

**Grain Redistribution in a Principal-Agent Framework:
Practice of ‘*Mubayaa*’ in Ottoman Macedonia, 1774-1838**

Seven Ağır, Yale University, Economic History Program

“In Austria, there is no purchasing agents(*mubayaa*) who hold official documents allowing them to force grain owners to sell their grain for low prices; nobody is able to confiscate someone else’s grain. Therefore, there is no motivation for hoarding; consenting producers and grain owners sell their entire surplus for the current price.”

Ebubekir Ratib Efendi (1793)

“[T]he *mubayaa* abuse their positions and tormented the peasantry to such an extent that the peasants have to abandon cultivation and migrate to other places.”

Tatarcıkzade Abdullah Efendi (1793)

“[E]liminating the *mubayaa* in the grain trade would improve the links between the center and the producing provinces, and thereby stimulate agricultural production”

Mehmet Şerif Efendi (1793)

A note on terms

ayan: local notables

çiftlik: farm, generally refers to large estates

guruş (*kuruş*): Ottoman piaster

iltizam: tax-farming

kapın-ı dakik (*Kapın*): official grain market in Istanbul

kile: A measurement unit with local variations, 1 *Istanbuli kile* was 25,6 kilograms.

miri price: official price

mubayaa: officially-assigned purchasing agent with pre-emptive privileges

mukataa: source of tax-farm

mübaşir: grain inspector

mültezim: tax-farmer

rayic price: current price, generally refers to price set by administered bargaining

zahire: grain

1. Introduction

A redistributive policy that aimed to ensure sustenance of a large population in Istanbul has been considered one of the central tenets of the Ottoman political economy. Through a purchasing system based on pre-emptive privileges granted to officially-assigned intermediaries (*mubayaacı*), Ottoman central administration aimed to keep prices of basic commodities low in Istanbul. Although this policy had obvious adverse effects on agricultural producers and production, according to most scholars in the field, removing this system has never crossed the minds of the Ottoman authorities.¹ Elsewhere, I showed that this was not the case. Towards the end of the eighteenth century, Ottoman authorities, like their counterparts in Europe, adopted a more liberal attitude towards price-formation in grain markets and indeed considered removing the *mubayaa* system.² After discussing the drawbacks of the *mubayaa* system in detail, however, the authorities decided to retain it. In this paper, I attempt to explain the permanence of this institution in two steps: First, I use the archival evidence to show that the institution itself was not stagnant and went through several significant alterations in the second half of the eighteenth century. Second, based on the insights provided by the principal-agent literature, I argue that these changes were the result of the central administration's attempts to deal with the incentive and information problems inherent in the redistribution mechanisms, which were conditioned by specific geopolitical and institutional features of Ottoman grain markets.

I lay out these arguments using *mubayaacı*'s accounting records, grain administration registers, and the official correspondence between the center and *mubayaacı*s, with a primary focus on Macedonia—the region which became more important for Istanbul's grain supply especially after 1774. After a brief summary of the changes in the Ottoman grain policies in the eighteenth century, I first

¹ Murphey, 'Provisioning Istanbul'. Inalcık's, Genç's and Guran's accounts of provisioning seem to be in line with this view.

² Seven Ağır, 'The Evolution of Grain Policy Beyond Europe: Ottoman Grain Administration in the Late Eighteenth Century', Yale University, Economic Growth Center Working Papers, no. 999.

describe the *mubayaa* system and various forms it took in different parts of the Empire based on grain registers. Next, I consider the more relevant issue, which is how the *mubayaacs* performed and what kind of problems the central administration faced in relation to the performance of the *mubayaacs*. In this part, I describe *mubayaaci*-center relations within a principal-agent framework and present archival evidence about various types of information and incentive problems. Lastly, I turn to the institutional changes that were introduced by the principal (central administration) to help minimize rent extraction by the agents (*mubayaacs*), as a response to the geopolitical changes in the late eighteenth century.

I argue that the central administration introduced certain innovations in the organization of the *mubayaa* process as a response to the geopolitical changes in the Empire. The intensification of the incentive and information problems towards the end of the eighteenth century (primarily due to the loss of monopolistic control over the Black Sea trade) led to a search for solutions, such as development of a detailed bureaucratic procedure in information-gathering, move from a share-based reward system to a salary-based reward system, and a trend towards community-monitoring. The characteristics of the land-holding and tax-farming system, on the other hand, seem to have shaped both the specific nature of problems in the preexisting *mubayaa* system and the limits upon the expected benefits from institutional changes. *De facto* market power held by various local notables and fiscal decentralization continued to plague center's efforts to minimize rent extraction. The viability of the solutions, therefore, depended on the outcomes of concurrent efforts to release the constraints on fiscal and administrative centralization.

2. *Mubayaa* and its regional variation

Istanbul's grain supply was always an important concern for the Ottoman government and the main target of its redistributive policies.³ In the mid-eighteenth century, the central administration had adopted a system of forced purchases in the zones designated as the official hinterland of Istanbul. This system, known as comparative quota assessment (*mukayese nizami*), was introduced in order to more effectively control the movement of surplus grain from the regions within the city's traditional hinterland.⁴ Through an investigation of historic *Kapan* (Istanbul's central grain market) registers, which contained data on how much grain was sent to the capital in previous years, the authorities tried to determine how much surplus each district was able to produce in normal years. According to these estimates, each district was assigned a quantity to be delivered to a designated dock where it was to be sold to the government agents or officially-authorized private merchants.⁵ The local distribution of the quota assignment was to be made according to a vaguely-defined procedure, in which centrally-appointed agents (*mubayaaçısı*), with the help of local judges and notables, were to assess and collect the assigned quota responsibility of each household according to their condition and endurance capacity ('*hâl ve tahammülüne göre*').⁶

The transportation of the collected grain from the localities to Istanbul was made through different arrangements. Merchants who held long-term collective contracts with the *Kapan*, which they acquired by providing a guarantee (*kefalet*) for other merchants, were allowed to make purchases from the official hinterland of Istanbul on a permanent basis.⁷ These merchants, known as the merchants of the *Kapan*, enjoyed pre-emptive privileges in the designated docks and their purchases

³ For provisioning concerns regarding other Ottoman cities, see Raymond, *Cairo*, p. 283; Singer, *Ottoman Beneficence*, pp. 136-7; Cohen, *Ottoman Jerusalem*, pp. 98-9.

⁴ Güçer, 'İstanbul'un iâşesi için lüzumlu hububatın temini', pp.405-7.

⁵ *ibid*, p. 405 and Aynural, *İstanbul değirmenleri*, p. 5.

⁶ Güran, 'İstanbul'un iâşesinde devletin rolü', p. 20.

⁷ Güçer, 'Hububat ticaretinin tâbi olduğu kayıtlar', pp. 90-1 and *idem*, 'İstanbul'un iâşesi için lüzumlu hububatın temini', p. 400.

were assisted and supervised by grain inspectors (*mübaşir*). Independent merchants⁸ could also apply for official permits in order to purchase grain from these regions, after they provided guarantee of other merchants who might be held responsible in case the grain they registered in the locality did not arrive at Istanbul. In the third case, *mubayaacı* (the agent who was primarily responsible for the delivery of grain to the docks) would be asked to purchase grain on behalf of the administration. He would be asked either to make the payment to the grain owners before the shipment, by the state funds at his disposal or supervise the grain owners load the grain to the registered ships and make the delivery themselves. In either case, he was asked to make sure that the amount of grain loaded on the ships, the grain owners' names and the ship captains' names were registered by the court and dispatched to the center.

