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FIRM VERSUS MARKET – COASE REVISITED

In November 1937 Ronald Harris Coase published his fundamental article "The Nature of the Firm", throwing the gauntlet to neoclassical economics, which could not be responded properly already 80 years. The task presented by Coase to the economic community is simple to failure. Reminding us, that in the economic system, led by the free price movements in which all resources are allocated by the price mechanism, we find, in the words of a contemporary economist, "islands of conscious power in this ocean of unconscious co-operation like lumps of butter, which coagulating in a pale of butter", the great scholar asked: why do we need that at all? Why, in the coordinating role of the market does appear the inevitable figure of entrepreneur-coordinator, who leads the production? Indicating that the company and the market are alternative ways of organizing, Coase released genie out of the bottle, because the answer he provided, actually launched an endless string of debates, hypotheses, competing explanations - what exactly is the nature of the company. This paper aims to provide a more detailed look at the essence of the dilemma posed by R. Coase, paying tribute to the anniversary of the issue of his genius work.
JEL: D21; D23

1. Introduction

Recently, they turned 80 years from the first publication of Ronald Coase’s "The nature of the firm". Since then, this little article has over 90 different reprints, only in English, in various collections and special editions. According to Google Scholar, by November 2017, there are almost 40 thousand citations, over 1300 – only for the last year. It is obvious, that we have a rare phenomenon of scientific visionary, which affected so important and deep problem that repercussions of the publication do not cease till now. Although, the original solution to the problem of the existence of the firm, launched in the article was not challenged in essence, the debate stemming of it, seems to grow all the time. And it goes in two directions. On the one hand, the article gives an extraordinary boost to scientific research in the direction of the disclosure of firm’s fundamentals, which became the basis of a whole new direction in economic theory – *economics of transaction costs*, and through it to the neo-institutionalism. On the other hand, it stimulates finding of complementary or

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alternative solutions of the stated problem, (Granovetter, 1995). Diversion in responses comes from the fact, that the question raised affects basic methodological problems concerning the nature and functioning of the economic system and goes far beyond the neoclassical paradigm, regardless the author proclaims his devotion to the neoclassical paradigm.

The paper presented seeks to place the concept, and the article, of Ronald Coase in a broader systemic plan, in order to identify more clearly the peculiarities of both the problem and the solution proposed by the author.

2. Importance

There are several main sources of the significance of the article, respectively of the proposed author's concept on the nature of the company. Above all, the paper offers a consistent methodology. That's why we start our analysis there.

The article provides a fundamental view on the economic system. Coase points out that one of the main weaknesses of economic science is the failure to disclose its *assumptions*, to explore the foundations on which it is erected (Coase, 1937, p. 386). Therefore, he stresses that the economy is treated as an automatic system (working itself), a set in which the individual components work in a coordinated manner. Further, he tells us that supply adjusts to demand, without the need for central control and planning. Although, Coase does not address this point exactly to the marginalist tradition, he builds it on the basis of the views of many contemporary authors, at first place on Hayek in *"The Trend of economic thinking"* (Hayek, 1933). Through them he builds a *systematic* perception on the economy in which *the market* is the main organizing and coordinating mechanism, i.e. the price mechanism.[2]

The article, or more precisely, the concept of the firm, launched by Coase, generated interest, giving rise to complementary and competing explanations. On the one hand, this is the *Transaction cost economics* (TCE), formed by O. Williamson not just as a new field, but claiming to revive the institutional paradigm of Veblen in the form of neo-institutionalism. On its turn, the TCE became a basis for shaping new approaches in other social sciences, as in *Law and Economics*, etc. On the other hand, the paper unleashes all sorts of scientific search for alternative explanations for the existence of the firm – managerial, legal, networking, psychological ones etc.

Coase's approach is not less significant for filling up some of the major deficiencies of the dominant paradigm. For example, one of the main criticisms of neoclassical paradigm – the lack of institutional dimension, seemed overcome. And in addition, with no impairment to the integrity of the marginalist analysis. Although, this did not happen in fact; the Coase' concept, did not become an integral part of economics and did not merge with the intrinsic problems of microeconomics. It may be seen, rather as a supplement, as a component of the

[2] At one point, his quote of Hayek even approaches one of evolutionary principles – "[S]ociety becomes not an organization but an organism" (Coase, 1937, p. 387).

