

The World's Largest Open Access Agricultural & Applied Economics Digital Library

This document is discoverable and free to researchers across the globe due to the work of AgEcon Search.

Help ensure our sustainability.

Give to AgEcon Search

AgEcon Search
http://ageconsearch.umn.edu
aesearch@umn.edu

Papers downloaded from **AgEcon Search** may be used for non-commercial purposes and personal study only. No other use, including posting to another Internet site, is permitted without permission from the copyright owner (not AgEcon Search), or as allowed under the provisions of Fair Use, U.S. Copyright Act, Title 17 U.S.C.

WAYS AND DEADLOCKS IN THE STRATEGIC DEVELOPMENT OF THE HUNGARIAN FOOD CHAIN

Dr. LAKNER, ZOLTÁN – Dr. SARUDI, CSABA

SUMMARY

Globalisation and European integration constitute new possibilities and challenges for the Hungarian agro-food sector. Based on a model developed by the authors, the paper analyses the ways and means of the strategic development of the Hungarian food chain. The application of the cost directing strategy comes up against considerable difficulties. Concentration is a general process in the agro-food sector. The strategy of product differentiation is an indispensable prerequisite of increasing the competitiveness of small and middle-sized food producers. Concentration in domestic trade is a specific problem. The safeguarding of the interests of farmers and companies of the food industry should be increased by a more rigorous application of the Competition Act.

In Hungary, there are a number of motives and factors of the changes of the agro-food sector in general, and of the food chain in particular. The most important factors shaping a new environment for the development of the food chain are:

- increasing competition on the side of operators on the global market (Szakály – Széles, 2001),
- economy of size and scope of production & distribution,
- risk reduction and management strategies applied by the buyers and suppliers,
- changes in the government policy (Bánáti, 1997) and
- regulation of the agro-food sector on EU level.
- strategic positioning and market power/control strategies of individual companies, and
- initiatives and policies in the field of R&D information and technology transfer.

The object of the present paper is to analyse, on the basis of the up-to-date

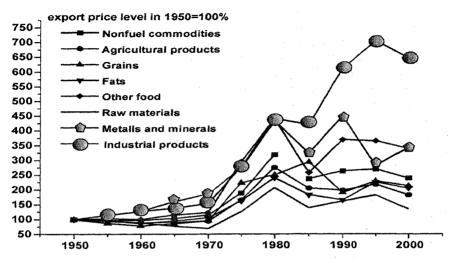
literature of strategic planning, some features and contradictions in the development of the Hungarian food chain, and to evaluate some possible solutions with the purpose of increasing the competitiveness of the Hungarian agro-food sector.

PROBLEMS OF THE COST DI-RECTING STRATEGY

All over the world, and especially in underdeveloped states, a considerable part of the agro-food sector focuses on mass production the products of which are typically produced in large volumes by a great number of producers in an increasing number of geographic localities in the world. Consequently, the margins in mass production are under constant pressure because certain market forces encourage increased production even when prices and margins increase only slightly (Figure 1).

Figure 1.

The changing price level of some product categories on the world market



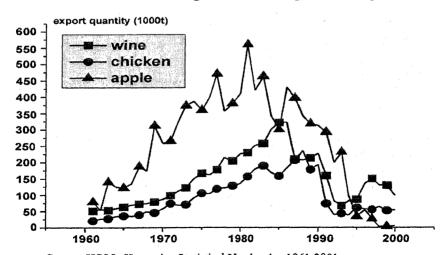
Source: World Bank Statistical yearbook, 2000.

Until the eighties of the previous century, exports of the products of the Hungarian agro-food sector increased dynamically, and subsequently dropped drastically (Budai – Sántha, 2001) (Fig-

ure 2). It is obvious from this fact that on the current world market there is not enough paying demand low-quality Hungarian products produced *en masse* (Hajduné – Bánáti, 2002)

Figure 2.

The rise and fall of Hungarian food and agricultural export



Source: HCSO: Hungarian Statistical Yearbooks, 1961-2001.