In these purchases, the Ottoman government used two kinds of price control. The *miri* price (official price) was the kind of price that was used in obligatory transactions between grain producing regions and the government, where each jurisdictional unit was asked to deliver a certain amount of grain *as a whole*, regardless of the specific amounts held by producers and grain holders. The *miri* price was much lower than the standing market price. It was not adjusted according to the vicissitudes of supply, there was no bargaining involved, and the price remained constant for long stretches of time.⁹

The other type of price set in the grain trade was called *rayic* price; it literally meant 'current price' and was supposed to be adjusted regularly according to supply conditions. For each locality in which licensed merchants or requisition agents bought grain to be brought to Istanbul, the *rayic* price was set through a bargaining process whereby the local administrators could intervene to keep prices at levels acceptable at the center and not to allow the negotiations cause substantial

⁸ *ibid*, pp. 403-4.

⁹ Güran, 'The state role', p. 30 and Aynural, *İstanbul değirmenleri*, p. 73.

delays in timely delivery of grain.¹⁰ Although price-setting between the grain owners and the officially-authorized intermediaries was defined as a process based on ‘mutual consent’,¹¹ the fact that the grain owners were not allowed to sell their grain to the agents other than those authorized by the central administration invalidated the principle of consent in practice. The fact that the *rayic* price was indeed a controlled price set below the market price is evidenced by numerous official documents referring to smuggling, including various cases in which authorities explicitly attest to the gap between the *rayic* price and that offered by the smugglers.¹²

The studies written on Ottoman grain policies have presented the *mubayaa* system as an institution whose features remained more or less the same throughout time and space. An examination of the Grain Registers from 1790s against the background of Lütfi Güçer’s studies on mid-eighteenth-century grain procurement as well as several Grain Registers from the earlier period, however, reveal that the features of the public purchasing system varied according to the regions from which the purchases were made. This is all the more important because there was a shift in the geographical composition of the regions that supplied Istanbul with most of its grain (the main grain hinterland) in the second half of the eighteenth century, primarily due to the military-political problems along the Black Sea coasts. In order to understand how *mubayaa* system as a whole evolved in the second half of the eighteenth century, then, we need to examine its regional variation.

In this part, I will focus on the geographical variation of the *mubayaa* system towards the end of the eighteenth century. The main source for this account is the Grain Register 19 from the year 1794-95. This particular grain register composed just after the establishment of an independent treasury for the Grain Administration, whose aim was to increase the volume of purchases made by the

¹⁰ Ergin, *Mecelle*, p. 380 and Akgündüz, *Osmanlı kanunnameleri*, p. 371.

¹¹ Güçer, ‘İstanbul’un iaşesi için lüzumlu hububatın temini’, p. 401. See also ZD, no. 13 (1778).

¹² Aynural, *İstanbul değirmenleri*, pp. 40-2 and Orhonlu, ‘Küçük bir risale’. See Mantran, *İstanbul*, pp. 173, 176 for the seventeenth-century practices.

state funds and to enlarge the capacity of state granaries.¹³ The statute book of the Grain Treasury also reconfirmed the abolition of the official price of grain and ordered all purchases to be made at the *rayic* price.¹⁴ The register includes more than two hundred orders written by the Grain Minister, to various local agents (judges, deputy-governors, *mubayaacs*, *mübaşirs*) regarding the purchases to be made for Istanbul. Around 90 per cent of these orders deal with grain (primarily wheat, barley, and millet) purchases; the rest is about olive oil and meat. Three groups of purchasing agents are addressed in the orders concerning grain:

- 1) Independent merchants: the merchants who have to obtain permits to purchase a certain amount of grain from a certain region, by providing suretyship of other merchants. These permits are case-specific.
- 2) *Kapan* merchants: the merchants who are registered in the central flour exchange in Istanbul. They hold a long-term contract with the administration, which provided them with preemptive privileges in the docks along Black Sea and Danube.
- 3) *Mubayaacs*: the agents assigned by the government to make purchases from a certain region for a year or several years, on behalf of the state. Along with the local judge, they are also responsible for determining how much grain each grain owner should deliver (local quota allocation process: *tevzi*).

Orders in each category had different characteristics in terms of the information they contain. In the orders dealing with the purchases to be made by independent merchants; there is no information about who the grain owners are and how the price of grain is set. In the orders dealing with the purchases made by *kapan* merchants, there is no information about who the grain owners are. But, in most of them, there is detailed discussion about how the purchasing price is set. The orders concerning the purchases to be made by *mubayaacs*, on the other hand, have detailed lists of the grain owners' names and the quantity expected to be

¹³ Cezar, 'Zahire Hazinesi', pp. 122, 125.

¹⁴ Cezar, 'Zahire Hazinesi', p. 141.

purchased from each. The *mubayaacs* are asked to make sure that each person delivers the assigned quantity to the specified dock, where he would make the full payment with the funds at his disposal. In all cases, grain inspector (*mübaşir*) is supposed to ensure that the names of the ships and ship captains as well as the amount and quality of grain loaded on the ships are registered by the local judge and the invoices dispatched to the center.

The categorization of the orders according the type of intermediaries involved and the extent of information presented overlaps precisely with the geographical distribution of the purchases. The first group (purchases made by independent merchants) is concentrated along the southern Mediterranean coasts of the Ottoman Empire (i.e., the ports of Jaffa and Alexandria). The second group (purchases made by *kağan* merchants) is concentrated along the Black Sea and Danubian coasts (i.e., the ports of İbrail, İsmail, and Bergos). The third group (purchases made by *mubayaacs*) mostly deal with the northern Mediterranean coasts of the Empire (i.e., the ports of Salonica, Golos, and Ağriboz).¹⁵ Based on this broad categorization and the content of the orders we can make several observations relevant for our discussion.

First, the *kağan* merchants, who were the most important group in the grain purchases made for Istanbul in the middle of the eighteenth century,¹⁶ seem to have lost their commercial and financial vigor in the end of the eighteenth century. In the 1794-95 registers, the percentage of purchases expected to be made from the Black Sea and Danubian coasts constitute 27.5 per cent of the total planned purchases.¹⁷ The low share of the *kağan* merchants' purchases in the total amount of purchases made for Istanbul is not due to seasonal or temporal scarcity in the

¹⁵ See Map 1 at the end of the paper. The yellow stars are the major docks for the first-group purchases. The blue stars are the major docks for the second-group purchases. The red stars are the major docks for the third-group purchases.

¹⁶ Güçer, 'İstanbul'un iâşesi için lüzumlu hububatın temini', p. 410 and Aynural, *İstanbul değirmenleri*, pp. 63-4. According to Güçer's study, the *kağan* merchants used to make purchases with their own funds in the 1750s and these purchases made up around 90 per cent of Istanbul's annual grain supply. A later study by Salih Aynural also showed that during the period 1755-62, 93 per cent of purchases were made by licensed merchants with their own capital

¹⁷ ZD 19 (187/1).

regions where the *kapān* merchants hitherto made their purchases. According to several orders sent to the grain inspectors—whose traditional duty was to assist and supervise *kapān* merchants—, *kapān* merchants were not able to purchase as much grain as they did before due to the military and political troubles that swept the region for the last couple of years. Therefore, many of them were not able to raise sufficient funds to make purchases any more. The situation led to an emerging competition among merchants resulting in each one of them attempting to offer higher price to the grain owners and since they did not have enough cash, the purchases were made on credit and resulted in substantial delays, if not defaults, in the payments to the grain owners. Hence, grain inspectors were not only asked to lend merchants cash in several cases but also ordered to make purchases themselves with the state funds at their disposal, which was uncommon in previous years.¹⁸ In one case, the local authorities were even asked to neglect the old rule of line in the purchases and allow the independent merchants buy grain before *kapān* merchants since *kapān* merchants' ships were waiting empty at the docks due their lack of capital to buy grain.¹⁹ As such, *kapān* merchants would still receive an officially-set freight fee, but it was clear that they had *de facto* lost their pre-emptive privileges. A further step in the opening of *kapān* merchants' monopsony at the Black Sea and Danubian region is evidenced by an order sent by the Director of Grain Administration to the local authorities, asking them to allow a group of independent merchant network to buy wheat from several Black Sea docks. The authorities were also urged to hide these outsiders' purchases since they were afraid that these purchases would stir reaction from *kapān* merchants.²⁰

Second, according to the 1794/95 Grain Register, the most important region for the state purchases was the Northern Mediterranean coasts, which had made negligible contribution to Istanbul's grain supply in the mid-eighteenth

¹⁸ ZD 19 (17/1), (87/1). (27/1).