Industrial Economics. Just for example, in the lately became popular textbook of Mankiw (2011), Coase is present only in the *Private Solution to Externalities*, but not as a defining principle for the firms.

The greatest importance for the theory, on my opinion, has the fact that the concept is a consistent economic one, and moreover, it is within the framework of the dominant marginalist paradigm. Coase uses a single economic criterion – *marginal substitution*[3] (calling it Marshall's instrument), for the definition of the whole series of categories. Thus, the existence of the firm has been derived economically; it emerges because it organizes the allocation of resources more efficiently, with lower cost than the market. Accordingly, he provides the definition: "When the direction of resources (within the limits of the contract) becomes dependent on the buyer… a relationship which I term 'firm' may be obtained"(Coase, 1937, p. 392). Moreover, the figure of the entrepreneur is derived through the same criterion. "In the rest of this paper, I shall use the term *entrepreneur to refer* to the person or persons who, in a competitive system, take the place of the price mechanism in the direction of resources" (Coase, 1937, note 2 on p. 388).

The size of the firm is defined by the same logic – any activity could be included in, or excluded off, the firm (including the management *per se*) depending on the criterion, whether the marginal revenue is greater than or less than the marginal cost made for it (Coase, 1937, p. 394). *Combination* and *integration* are acts of, respectively, a *horizontal* and a *vertical* inclusion of activities, from one company to another or from the market to a firm (Coase, 1937, p. 397).

Through this consistent logic, Coase convincingly proves that the company needed to be determined by its function. That is precisely the economic, and not a sociological, philosophical or else definition of the company, and it makes the article sustainable, unlike other definitions, under which authors choose all sorts of other reasons[4] and then legitimately dispute them on each other.

3. Coase' Staging of the Problem

R. Coase raises a very important problem, the mechanism of allocation of resources in the firm is the opposite of that, which is constituted as a superiorly efficient by the logic of standard economic theory – the market, or *the price mechanism,* as he also calls it. Hence, if the basic principle of the neoclassical analysis is valid, the firm remains *undefined*, since its principle of allocation of resources simply should not exist.

[3] Factor A is being redistributed from use Y to use X until their marginal productivity equalize.

[4] Just to illustrate: "The (modern) firm is simply a specific community, currently legally positioned, that is formally registered, within the wider, typically national (or international), community, as an emergent sub-community of the latter, oriented to the collectively co-ordinated production of goods and/or services to be sold to others, in a way that is intended to be advantageous to (at least some of) the community members. It is normally the case that (at least some of) that advantage is interpreted as 'profit'.", (Lawson, 2015, p. 15). That definition is from a relatively recent paper, in which, the author not only exclude the criterion of Coase, but blamed him for not analyzing "the nature of the firm.

What actually happens, at this point of the analysis is, that Coase implicitly enters into a dispute with Hayek and his understanding of planning coordination in the economic system as imperfect, merely trying to do what is already done by the market mechanism. Coase confronts Hayek's view with the reality, pointing out numerous cases where conscious governance or economic planning is used for allocation of resources. He quotes aptly "we find islands of conscious power in this ocean of unconscious co-operation like lumps of butter, which coagulating in a pale of butter" (Coase, 1937, p. 388).

This is the key point in the article. Faced with non-compliance of the marginalist paradigm to the reality, he maintains the validity of marginal substitution principle, and rejects (more precisely modifies), Hayek's concept for the ineffectiveness of *planning mechanism*. Subjecting to doubt Hayek's understanding for the coordinating mechanism of the economic system, Coase actually *verifies the validity* of the principle of marginal substitution. As is well known, the principle is a key for neoclassical theory and is used for the derivation of market prices, motivation and direction of action of economic agents, the optimal size of production, etc. Coase assumes that it is acceptable also, for *defining the firm* as long as one suppose that *there exist certain types of costs*, which are not subject of minimization by the market.