In numerous cases the world market did not accept the products of Hungarian agriculture and food industry in the form in which they had been formerly exported in the framework of the previous foreign trade system between the then existing socialist countries, even if they had had rather low prices. E. g., in advanced countries table apples sell well from February till June, whereas Hungarian apples had to be sold in September-October, because in Hungary there was no satisfactory storing capacity. During the last fifteen years the apple production has been subsidised by EUR 5.7-6.2 million per year, which rather irregular subsidy served, however, mainly for the reduction of the negative consequences of the failures in the market, and not for the modernisation of the biologic and technological bases of production.

In the authors' opinion in the future the basic pillar of the development of the Hungarian agro-food sector will consist in the safe production of agricultural and food products at competitive prices. These products will be produced *en masse* mainly,

but not exclusively, by medium-sized and large-scale companies. Of course, there are wide-ranging possibilities of product innovation in the latter, new products being mainly developed and marketed according to international standards. The production of differentiated products will take place mainly, but not exclusively, in small and middle-sized enterprises.

This theory is supported by the structure of Hungarian food production, which can be characterised as dual. On the one hand, most Hungarian food industry companies are relatively small. In 2001, 87.5 per cent of all companies in food industry had less than 11 employees each (Table 1). The other extreme, having 300 or more employees each, included 108 companies. Their number amounted to only 1.2 per cent of these companies but the percentage of their employees to 53 per cent. Although details vary, the general picture is still much the same when their size is measured in terms of return from sales instead of employment.

Table 1.

The size structure of food industry in EU and in Hungary

Number of employees	Percentage of enterprises in EU	Percentage of enterprises in Hungary
<20	92.4	90.8
20-99	6	7
>100	1.7	2.2

Source: Association of Hungarian Food Processing Companies, 2000.

The concentration of the Hungarian food industry enables companies of an economic size to be operated. However, at the same time it generates new contradictions too. Farmers have to bargain with fewer and fewer food processing companies when selling their produce. Consequently the latter will be able to use contracts as a tool of price discrimination on such concentrated markets of agricultural

raw materials with only a few buyers, thereby exploiting the potential market power created by concentration. Concentrated buyers may be able to manipulate thin cash market prices, which frequently form the basis for contract settlements (this was the case in the meat section of the Hungarian stock exchange). In other words, contracts may combine with buyer concentration to allow buyers to misuse

their increased market power (Lehota, 1995).

One of the greatest problems of the cost directing strategy is the low level of agricultural production. The average yield of crops is only half or third of the yield in advanced EU member states.

The strategic development of the largescale food industry companies is determined by their centres. After the EU accession of Hungary and other countries of Eastern Central Europe there will be an increasing competition for the capital and investments of these multinational firms.

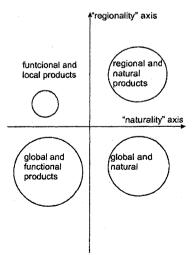
PRODUCT DIFFERENTIATION

One of the most important possibilities of product development in food industry is to increase the share of differentiated products. The transformation of the product structure of the food industry from mass production to differentiated production derives from: the consumers' desire for highly differentiated food products;

their demands for food safety and traceback ability; continuous advance in technology; and the need to minimise the total costs of production, processing, and distribution. Food producing systems will attempt to differentiate themselves and their products by scientific and/or marketing development. The ways of differentiation by means of scientific tools include exclusive technologies in the food processing systems, and superior food safety integrity. Differentiation can be attained not only in terms of the attributes of the product but also in terms of the process of its manufacturing. Agricultural raw materials will be different due to their having been produced in different ways (e. g. free range poultry keeping), as well as to their nutritional value or chemical composition. In the past, Hungarian food industry was focusing mostly on mass production but, as has been mentioned above, the prices of such products have dropped on the world market.

Figure 3.

Some possible ways of product development



The most important ways of product differentiation are shown on Fig. 3. The graph has two axes. The "naturality" axis represents the products of agriculture and food industry, indicating which kind of production and processing is nearer to the natural conditions of the products than that achieved using classical industrial technologies. A good example for this is the increasing importance of deepfrozen products and the development of heat treatment technologies in the canning industry, as well as the increasing importance of aseptic technologies in food industry. In this context the popular topic of bio-production is a specific but not necessarily the most important way of development. In the authors' opinion the importance of bio-production is slightly overemphasised (e. g. on the basis of the number of the PhD or MSc theses concerning the problems of bioproduction), and when this trend will no more be in the evaluation of bio-products will be much more balanced. The importance of integrated production, animal welfare, and minimum processing technologies will increase on the long term.