¹⁹ ZD 19 (97/1).

²⁰ ZD 19 (100/1).

century.²¹ In 1794/5, the Administration expected to purchase 1,245,000 *kile* (31,940 tons) grain from the Mediterranean coasts of Thessaly [the ports of Euboea (Eğriboz), Volos (Golos), Salonica (Selanik)].²² All these purchases were to be made by the *mubayaacı*s²³ using the state funds at their disposal. When we juxtapose these documents to the earlier orders concerning purchases from the same regions, we also see that the center increased its involvement in the *mubayaa* process through introducing various administrative procedures about the quota allocation process, which are discussed in the next part. Since this region became central to the government's attempts at reorganizing *mubayaa* process, we narrow the geographical scope of the paper and focus mostly on documents regarding purchases to be made from this region.

We obtained other archival documents from this period that shed light on the details of the bargaining between grain holders, *mubayaacı*s and central administration with respect to the purchase price to be paid by the administration and the total quantity assigned for a district. We also gathered several account books submitted by the *mubayaacı*s to the center, which provide us with valuable information about the terms of the center-*mubayaacı* relationship. These three groups of documents help us reveal how the center's expectations about *mubayaacı*s' performance were shaped and how, in return, it tried to shape the incentives of the *mubayaacı*s. Before we lay out the evidence and the arguments in detail, we would like to discuss the relationship between center and *mubayaacı* within the framework of principal-agent theory.

²¹ Vehbi Günay (1993) shows that in 1746 grain exports from the region were allowed. Also the Grain Registers from as late as 1759 show that there were few orders regarding purchases to be made from the Mediterranean. See ZD 11, pp. 396-7. Also see ZD 10, pp. 370-71 for 1757 registers.

²² ZD 19 (187/1).

²³ ZD 19 (187/1).

3. Understanding *Mubayaa* in the Principal-Agent Framework

Mubayaacı is the Ottoman subject (always a Muslim) who was granted the right to purchase grain (and sometimes other commodities) in a specific region, on behalf of the state. He has the right to enforce grain owners to deliver a certain amount of grain for a certain price (which was, in theory, set according to the instructions of the center) with the help of local authorities. He is also responsible for evaluating how much each farmer or grain owner (i.e., tax-farmers, granary owners, peasants) can deliver according to his ‘conditions and endurance capacity’. Along with the grain inspector (*mübaşir*) assigned to the region, he is responsible for ensuring that the grain owners transport the grain to the official docks and that the quantity loaded on the ships as well as the ship captains’ names are registered by the local judge and the registers are dispatched to the center.

The objective of the central administration in granting the *mubayaacı*s preemptive rights is to keep the price of grain purchased for Istanbul low (compared to the price that would occur if there were no controls). In this sense, *mubayaa* is a redistributive mechanism that aims to ensure welfare of the urban masses and, therefore, political stability in Istanbul. But the effectiveness of this redistributive mechanism depends on how much the quantity supplied (in Istanbul) goes down due to the gap between legal price and the external (world) price (the incentives for smuggling).

Our conceptualization of *mubayaa* in a principal-agent framework is based on the fact that the central administration (principal) has to depend on *mubayaacı*s (agents) to gather information about the amount produced in a particular year. We make two assumptions: First, given that it is costly for the principal to verify the information about local production figures, it is impossible to know for sure if *mubayaacı* is acting according to the center’s instructions. Second, *mubayaacı* aims to maximize his expected utility. In other words, if the expected returns of corruption

are higher than its expected costs (sanctions for corruption), *mubayaa* would act in a way that would conflict with the objectives of the center.

If these assumptions are valid, in other words if there is “conflicting objectives and decentralized information”, then the center is faced with information and incentive problems.²⁴ *Mubayaa* makes sense only as long as the center’s expected utility from redistribution would be higher than its costs (the costs that he would incur to keep *mubayaa*’s corruption at an optimal level).

In order to explore the variables which might affect the expected benefits and costs of the principal and the agent, we make further assumptions about the details of a hypothetical *mubayaa* process, drawing heavily upon the theoretical literature on tax-farming and procurement systems:

1) Central administration is interested in maximizing the net benefits of redistribution. These interests can be divided into a short-term interest in maximizing current utility from urban welfare (positively correlated to the quantity purchased, negatively correlated to the purchase price) and a long-term interest in preserving rural stability (positively correlated to the long-term average of purchase price and the quantity purchased relative to the subsistence threshold, negatively correlated to the variance in purchase price). These two interests can conflict, therefore the discount rates of the administration (the rate at which the principal discounts future gains or losses relative to the current ones) might influence its preferences for mechanism design.

2) *Mubayaa* is interested in maximizing the sum of his legal and corrupt income from *mubayaa* (minus the costs of sanctions for corruption). The way he receives his legal income is determined by the central administration (in other words, principal is the mechanism designer). Theoretically, as with all cases of tax-farming, he can be paid in four ways: 1) He might be paid by a fixed rent (after delivering a pre-specified amount of grain at a pre-specified price, he would keep the residual);

²⁴ Jean-Jacques Laffont and David Martimort, *The Theory of Incentives: The Principal-Agent Model*, Princeton: Princeton University Press, (2001), p. 4.

2) a share (he would keep a pre-specified portion of the total amount gathered as his return, to be sold for profit); 3) A fixed salary; 4) A combination of any of these. According to the way *mubayaaci* is paid, he would have access to at least two, at most three sources of corrupt income:

- i) Cost padding: If *mubayaaci* is paid by the administration for his expenses related to mubayaa (i.e., he pays rents for local granaries, pays salaries for guards and porters on docks with the funds given to him by the central administration), then he has an incentive to falsify the records to overestimate his expenses. This type of corruption might be avoided if the center does not pay *mubayaacs'* expenses (which would probably be the case in a fixed-rent or share system).
- ii) Rent extraction through overvaluation/underpayment: If *mubayaacs* pay grain owners less than the price paid to them by the administration for their purchase, they can pocket the difference. Although this is a particular form of cost padding, it is categorized as a separate item for two reasons. First, this form of cost padding would be appealing in both share and wage systems (obviously less in the the first one because a lower price would also reduce the *mubayaaci's* share), but not in fixed rent in which the whole risk of price volatility is transferred to the agent.

Second, it would have two indirect effects on center's expected utility (which is not the case in simple cost padding). First, when the price paid by *mubayaaci* is lower than the price government would set, the quantity delivered would be lower (than the quantity of grain that would be delivered for the price suggested by the government) because there will be more incentives for grain owners to smuggle. Second, the grain owners and producers will be paid less (than the price suggested by the government) and would have more incentives to quit production in the long-run. In the short run, the central administration will not be able to automatically detect this sort of rent extraction because *mubayaaci* could underreport the quantity produced in that particular year. The grain owners' complaints (about the price set) or an investigation of the harvest outcome might

help the center to grasp the size of the rent. But the first requires an active involvement of the grain owners in the quota allocation and price bargaining and the second requires a costly audit process.

iii) Bribes (collusion between the agent and grain owners): The internal logic of *mubayaa* implies that there is a gap between the price paid by *mubayaacs* (whether it corresponds to the price suggested by the center or not) and the external price (the price offered by smugglers). This difference induces grain owners to smuggle their grain. The grain owners would be willing to offer *mubayaacs* bribe for underreporting the amount they hold as a household or as a community since the administration depends on *mubayaaci* for the estimation of surplus grain each grain owner could deliver and might punish those grain owners who seem to have delivered less than the amount specified by the *mubayaaci*. The grain owners' incentive to bribe *mubayaaci* would decrease if administration's monitoring of smuggling is relatively independent of *mubayaaci*'s efforts and effective on its own.

