., *Success in the Relationship Age*, Available from: http://www.technologypartnerz.com/downloads/TPPS-

RelationshipAge.pdf, Accessed: 02/02/2009.

[10] Torkia, E., Torkia, S., *Stakeholder Management in the Relationship Age*, Available from: http://www.technologypartnerz. com/downloads/TPPS-Stakeholders.pdf, Accessed: 02/02/2009.

[11] Van Gensen, G.-A., *A Design for the Branding of Higher Education: A South African Perspective*, Proceedings of ICOVACS 2008: International Conference On Value Chain Sustainability: Integrating Design, Logistics and Branding for Sustainable Value Creation, Izmir, Turkey, November 12-14, 2008, Izmir University of Economics Publication No: IEU-026, ISBN 978-975-8789-25-2, pp.33-39;

[12] ***, Recomandarea Parlamentului European și a Consiliului Europei din 23 aprilie 2008, privind stabilirea Cadrului european al calificărilor pentru învățarea de-a lungul vieții, Jurnalul Oficial al Uniunii Europene, C111, 06.05.2008, pp.1-7;

[13] ***, *ASIIN – Quality in Higher Education*, Available from: http://www.asiin.de/ english/newdesign/index_ex5.html, Accessed: 20/02/2009.