4. Transaction Costs – the Great Contribution of Coase?

Coase accepts that costs exist, which are not subject of minimization by the market, simply because they originate from the latter. They are caused by transactions themselves, some are needed for surveying the prices, others – for execution of the contracts or – due to the incompleteness of contracts, especially the long-term ones, and those, where the contractual subject is the labor factor. Coase explains, fair enough, that the reason for *transaction costs* is not the presence or absence of a guaranteed, or residual income, neither the form of payment, nor the uncertainty, pointed out by Knight (1933). It is not even in the *distinct tax treatment* of the firm and the market, though he assumes that latter could boost the size of firms, once they emerged.

At the same time, Coase does not offer a detailed definition of those costs, and defines them in general, as *marketing* ones. Only subsequently, they are called *transaction costs* and their ever-expanding identification (not just in Williamson's works on *economics of transaction costs*), take alarming proportions.[5]

The main thing, Coase takes care of, is that "there is a cost of using the price mechanism" (Coase, 1937, p. 390), i.e. the market in itself amasses costs. And those costs are essential – they can be reduced, but not eliminated through the function of the market mechanism. Hence, it emerges an *economic* necessity of the firm, which can eliminate them by replacing the market with the administrative (planned, or so) allocation of the resources,

[5] Not surprisingly, Stanley Fisher says: 'Transaction costs have a well-deserved bad name as a theoretical device . . . [partly] because there is a suspicion that almost anything can be rationalized by invoking suitably specified transaction costs' (Fischer, 1977, p. 322, n. 5).

and these costs simply drop out. In this capacity, these costs already serve *to define the need of the firm.*

The firm can include in, or exclude off, each activity depending on the criterion – the marginal costs for it to be less than the marginal costs for the same activity, incurred by the market. This way, the function of the market for allocation of the resources is limited, it works only as much as to the extent where, the costs caused by the market itself, sustain their reduction when included in the firm. Coase connects the latter to the incoherency of marketing costs, which include some costs, organized cheaply by the market, and some – vice versa. This means that in his model of the economic system, part of the activities are to be carried out in the firm and a part on the market. The space here, does not allow to make a detailed critique of this thesis, but it is necessary to mention two weaknesses of the proposed solution.

5. Nature of the Firm-versus-Market Dilemma

First, I would like to attract the attention to the fact, that Coase assumes the *transaction* (or marketing) *costs* as belonging to the circulation, i.e. as expenses created and closed within the sphere of exchange. And that *contradicts* a basic principle of classical political economy. A principle adopted in the neoclassical paradigm as well, though implicitly. Namely, that the sphere of exchange could not, and should not, participate *in the creation of value*, nor in value adding.

Classical economists developed this principle as a reaction to the mercantilists' idea that the value is created only through the course of exchange deals, and the wealth increases only by the trade. Moreover, even the mercantilists realized that such an accumulation wouldn't have been possible *within* the national economies and therefore emphasized that their notion applies to foreign trade, which led to a policy of limiting exports of gold, the material embodiment of value. The theoretical development and application of this principle did not create difficulties to the classical economists, who directed their full attention to the sphere of production.

Otherwise stands the principle in the theories of neoclassical economists. Determination the price mathematically, as an intersection point of two functions – those of supply and of demand, turns the principle implicit for the paradigm. In all likelihood, that seems the reason for Coase to accept possibility for (part of the) costs of a good to be caused by both the production and exchange activities. A source for such mixture could still be grounded on the writings of classical economists, who assume that part of the productive operations might be completed in the sphere of circulation – cutting, packing, etc., but the paradigm assumes that this is a *continuation of the production process* in the circulation, and not an exception to the principle.

Albeit implicitly, the neoclassical doctrine also follows the same principle and assumes the execution of exchange deals done on an equivalent basis; the two trading agents also *exchange equivalents*, though they evaluate their utilities. The thing is that if, as a result from the exchange, one gets more utility than the other that would either bring to a nonbreaking chain of exchange acts or, more likely, would make the exchange impossible. When Coase suppose that some of the costs emerge in the very exchange act, there are two logical options. Either one of the counteracting agents loses more than the other (seller for example), or alternatively – both agents pile up the same cost. In the first case one gets an inequivalent exchange and in the second one, it is pointless to account, or compare them. In both cases the exchange becomes pointless, since it is always cheaper to organize any production process directly. Hence, one gets a complete autarchy model in which each produces everything. Whichever answer is correct, it cannot be used as an explanation for the existence of firms, because it violates the principle of the equivalence of the exchange.