As long as the administration had control over sea traffic through the Straits, for instance, it is very difficult for any ship to transport grain from the Black Sea region to the Aegean Sea without official permits. In this case bribing the *mubayaaci* will not be as profitable as in cases where smuggling is relatively easy. On the other hand, the grain owners would be more willing to bribe if the *mubayaaci* is more adept in monitoring the harvest outcome throughout the region. Lastly, the grain owners' capacity to bribe will depend on their current wealth as well as the expected returns of smuggling (the size of the gap between legal price and external price). If the external price of grain increases, there would be more incentives for the *mubayaaci* to underreport the quantity produced in the region because his expected income from bribes will increase as the incentives for smuggling increase.

Now, I return to the archival evidence about the workings of the *mubayaa* system and abuses as they were reported in official documents, prior to the establishment of the Grain Administration. This would help us understand which

type(s) of problems discussed above were more prevalent in the Ottoman case. Although, as the literature on tax-farming indicates, a fixed price contract might remove certain problems such as cost-padding that exist in a share or salary system, in case of *mubayaa*, the evidence indicates that the Ottoman central authorities never preferred this type of contract. The reason why fixed price was not regarded as a desirable method might be related to the highly-fluctuating nature of grain production and the needs for a relatively stable supply of grain. If there was a fixed-price contract in which *mubayaaci* is the residual claimant for the grain collected after he delivered a certain pre-determined amount in return for a fixed payment, then there would be no motivation for cost padding.

But this would have the potential to induce over-extraction from the grain owners and undermine agricultural base in the long-run, as was the case for all fixed-price contracts in tax-farming. Furthermore, unless *mubayaacs* were allowed to sell the residual grain in markets other than that of Istanbul, they would not have any incentives to raise the quantity supplied under a fixed-price contract compared to any share contract, given that the amount they were expected to deliver is the same in both. An additional reason for aversion to fixed-price contracts in *mubayaa* might be the high risks associated with volatility in grain supply and the significance of price stability in grain markets for the administration which probably makes the principal less risk averse than the agent (compared to most other tax-farming arrangement with primarily fiscal objectives).

Hence, up until the establishment of the Grain Administration, *mubayaacs* were allowed to keep a share (one tenth) of the total amount they purchased in return for their service. They were allowed to sell this share only to the bakers at the *Kapan* (Istanbul's official grain exchange) and not to the foreigners. Nevertheless, in this type of payment system, part of *mubayaaci's* income is correlated with the quantity of grain delivered to Istanbul. As the price offered in

Istanbul increases, *mubayaacı* would be more willing to increase the quantity delivered to Istanbul.

We should also remember that up until 1770s, the costs of monitoring smuggling from the Black Sea region were relatively low and independent of the knowledge about local production figures (and therefore, the service of *mubayaacı*) because all Black Sea coasts could be monitored and the transit of foreign ships through the Straits were strictly prohibited. Therefore, the incentive for bribing *mubayaacı*s were not as strong as it would be in regions where smuggling was relatively easy.

The share system also implied a tradeoff between *mubayaacı*'s legal income and illegal income. As the gap between legal price and external price decreases, *mubayaacı* would be more willing to forgo its income from corruption (accepting bribes for smuggling or underpaying the grain owners) in return for his income from the sale of his shares. But, in the second half of the eighteenth century, the demographic and geopolitical circumstances implied movement in an opposite direction. The incentives for smuggling increased probably making *mubayaacı*'s expected returns from corruption higher than his expected legal income.

On the demand side, the international grain price was rising, creating an upward pressure on the price of grain smuggled from Ottoman lands to Western Europe.²⁵ At the same time, Istanbul's population was rising as a result of increasing migration from rural provinces struggling with social and economic problems.²⁶ The forced purchases, justified on the grounds of sustaining Istanbul's high population, were also a source of discontent in the Balkans. As the contemporaries observed, in a vicious circle, rising population of Istanbul induced by rural problems augmented the pressure on the traditional hinterland, further exacerbating rural conditions and reinforcing migratory trends.²⁷ The endogenous

²⁵ Labrousse, *Esquisse du mouvement des prix*, pp. 598-603; Vilar, 'Histoire des prix' pp. 29-45 ; Bacci, *The population of Europe*.

²⁶ McGowan, *Economic life*, pp. 121,148.

²⁷ Penah Efendi, 'Mora ihtilali tarihçesi', p. 230.

relationship between redistributive policy and agricultural production, hence, implied a gradual decrease in grain supply coming from the hinterland.

Parallel to the changes in the demographic structure, the capacity of the government to enforce controls was diminishing because of political and military troubles in the regions providing grain to Istanbul. Continuous wars on several fronts since 1768 shifted provisioning priorities by reserving the grain produced in Istanbul's traditional hinterland for military use. The territories in the Danubian principalities were occupied by Austria and Russia for five-year periods in 1769–74 and 1787–92, which clearly led to the disruption of the traditional grain routes feeding Istanbul. In addition, military troubles had indirectly affected the productive base of the Balkans, the main surplus-producing region in grains. In order to finance protracted wars, the administration gradually reorganized state finances, which led to the spread of the tax-farming system and the rise of local notables and complicating fiscal and administrative control over local resources.²⁸ Furthermore, the needs of the army had to be met by the continuous use of emergency taxes as well as new fiscal instruments such as *esham* (internal borrowing), which rendered rural investment unattractive.²⁹

After military defeats led to the loss of Crimea and partial detachment of Wallachia and Moldavia, the Ottoman government was deprived of its exclusive control over Black Sea trade.³⁰ After the opening of trade in the Black Sea, Ottoman and Russian grain produced along its coasts started inundating western Mediterranean markets.³¹ This process was also formally acknowledged by the Ottoman authorities in 1802, when the Ottoman government began granting trade permits to foreign ships under certain conditions.³²

²⁸ İnalçık, 'Military and fiscal transformation'; Cezar, *Osmanlı maliyesinde bunalm*; Darling, *Revenue-raising and legitimacy*.

²⁹ Genç, *Devlet ve ekonomi*; Cezar, *ibid*.

³⁰ Turgay, 'Ottoman-Russian commercial rivalry', p. 60 for the implications of the Küçük Kaynarca Treaty for the grain trade.

³¹ Harlaftis and Laiou, 'Ottoman state policy', pp. 9-11, Harlaftis, *Greek-owned shipping*, pp. 18-.

³² Beydilli, 'Karadeniz'in kapallığı', pp. 691-3.

As a result of this severe geopolitical loss, the Mediterranean coasts became more important for the provisioning of Istanbul. The grain exports from Mediterranean coasts, which were a legal source of customs in 1740s,³³ were definitely prohibited in the second half of the eighteenth century. Numerous official documents ordering substantial purchases to be made from southern Mediterranean ports after the 1790s, demonstrate the supply zone's expansion southwards.³⁴ According to the Grain Registers from 1794-5, 70 per cent of the wheat purchases for Istanbul were to be made from the Mediterranean coasts (primarily Anatolian and Macedonian produce).³⁵ The accounts of the Grain Administration from the period 1795-1800, summarized by Tevfik Güran, also indicate that 66.4 per cent of all grain coming to Istanbul was purchased from the Mediterranean regions.³⁶ At the end of the eighteenth century, the administration had no choice but to condone illegal grain imports by the bakers' guild, accepting the *de facto* end of Ottoman self-sufficiency in grain.³⁷

As a result of these two pressures on the traditional *mubayaa* system (increasing external price of grain and decreasing *mubayaa*-free, low-cost monitoring of smuggling), it becomes much more difficult to encourage *mubayaa* to comply with the central administration's instructions. Consequently, the archival documents and treatises written by the Ottoman central authorities towards end of the eighteenth century (before the establishment of the Grain Administration) point repeatedly to the abuses of *mubayaa*.