The worsening health condition of the population emphasises the importance of food consumption as an important means of health conservation and improvement among people suffering from different diet-related or other illnesses. The systematic modification of food products offers new wide-ranging possibilities for product innovation. In this case it is more difficult to emphasise the regional aspects, yet there are some good examples for the realisation of this way of development (e. g. the Sóshartyán natural mineral water rich in mineral elements, especially iodine).

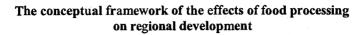
The manufacturing of global and functional products is within the scope of large-scale multinational firms, whereas that of natural products, even non-differentiated ones, offers wide-ranging possibilities for medium-sized companies.

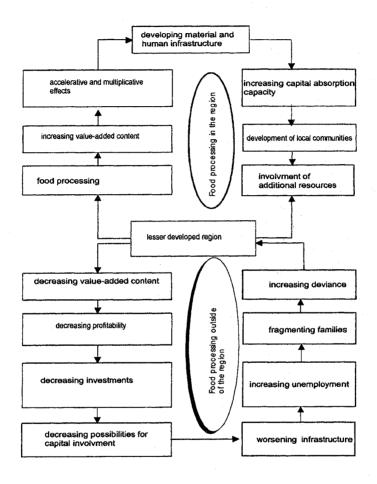
According to general economic experience small and medium-sized farms and food manufacturing plants are more suitable for the production of differentiated products, but in practice this thesis is hardly true for the present Hungarian food production. The most important problems of these small units are the lack of working capital and the backward position of bargaining with the rapidly concentrating multinational food trade organisations.

The selective development of small and medium-sized food manufacturing companies is an especially difficult problem of industrial policy. During the last decade considerable changes have taken place in the judgement of the possible place and role of these companies. In the early nineties there was an overestimation of the possible place of these plants, and some analysts thought they could possibly counterbalance the large scale food processing companies. However, it has turned out that this was a mere illusion. E. g., in the early nineties numerous small meat processing plants were receiving state subsidies for development or investments, but it became obvious that they were either too expensive or did not met the hygienic standards required.

At present it is already obvious that the most important role of small and medium-sized food processing plants is to satisfy local demands or to manufacture specialties. An efficient network of these firms could directly contribute not only to the widening of the product choice, but also to regional development in the form of increasing the value added content of products. A model for the demonstration of the accelerative and multiplicative effects of small and medium-sized food processing companies is shown on Figure 4.

Figure 4.





Source: the authors

A specific way of local specialty creation is to define products by geographic origin and/or production practices, and to seek for the subdivision of markets by means of restricted entry. Relevant programs may provide market information as a kind of public goods producers would not be capable of providing themselves. In Western Europe

these interventions are quite specifically justified as a means of protecting certain categories of producers and products from an unfettered market.

In recent years Hungarian specialties called "Hungaricum" have had an especially intensive publicity. They are specific products of the Hungarian agrofood sector. After an intensive research

work a comprehensive study of the traditional specific products of Hungarian agriculture and food industry was prepared. The collection comprises more than three hundred specific agricultural and food products (excluding wines and dishes). This could be a useful thesaurus of products having specific quality produced using traditional technologies. In the authors' opinion the products included in this collection should be subdivided into three categories:

- products that can be used in the framework of ethnographic research and exhibitions (ca. 70-80 per cent),
- products serving for local consumption and tourism (15-20 per cent),
- products for countrywide production and/or promotion (1-5 per cent).

This method of screening would enable the scarce resources allocated for market formation and promotion to be used in a concentrated and effective way. Only a well-determined product screening is capable of preventing the scattering of these financial resources.