The second feature of the *firm-market* dilemma is also interesting. Ronald Coase treats the two sides as *alternatives*. The choice to apply one or the other mechanism for the allocation of resources is not a matter of decision, but of the action of the economic system. "Outside the firm, price movements direct production, which is co-ordinated through a series exchange transaction on the market. Within a firm, these transactions are eliminated and in place of complicated market structure with exchange transaction is substituted the entrepreneur – co-ordinator who directs production. It is clear that these are *alternative* methods of co-ordinating production. … It can be assumed, I think, that the distinguishing mark of the firm is supersession of the price mechanism "(Coase, 1937, pp. 388-389)

Thus, the economic structure or the structure of economic agents, or if one uses the language of *general theory of systems*, the structure of the elements of the economic system depends on the development of production, technology and organization. With the development of technology or organization, the structure needs change, and the size of its items increase. Coase proves that by provision the example of the invention of the telephone and the telegraph (Coase, 1937, p. 397). This leads to continuous growth in the size of firms making them, at the same time, more complex through the combination. This can be seen from the chart, he uses to illustrate how might be overcome the requirement for optimal volume of production, imposed by this same marginalist paradigm from which his own analysis originates.[6]

However, such an analysis shall imply the presence of a large number of separate, specialized and *preliminary* fragmented processes. So, the market mechanism is the preemptively postulated and omnipresent. Accordingly, a number of activities drop of it and pass to the firm. Some activities remain intact, as noted by Coase, because with the rise of the firm size, the number of incorrect management decisions also increases and "the returns of management" decrease. But generally, the activities coordinated by the market are constantly reduced. More or less, that would mean, that the economy turns itself into a big firm. And that it emerged from an infinitely dispersed and specialized state of the division of labor – a condition that barely corresponds with the economic history.

The space here does not allow to deploy a debate for an alternative explanation of the causes leading to the emergence of the firm nor to discuss the other problems with the neoclassical theoretical paradigm raised by the theoretical solution of Ronald Coase. So, the

[6] A different issue is that this analysis suggests continuous expansion of the product structure, i.e. the combination as the predominant mechanism for competition, and underestimates the division of labor and specialization.

paper restrains to uncovering some of controversies associated with the concept of transaction costs.

6. Conclusion

The article "The nature of the firm" by Ronald Coase deals with the undoubtedly exclusive in nature and importance problem of verification of marginalist economic paradigm. The clear logic, consistent economic analysis and the originality of the decision do not accidentally inspire, already 80 years, scientific debate in several fields of economics. Debate that does not fade, but becomes more lively and continually promotes new, different approaches. Among many other reasons, this is also due to *internal contradictions* in the very concept of transaction costs offered by the author, as a solution to the problem.

References

Coase, R. H. (1937). The nature of the firm. – Economica, New Series, Vol. 4, N 16. (Nov 1937), pp. 386-405. [Available at http://links.jstor.org/sici?sici=0013-0427%28193711%292%3A4%3A16%3C386%3ATNOTF%3E2.0.CO%3B2-B].

Fisher, S. (1977). Long-Term Contracting, Sticky Prices, and Monetary policy: Comment. – Journal of Monetary Economics, 3(3), p. 317-323.

Granovetter, M. (1995). Coase revisited: Business groups in the modern economy. – Industrial and corporate change, 4(1), p. 93-130.

Hayek, F. A. (1933). The Trend of Economic Thinking. – Economica, May 1933.

Knight, F. H. (1933). Risk, uncertainty and profit: with an additional introductory essay hitherto unpublished. London school of economics and political science. (cit. by Coase, 1937).

Lawson, T. (2015). The nature of the firm and the peculiarities of the corporation. – Cambridge Journal of Economics, Vol. 39 (1), p. 1-32, https://doi.org/10.1093/cje/beu046.

Mankiw, N. G. (2011). Principles of Microeconomics. 6th edition. Mason, OH: Cengage Learning.

Williamson, O. E. (1995). Hierarchies, markets and power in the economy: an economic perspective. – Industrial and corporate change, 4(1), p. 21-49.