In the accounts related to the *mubayaa*'s abuses, the central administration establishes two sources of corruption. First, it was clear that the existing

³³ Vehbi Günay (1993). *H. 1159 (M. 1746) Tarihi Kareferiye Kazası Şerhi Sicili (Transkripsiyon ve Değerlendirme)*, Unpublished Dissertation, Ege Üniversitesi Tarih Anabilim Dalı. B 100, S 73 (8 B 1159 [27 7 1746])

³⁴ HH. 15/620, 29 Z 1203[1789], C.İKT. 14/656, 18 C 1205 [22 02 1791], C. BLD. 4/177, 20 S 1209 [September 15, 1794], C. BLD. 38/1882, 19 S 1209 [15 09 1794], C. BLD 28/1367, 20 Ş 1209 [12 03 1795], C. BLD. 66/3256, 10 S 1210 [26 08 1795]. C. BLD. 38/1887, 10 N 1209 [31 03 1795], C.İKT. 13/638, 29 N 1210 [07 05 1796], C. BLD. 71/3527, 16 Ca 1217 [14 09 1802], C.BLD. 4/180, 10 S 1219 [May 20, 1804], C.BLD. 7/305, 1 R 1225 [May 5, 1810], C. BLD. 58/2892, 10 Ca 1209 [03 12 1794]. C. BLD. 82/4097, 06 Za 1221 [15 01 1807].

³⁵ ZD 19.

³⁶ Güran, 'İstanbul'un iâşesinde devletin rolü', p. 31.

³⁷ C. BLD. 72/3551, 18 Za 1212 [04 05 1798].

inequalities among grain owners led to a distorted application of the basic principle of *mubayaa*. According to the instructions of the Sultan, each grain owner was supposed to deliver an amount according to his/her conditions (the amount of grain held) and endurance capacity (the subsistence threshold). The grain owners in concern, however, made up a heterogeneous group, including both subsistence farmers with access to small parcels of land and notables with tax-farming prerogatives, large farms (*çiftlik*s), and storage facilities. It was not strange, then, that the local power-holders attempted to manipulate the allocation process in line with their interests. Officially, the distribution of the tax load (as well as *mubayaa* quota) among the inhabitants of a district were to be determined according to the registers compiled during town meetings at the court. Such documents, however, are not easy to locate in the Ottoman court registers. Michael Ursinus argues that the reason why there was a “documentary fall-out in the court records” was because the “landed gentry,” whose local power were not officially recognized until mid-nineteenth century, played a prominent role in the district’s tax allocation system.³⁸ Although this argument is not supported by a comprehensive examination of court registers, various studies focusing on the court registers produced before the last decade of the eighteenth century do not offer any conflicting evidence either.³⁹

The involvement of the local notables in the tax allocation process implied abuse of power, especially at a time when the central authorities delegated these notables certain administrative duties along with tax-collecting rights, without yet establishing checks and balances. In a document from 1767, for instance, it is noted that the notables of the district of Langaza (in the vicinity of the dock of Salonica) forced the peasants to deliver more than their assigned grain quota to

³⁸ Ursinus, Michael (2005). “The Çiftlik Sahipleri of Manastır as a Local Elite, Late Seventeenth to Early Nineteenth Century” *Provincial Elites in the Ottoman Empire* (pp. 247-57), (ed.) Antonis Anastopolous, Crete: Crete University Press. See p. 247.

³⁹ Insert Hacıoğlu pazarcık.

meet the amount assigned to the region as a whole, while hiding their own grains for smuggling. In this order, *mubayaacı* is provided with the names of the large farm-holders and granary owners and asked to make sure that these notables would deliver the amount they held before anyone else does.⁴⁰ In a similar vein, Süleyman Penah Efendi (d. 1785), a high-ranking bureaucrat who visited Morea in 1769, notes that the *mubayaacı*s assigned to the region collude with local power-holders and force peasants to sell their grain to the local notables for very low prices.⁴¹

The inequality between wealthy grain holders (*beys* and *ayans*) and ‘poor farmers’ (*fukara-yı reaya*) in the *mubayaa* process stemmed also from the second group’s inability to smooth out the effects of agricultural fluctuation on their livelihood, which made them financially dependent on the first group. Wealthy notables were able and willing to offer money to the small farmers in advance (before harvest) in return for their future produce. There are several documents indicating that the terms of such contracts were unfavourable to the farmers.⁴² In pre-harvest negotiations, the notables were able to impose a relatively low purchase price to the farmers with little ability to wait for a more favourable agreement (as common sense implies, farmers’ price elasticity of supply would be lower than that of the notables). Although the profit margin accrued by the notables in this case can be considered an efficiency-enhancing return for their intermediary (storage) services, the implications of the notables’ storage activity for allocative efficiency can only be understood by studying the structure of grain markets. Nevertheless, it is clear that the government viewed the notables’ advance payments to farmers as a harmful practice (presented it also as welfare-distorting) and, as we will see in the next part, tried to replace it with official credits offered by his own agents.

⁴⁰ C. ML. 29505 (1181 [1767]).

⁴¹ Penah Efendi Mecmuası (1769: 317).

⁴² Özdemir (2003: 126-27).

In addition to the inequalities among grain owners, official documents concerning *mubayaacs*' abuses point to the role of fiscal practices (underlying *mubayaacs*' assignment to the office) in local legitimization of excessive rent extraction. At a date as early as 1758, it is noted that the *mubayaacs*, who were assigned among the local notables of the region after they applied for the office through *iltizam* (sale of tax-farms to the highest bidder in an auction), forced the peasants to pay them in cash as a substitute for their grain assignment.⁴³ Authorities linked such oppressive behaviors directly to the sale of office by way of which *mubayaacs* legitimized rent extraction. Yet, the sale of *mubayaacılık* (office of *mubayaaci*) as a tax-farm (*mukataa*)⁴⁴ continued up until the establishment of the Grain Administration.

Sale of *mubayaacılık* does not seem to be in line with the central administration's redistributive objectives, which we assumed to have prevented the administration from choosing a fixed-price (residual rent) contract in its dealings with *mubayaacs*. Why, then, did the administration allow, or at least condone, such sales? As mentioned above, in order to finance protracted wars during this period, the administration gradually reorganized state finances, which led to the spread of the tax-farming system.⁴⁵ In his study on Ottoman provincial governance in the eighteenth century, A. Yaycıoğlu summarizes how this system worked in practice. This account might help us understand the implications of tax-farming for *mubayaa*:

From the late seventeenth century on, the governors, deputy-governors started to appoint community overseers (*ayan* and *kocabaşıs*) with letters of certification (*buyruldu*) to carry out taxation process at the grassroots

⁴³ C. ML. 21615 (1171 [1758]).

⁴⁴ In *iltizam*, the right to collect a tax source (*mukataa*) for a certain period of time is sold to the highest bidder. As Çizakça maintained, the *mültezim* (tax-farmer) was a risk taker like any entrepreneur; if he managed to collect more revenue than his total cost (the price paid in the auction and the operational expenses) he enjoyed a profit, otherwise he suffered a loss. See Çizakça, M. "Tax Farming and Resource Allocation in the Islamic Societies of the Past" Bogazici Üniversitesi Institute of Social Sciences, Research Paper 86-04.