The importance of local products is rapidly increasing throughout Europe, especially in the Mediterranean countries. Governmental and EU support of these products provides a good possibility for the promotion of small and medium-sized (often family-owned) companies. The activity of these companies is closely joined to the processing of local products and the utilisation of traditions. During the last years a consensus was formed concerning the importance of these forms of production but, besides speaking words, only a few hard and fast steps were made towards practical development. In the authors' opinion, the promotion of small and medium-sized companies ought to be based on the following three well-defined pillars:

- the support of the modernisation of food processing facilities with special

- regard to the development of production technology and the compliance with of food hygiene & safety standards.
- the perfection of the channels of distribution. It is not enough to produce high-quality products, product quality being a necessary but not the only prerequisite of success on the market. The concentration of the domestic food trade is a new challenge for the products within the food chain. If the products of small food processing companies do not meet the requirements of food trade companies in respect of quantity and timing of delivery, they will have no chance of success.
- the collective marketing activity of the companies involved should be concentrated on the promotion of products manufactured by small and mediumsized food producers.

Competition has become especially intense in rapidly increasing market segments. When Pharmavit Co., a medium-sized company of the Hungarian food industry, had developed a specific instant product in the nineties, a big American firm responded by buying out the company and glutting the market with imitations of the original products. Finally these original products had only a small market share.

THE INCREASING IMPORTANCE OF THE TRADE IN AGRICULTURAL AND FOOD PRODUCTS

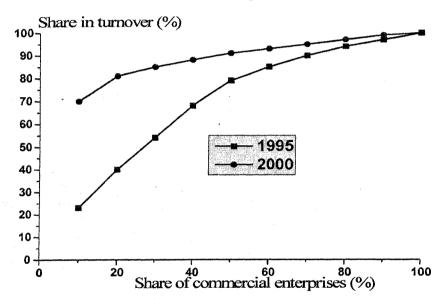
Hungarian food trade is concentrating intensively (Fig. 5). The role of multinational companies and Hungarian retail chains, eight in number, is rapidly increasing. Their buying power is impressive, their share of Hungarian food sales amounting at present to 70 per cent. Deliverers not capable of selling their

goods to these huge buyers must focus their efforts on the remaining much smaller segment of the food trade system. By purchasing greater quantities retailers hope to reduce the purchase prices and thus the per-unit costs of goods. In return, retailers may develop partnerships with preferred suppliers, concentrating their purchases on the latter, who will thus benefit from the more predict-

able level of demand. When demand and supply are more closely coordinated, buyers and sellers can co-operate in stimulating sales and achieving a greater constancy of both quantity and quality. On the other hand, when prices are too low many deliverers will not be capable of counterbalancing them by means of cost reduction, asserting that quantity discounts are not justified in such cases.

Figure 5.

The concentration of Hungarian food trade



Source: Nielsen, 2001

Retailers also expect reduced marketing and selling costs as a result of relationships with preferred suppliers. They ask suppliers and distributors to assist them using such tools as design and provision of category management, effective design of promotion, promotional allowances, and special packaging. In order to achieve an effective function of this type of marketing support retailers should share sales data with suppliers re-

sulting in a better evaluation of promotion, seasonal effects, price responses, and other characteristics of consumer demand.

Although the economic effects of the recent mergers in the field of food products have not yet been disclosed, many producers are afraid that increasing concentration will reduce the intensity of competition. Producers will have to sell their produce to fewer but greater buy-

ers, and for consolidated food retailers the number of buying offices will decrease combined with deliveries of greater quantities.

The best possibilities of increasing efficiency for producers of agricultural products and food is to join their efforts in order to improve their bargaining position (especially in case of small and medium-sized farms growing horticultural crops), and to find alternative ways of product marketing, e. g. on local markets without mediators. Scientific foundation, financial and material resources do in most cases not suffice for directing producers toward the exploitation of new markets and distribution channels. It is one thing to disseminate the latest results in the framework of local workshops among entrepreneurs, and another thing to translate them into practice. E. g., there is a considerable difference between the producers' and retail prices of vegetables. Several horticultural producers were interviewed asking them the question why they do not make use of this possibility and sell their produce directly to consumers instead of traders. The stereotype answer was that they just did not like to trade and bargain with all those people. This was a case of vegetable & fruit growers who had a highly attractive marketing yet did not make use of it.

ACKNOWLEDGEMENT

Research was supported by the OTKA T 037583 and NKFP - 2001 - 4/032 OM 00154/2001 research projects. The authors of the present paper are grateful to the reviewers for their helpful comments.