⁴⁵ İnalçık, 'Military and fiscal transformation'; Cezar, *Osmanlı maliyesinde bunalm*; Darling, *Revenue-raising and legitimacy*.

level. However, as was the case with the deputy-governors, these offices were conventionally sold by the governors (or their deputies) to the local notables and power-holders. Most of the time, they paid the taxes due to the governors or their deputies in advance, and later that they would reimburse the amount, most of the time with interest, by apportioning (*tevzi*) the tax burden (and other public expenditures) to the taxpayers in the communities.⁴⁶

It is plausible that along with other offices, deputy-governors sold the office of *mubayaacı* in spite of the central administration. In a document from early 1780s, the government regretfully acknowledges that the office of *mubayaacı* came to be sold for payment (*caizce*) ‘in the last few years’ and this caused a lot of trouble for the peasants. On the grounds that they made a substantial payment to purchase the office, it is noted, *mubayaacıs* increased their demands from grain owners (and especially from farmers with little bargaining power over price-setting). They either delayed payments for grain or demanded more than the amount that should be assigned according to the rules of *mubayaa*.⁴⁷ The document notes that a single individual would pay around 14,000 guruş for the office, which indicates that the people who applied for the position considered it a highly profitable investment.⁴⁸ Assuming that the region *mubayaacı* assigned for would be able to deliver around 120,000 kile (3079 tons) wheat—which is an upper-bound estimate—⁴⁹ and the price to be paid for each kile would be 1.5 guruş,⁵⁰ the legal amount to be earned by *mubayaacı* would be 18,000 guruş, allowing him to make a handsome profit of 4,000 guruş.

⁴⁶ Yaycıoğlu, ‘Provincial challenge’, p. 41.

⁴⁷ C.BH. 8836 (1196[1781-82]).

⁴⁸ C.BH. 8836 (1196[1781-82]). According to this document, the price was paid for the office of *mubayaacı* assigned to the following regions: Tekfurdagi, Siroz, Yenişehir, Gümülçine.

⁴⁹ This is the amount expected to be bought from the district of Salonica during this period according to Svoronos (1956), pp. 45-52 and 379-81. The actual amounts purchased are generally lower than this amount.

⁵⁰ The estimate is based on C.BLD (7053).

In 1789-90, a few years before the establishment of the Grain Administration, the government announces that it stopped the sale of *mubayaaclık*. An imperial decree was sent to all localities informing the inhabitants that the *mubayaaclırs* were not required to make any payments at the center to be assigned to the office and therefore they (*mubayaaclırs*) should not require extra payments from the grain owners.⁵¹ Despite all attempts to end the practice of office-sale, however, a document from 1805-1806 indicates that the *mubayaaclırs* continued to make undue payments (*ubudiyyet*) to get hold of the office.⁵²

It is our contention that the office of *mubayaaclı* was considered a profitable office not only for the legal revenues associated with it, but also for the illegal gains office-holders expected to reap through their access to office. Based on the available sources, it impossible to measure the amount of corruption or estimate the illegal income of the *mubayaaclırs*. What one might do, however, is to take stock of the conjectural changes in Ottoman grain markets and discuss how they might have affected the expected returns from holding the office of *mubayaaclı*. As summarized above, the gradual shift of the hinterland to the Mediterranean coasts implied an increase in the costs of monitoring smuggling on the one hand. This, in addition to the increasing demand for grain most probably led to a rise in incentives for smuggling. Put in another way, the administration became more interested in purchasing grain from Mediterranean coasts,⁵³ from which the costs of smuggling were relatively low. As a result, *mubayaaclırs*' expected profits from corruption increased. The following part will present the changes introduced by the administration to address precisely this problem.

⁵¹ HAT 205/10732 (1204[1789-90]):

⁵² HAT 120/4864 (1220 [1805-06]).

⁵³ According to Eldem who studies Ottoman cargoes arriving at Marseilles, "some 40 or 50 thousand charges of wheat (approximately 5 to 6,000 tons) left the Ottoman lands for France every year, reaching an exceptional average of over 200,000 charges (24,000 tons) in 1750-1754." This amount decreased to a mere 15,000 charges in 1786-1789. Eldem explains this significant decrease as "the result of the combination of the negative effect of growing Greek piracy in the Aegean and of the Russian advance in the Black Sea, cutting off the grain supply from this region" (Eldem, 1999: 109). Ottoman authorities increasing purchases from the region, however, might be a more important reason. For instance, in a Grain Register from 1759/60 (1173), there is no purchases planned to made from the Mediterranean coasts of Thessaly or southern Aegean. See ZID 11, pp. 396-7.

4. Changes in the *Mubayaa* System

As a response to the problems in the *mubayaa* system, the administration introduced several changes. Some of these changes were gradual, such as the increasing involvement of the government in the local quota allocation process; others were more abrupt, like the replacement of the share rewards with the salaried official. Although it is hard to discern exact timing of certain changes such as actual ending the practice of sale of *mubayaa*, it is possible to determine the changes in the preferences of the policy-makers and the direction of the desired changes.

Table 1: A stylized history of the changes in *mubayaa* system

Period	Payment Method	Allocation Type	Appointment Type
Before 1774	Share	Lump-Sum	Office Sale
Between 1774-1793	Share	Lump-Sum and Detailed	Office Sale
After 1793	Salary	Detailed	Meritocratic

One of the most significant, yet gradual, changes in the organizational features of *mubayaa* was the increasing involvement of the central authority in the local distribution of quota assignment process (*tevzi*) in the second half of the eighteenth century. A strong evidence for this transition comes from the local court registers. A. Anastasopoulos, who studied Karaferye court registers between 1759-1777, has shown that the share of district quota assignments that do not contain the detailed lists of grain owners (in other words, lump sum assignments for villages or sub districts) in the total amount of assignments decreased significantly during this period.⁵⁴ As such, the quota allocation registers, which were composed locally and dispatched to the center for examination, came to contain more detailed information towards the end of the eighteenth century. These registers did not

⁵⁴ Anastasopoulos, 1999: 34. In 1759 41.9 per cent, in 1765 34.8 per cent, in 1768 and 1770 38 per cent and in 1777 27.4 per cent of the total allocation was assigned as lump sum quantities to the villages in Karaferye.

only include information about the grain assignments to a particular region, but also the local tax liability corresponding to various items of expenditure. Therefore, this increasing concern with the distribution of grain assignments should be viewed in relation to the administration's generalized attempts to gain further control over local tax sources in general.⁵⁵ Yet, the detailed lists were common not only for purchases made for *miri* price (the purchases that can be placed more easily in the tax category), but also in the purchases made for *rayic* price, which was adjusted frequently through bargains between local notables and the center throughout this period.⁵⁶ Therefore, the government's active involvement in the quota allocation process have probably aimed to reduce the above-mentioned surcharges from less powerful groups and serve the government's long-term interests in agricultural stability.

In 1795, the central authority issues a decree establishing a procedure for examining these registers in order to protect the *reaya* from abuses which could occur in the process of the registration, distribution and collection of taxes (including quota assignment).⁵⁷ The Grain Registers also indicate that with the establishment of the Grain Administration the quota allocation becomes a closely-inspected procedure with well-defined rules for local participation and bargaining with the center. In these registers, *mubayaacıs* assigned to the western Mediterranean docks are asked to investigate how much each resident of the region would be able to deliver according to their production and endurance capacity (*'hal ve tahammüllerine göre'*) and send these reports to the center.⁵⁸ These reports are supposed to be prepared at the presence of all parties (household heads) at the local courthouse. After the lists are prepared, the community as a whole (according to the documents, represented in general by one or several notables of the region)

⁵⁵ An alternative explanation for the increase in detailed registers would be the expansion of the land held by tax-farmers and *çiftlik*-owners relative to the land of 'free' villages. I believe, however, Anastasopoulos is right that this alone cannot explain such a significant change in the lists. Anastasopoulos, 1999: 34.

⁵⁶ The raw data about the price of wheat purchased by the government is presented in Appendix 3.