REFERENCES

(1) Bánáti D. (1997): Az EU élelmiszerszabályozása. [The regulation of food quality in EU.] FM Integrációs füzetek, 13, p. 1-12. - (2) Borszéki, É. (2001): Capital and income transverses in agroeconomy. Szent István Univ. Gödöllő, Vision-2000, SZIE 3-1, Gödöllő, p. 4-25. – (3) Budai-Sántha, A. (2001): Agárpolitika-vidékpolitika. [Agricultural policy – rural policy.] Dialóg campus, Pécs, 459 p. – (4) ÉFOSZ: Egyéni adatszolgáltatás. [Imdividual data supply.] Budapest. - (5) FAO (2002): Agrostat electronic database. Rome. - (6) Hajdu I.-né - Bánáti D. (2002): Élelmiszerjog. [Food legislation.] SZIE. Budapest, 210 p. – (7) Hungarian Central Statistical Office: Statistical yearbooks 1999-2000 Budapest. – (8) Láng I. – Csete L. – Harnos Zs. (1983): A Magyar mezőgazdaság agroökológiai potenciálja az ezredfordulóm. [The agro-ecologic potential of Hungarian agriculture at the turn of the millennium.] Mezőgazdasági Kiadó, Budapest, 266 p. - (9) Lehota J. (1995): Marketing channel relations in the milk sector. 41st EAAE Seminar. Gödöllő, p. 147-151, – (10) Nielsen et al. (2001): The concentration of Hungarian trade. Budapest, 120 p. – (11) Szabó G. (1998): Élelmiszer-gazdaság. [The agro-food sector.] PATE ÁTK Kaposvár, 210 p. - (12) Szakály, Z. - Széles, Gy. (2000): Problems of animal production in Hungary. Soeul National Univ., p. 128-13. - (13) The World Bank 2001. World Development Indicators 2001, Washington D. C. - (14) Udovecz, G. (2001): A Magyar mezőgazdasági export. (In: A Magyar élelmiszergazdaság és fejlesztési lehetőségei.) [The Hungarian agricultural export. (In: The Hungarian agro-food sector and the possibilities of its development.)] Ed.: Papócsi, L. - Takács, L. VE publishing house, p. 98-120.

ADDRESS:

Dr. Lakner Zoltán

egyetemi docens

Budapesti Közgazdaságtudományi és Államigazgatási Egyetem

Élelmiszertudományi Kar

Élelmiszeripari Gazdaságtan Tanszék

1118 Budapest, Villányi út 29-43.

Tel./Fax: 1/209-0961

E-mail: laknerz.@omega.kee.hu

Dr. Sarudi Csaba

egyetemi docens, tanszékvezető, intézetigazgató Kaposvári Egyetem Állattudományi Kar Gazdasági és Pénzügyi Intézet 7400 Kaposvár, Guba S. u. 40.

Tel.: 82/316-705, Fax: 82/316-705

E-mail: szekeres@mail.atk.u-kaposvar.hu

PRINTED IN THE KÁROLY RÓBERT KUTATÓ-OKTATÓ KHT. 3200 GYÖNGYÖS MÁTRAI ÚT 36.

DIRECTOR: BÁRDOSNÉ, KOCSIS ÉVA

UTAK ÉS ZSÁKUTCÁK A MAGYAR ÉLELMISZERLÁNC STRATÉGIAI FEJ-LESZTÉSÉBEN

Dr. LAKNER ZOLTÁN – Dr. SARUDI CSABA

A globalizáció és az európai integráció egyidejűleg jelent új lehetőségeket és kihívásokat a magyar élelmiszergazdaság számára. A magyar termékek világpiaci versenyképességét és árszínvonaluk növelését hatékonyan fokozhatja a differenciáló stratégia alkalmazása. A világ élelmiszergazdaságát a koncentráció fokozódása jellemzi. A kis- és középvállalatok túlélésének legfontosabb lehetősége a kooperáció fejlesztése, és a speciális termékek előállítása. Növekvő problémát jelent a belkereskedelemben végbemenő tőkekoncentráció. Ennek érdekében a jelenleginél jobban kellene védeni az élelmiszeripari vállalatok érdekeit a versenytörvény alkalmazásával.