⁵⁷ Uzunçarşılı, *Merkez ve Bahriye Teşkilatı*, p. 322

⁵⁸ ZD 19 (22/1), (23/1), (32/1), (58/1).

pledges to deliver the amount assigned to themselves according to the lists. Then, these pledges (*taahüt ilamları*) along with the lists are sent to the center.⁵⁹ Although it is hard to know to what extent these rules (especially the requirement of quota-allocation declaration at the presence of whole community) were applied in practice, it is possible that it might have encouraged the villagers to participate in the process or to be more willing to seek for justice in cases of wrongful allocation.

The increasing government intervention in the local allocation process can also be observed in the emerging role of *mubayacı* as a credit agent for producers. As mentioned above, the wealthy grain holders were able to lend money to ‘poor farmers’ before harvest, depriving them from bargaining power in price-setting. The administration aims to replace these private ‘granary-owners’ with its own agents. In various cases, *mubayaacı*s are funded specifically to lend money to peasants.⁶⁰ Although according to the authorities the reason for these loans was ‘to help the peasants get rid of these merciless brokers,’ it was possible that by replacing private intermediaries with its own officials, the government also aimed to transfer the monopsonistic rent to itself. In the orders, *mubayaacı*s were asked to lend money (known as *zahirî akçesi*) to peasants before the harvest in return for their commitment to deliver a certain amount of grain to themselves before anyone else. Despite the preemptive privileges granted, however, the administration urges the *mubayacı* to negotiate the price after the harvest and allow the price move according to the actual conditions of supply. In this way, the authorities maintain, ‘the agriculture will flourish and villages will prosper’.⁶¹ But again, it is very difficult to know whether the *mubayaacı*s in fact followed those instructions or even whether the central authorities were candid in their statements. As presented in Appendix 3, the prices set by *mubayaacı*s varied according to the location of purchase and the quality of the wheat. There was also some room for bargaining and an upward

⁵⁹ ZD 19 (19/1), (43/1), (44/1), (54/1), (24/1), (32/1). For an example of such a list concerning the purchases to be made from the district of Salonica, see Appendix 1.

⁶⁰ ZD 19 (15/2), (121/1), (27/1).

⁶¹ ZD 19 (15/2).

trend in real purchase prices over time.⁶² Yet, the data from the Grain Register of 1794/95 also clearly indicate a significant gap between external price (price offered by the smugglers) and the price set for state purchases. The price offered by smugglers, as reported by the administration (though, there was an incentive for the local officials to overestimate this price) was 40 per cent higher than the *rayic* price, which was set after several rounds of bargaining in Salonica.⁶³

More importantly, it was still local notables of the region who played an important role in these negotiations.⁶⁴ It is not clear, for instance, the negotiations with the peasants who borrowed money from the *mubayaacs* were conducted with a similar or different perspective, i.e., allowing higher price flexibility since farmers did not have storage facilities as notables did. In an order sent to the *mubayaacs*, for instance, the administration urged the agents to take into consideration the relations between local notables and producers in bargaining over price. It was noted that the local power-holders (*ayan ve hanedan ve vucub-ı belde ve ashab-ı servet*) assumed the role of fiscal administration in various villages. Although these notables did not officially held legal tax-farming and usufruct prerogatives in these villages, they were paying farmers' taxes and providing them with cash and seeds. In return, they were charging a high interest on the loans and lowering the price for the grain they agreed to purchase *after* the harvest.⁶⁵ Therefore, *mubayaacs* are

⁶² In (1224) 1809-10, *miri* price of wheat purchased from the regions around Salonica was 60 para per *kile* and *rayic* price was 140 para per *kile*. In 1810-1811 (1225), *miri* price was 60 para, while *rayic* price increased to 180 para. And in 1811-12 (1226), both prices were the same [KK 5577]. According to these numbers, the price of wheat purchased from Salonika at *rayic* price in 1809-1810 was 0.81 silver grams and in 1810-11 was 1.05. Both prices are higher than 0.78, the average price of wheat, which was paid in so-called 'market transactions' during 1763-80 (number of observations: 9, min: 0.57) according to the data provided in Berov. The *miri* price, on the other hand, is equal to 0.35, which is higher than 0.15, the average price of wheat purchased from Macedonia between 1786 and 1793 according to the data provided in Berov (number of observations: 6, max: 0.20). According to another document from 1794-95 (1209), the price paid for wheat purchased for Istanbul in Salonica was 100 para (300 akçe). [KK2959]. This price equals to 0.58 silver grams which is again higher than the values provided in Berov for previous years. (Note : 1 *guruş*=40 *para*=120 *akçe*)

⁶³ ZD 19 (156/1), (173/2).

⁶⁴ Several detailed cases of bargaining between local notables of Salonica and the central administration will be presented in a longer version of this paper: C. BLD. 841,

⁶⁵ ZD 19 (191): "*bir ve iki ve üç dört karyeyi deruhde edip kendü çiftlik ve mukataası gibi içlerine subaşı koyup reayayı ziraat etdirir ve tohum ve akçe ve vergi ve sahyan ve masraflarını verürler ve vakt-i harmanda cem olup besaplarını ruyet ve murabahasını zıam ederler mahsulatlarını ol vaktin rayıcıyle besap edip deynelerine mahsuben almak için daima vakt-i harmanda esari*

asked to beware of notables' attempt to overvalue grain and not to accept any price before harvest.⁶⁶

Although the differences between notables and peasants were discussed in detail, there is no evidence indicating that the authorities considered offering higher prices to the peasants (or exempting them from price controls), as was the case in seventeenth-century Castile.⁶⁷ If the price set for all groups were same (which seems to be the case from the available documents), the well-being of peasants would eventually depend on two things: the purchases (or at least a significant portion of the purchases) made by intermediaries such as tax-farmers would be transferred to *mubayaacıs* and *mubayaacıs*' rent extraction from price-setting process (i.e., misrepresenting the harvest outcome and paying less than the price he reports to the center) would be minimal (at least, less than private intermediaries).

We are not able to conclude if peasants were better off as a result of changes in the allocation process and specifically through *mubayaacıs*' loans, but there are less complaints about the abuses of *mubayaacıs* in the period after the establishment of the Grain Administration. With respect to the inequality among grain owners, it is again not clear whether there were any actual improvements. Comparison of the earlier allocation figures from Karaferye court registers with later archival documents suggests that there might have been some significant changes: The share of the amount assigned to the most powerful notables of the region within total assignment seems to have risen significantly. In 1770, the wealthiest landowners' contribution to the total amount delivered by the community was not

tenzıl etmek adeleridir. aşine tedbir ve şunu olunacak dakıkaya vakaş olur ise esarı belki çokca tenzıl itmeyüp bir hile ve desise mütalaa iderler."

⁶⁶ ZD 19 (191).

⁶⁷ In 1632, farmers (*labradores*) were exempted from official price regulation in their transactions. This law remained effective until 1699 and provided great flexibility, under which *all* market actors could circumvent price controls. (1994). García Sanz, Angel "Castile 1580-1650: Economic Crisis and the Policy of Reform," *The Castilian Crisis of the Seventeenth Century: New Perspectives on the Economic and Social History of Seventeenth-Century Spain*, (eds.) Yun and Thompson, Cambridge: Cambridge University Press. See p. 30.

higher than 9 per cent.⁶⁸ In 1800, 17.5-22.7 per cent of the total amount was assigned to a single landholder.⁶⁹ The increase in the amount assigned to the wealthiest grain owner does not mean much without the information regarding the changes in the relative wealth among grain owners in the region. It is possible that some notables expanded their land holdings or tax-farming prerogatives during this period, leading to a proportional increase in their assignments. In a better position of wealth and power, though, we would expect them to manipulate quota allocation process more in their favor and this was not the case. We are only able to maintain that various documents from the late eighteenth century attest to the fact that the authorities acknowledged the inequality between wealthy grain owners and subsistence farmers and how it affects the distribution of local quota assignments. It is highly possible that by introducing a quota allocation process that was more detailed and easier to monitor, the administration aimed to relieve such problems.

The purchase of grain by state funds, on the other hand, implied opportunities for cost-padding. *Mubayaaçrs* were able to overestimate their expenses and pocket the difference between the amount they reported and the amount they actually spent. In a report written towards the end of the eighteenth century, the author points to the absence of a central system for monitoring *mubayaaçrs*' expenses as one of the reasons why *mubayaaçılık* had become such a profitable business.⁷⁰ Although even before the establishment of Grain Administration, *mubayaaçrs* were asked to keep detailed account books for their incoming and outgoing payments, the monitoring process was highly deficient. An examination of a sample of these account books reveals that these books were sent to the office of defterdar (treasurer), where they were controlled for numeric

⁶⁸ Anastasopoulos, 1999: 33.

⁶⁹ C.BLD.6647 (1214 [1800])

⁷⁰ It is estimated that the document transcribed by Orhonlu was written between 1785-1800: "*amma merkum kapucubşı ağa memur olduğu mubayaa için aldığı hazineden ziyade akça ile yine hanesine geldiği* garibedenür.

Padişahımızın zulme rızası yoğıken mubaşiriin aldığı akçe ne sebep ilediür deyu aranıp sual olunmadığından emsalleri dahi ziyadeye cesaret ve hiyaneti irtikab eder." See C Orhonlu (1967). "Osmanlı Teşkilatına Aid Küçük Bir Risale," *Belgeler* 4/7-8,

Ankara: Türk Tarih Kurumu, pp. 39-49.

mistakes⁷¹ Yet, the verification process, through which these revenues or expenses were checked against receipts or invoices (*senedat*), is not clear. Furthermore, the evidence does not indicate an audit process initiated, for instance, automatically if the amount of grain delivered was less than a threshold. Instead, there was a semi-random procedure through which cost-padding was estimated and expenses were accordingly modified. In the sample we have, the expenses recorded were reduced to its half or one-third, without any justification, only with a note that says ‘reduction’ (*tenzilat*). In these postscripts, written in red ink, there were also examples of similar accounting practices from previous years in other places, justifying the reduction (or the amount of reduction) by stating that this was a common practice in government finances.⁷² It is doubtful, however, that the administration expected to benefit from this routine modification since agents, themselves, probably arranged their reports (the degree of overestimation) according to this regular process they anticipated. In a decree from 1795/95, only a few years after the establishment of the Grain Administration, the Grand Vizier states that “as the affairs of grain increased, so did its damages”.⁷³ He is concerned, in particular, how the funds assigned to the *mübaşirs* and *mubayaacırs* are not delivered to the producers and urges the head of the Grain Administration for detailed inspection of accounts. Furthermore, the collusion between local power-holders and *mubayaacırs* would continue to be a barrier for transparency. In an anonymous treatise written in this period, the author describes not only the collusion between local power-holders and *mubayaacırs*, but also how the agents sent from the center to supervise local collusion ended up cheating the government, when they were offered bribes in the places they were sent.⁷⁴

⁷¹ KK 2959, D. MKF. 30528. The digitized copies of these accounts are available to the researchers in the Ottoman Prime Ministry Archives in Istanbul. Most of them seem to be located in the *Kamil Kepeci*, *Mevkufat Kalemi*, and *Navul Kalemi* Registers.

⁷² See D. MKF. 30528, KK 2959 (1209 [1794]), D. MKF. 31340 (1225-27 [1810-13]).

⁷³ HAT 206/10786 (1210 [1795/96]): “*zahire maddesinin maslahatı çoğaldıkça fesadı muzdad olduğu zahire mübaşirleri taşra memleketlerde reyaya akçe vermeyüb zulm eyledikleri reside...*”

⁷⁴ C Orhonlu (1967). “Osmanlı Teşkilatına Aid Küçük Bir Risale,” *Belgeler* 4/7-8, Ankara: Türk Tarih Kurumu, pp. 39-49.

The most important difference in these account books is the salary item introduced after the establishment of the Grain Administration. In an accountbook from 1794, the monthly salary of *mubayaacı* assigned for the district of Salonica is recorded as 750 guruş (two-months salary being paid in advance). An annual salary of 9,000 guruş indicates that the post was one of the best-paying positions in the Empire.⁷⁵ The amount was clearly higher than the estimated legal revenues under the share system and minimized the risk arising from natural fluctuations for *mubayaacı*. The center seems to have recognized the importance of paying a salary high enough to retain *mubayaacı*'s interest in keeping his post. The renewal of the position probably correlated with some signal about *mubayaacı*'s performance. Yet, the documents, again, do not offer any information as to how the central administration decided to re-select the *mubayaacı*.

The qualities of *mubayaacı*s, however, become more of an explicit discussion in this period. In 1794/95 register, the desired qualities in *mubayaacı*s are specified as such: intelligent, well-informed about the conditions of local grain owners, trustworthy, efficient, abstinent.⁷⁶ In certain cases, center might threaten *mubayaacı* for dismissal and even imprisonment in cases of neglect or fraud.⁷⁷ But, I have not yet found any case in which a *mubayaacı* or former *mubayaacı* was imprisoned or punished severely. The most common punishment for the *mubayaacı* was not renewing his assignment. The patchy data set with the names of office-holders does not show any *mubayaacı*s keeping their posts for more than one or two years before the establishment of the Grain Administration.⁷⁸ With the establishment of the Grain Administration, however, *mubayaacı*'s account books indicate 3 years appointments where the funds (owed by or owed to the *mubayaacı*) are transferred from one year to another.⁷⁹

75

Note

76 ZD 19 (23/1), (48/1), (190), (191).

77 ZD 19 (158/2).

78 See Appendix

79 KK 2959, KK 5577, D.MKF. 30528, D.MKF. 30988, D.MKF. 31340.

Conclusion

In this paper, I argued that the *mubayaa* mechanism underwent significant changes in the second half of the eighteenth century. These changes indicate that the central authorities did not necessarily make a choice between two systems of redistribution, one based on assignment of local purchasing agents with pre-emptive privileges and other based on merchants and market incentives. At the time they were releasing price controls in grain markets, they adopted measures that would increase the efficiency of the purchasing system through further involvement in the local allocation process and a shift towards a salary-based system. These changes were the result of a combination of factors. The geopolitical difficulties that increased the incentives for smuggling and, as a result, the returns from corruption made a fixed price or share system with little control on rent extraction less preferable. Assignment of purchasing agents as salaried officials, on the other hand, implied an increase in other forms of corruption such as cost-padding. Furthermore, it did not remove the incentives for collusion among local power-holders and *mubayaa*cs (collection of bribes for distorting quota assignments). The changes introduced in this period aimed to undermine such behaviors through office-renewal based on merit, high salaries, and procedural changes in the quota allocation process that encouraged participation of community in the whole process.

MAP 1



APPENDIX 1

ZD 19, nr 19/1, Salonica		
name	source of produce	assigned wheat
Gazi Evranoszade Yusuf Bey evladı	çiftlik, alaka, aşar mahsuları	25000
Evranoszadelerden Abdüssamed Bey	Karaferye'deki alakaları	15000
Rumeli valisi Mustafa Paşa, oğlu, biraderi Hasan Bey	çiftlik ve akaları	30000
Kapucubaşı ve Duhan Gümrüğü Emini Seyyid, damadı Şerif Abdullah ve biraderi Seyyid Mehmed	alakaları mahsulatı	30000
Kapucubaşı Abdüssamed Ağazade Seyyid Yusuf	alakaları mahsulatı	10000
Mülahiden Ahmed Reşid	alakaları mahsulatı	15000
Yeniceli Şerifzade Emin Bey	alakaları mahsulatı	10000
müteveffa Hacı Osman Bey alaka ve çiftliklerini ikrar ve iltizam edenlerden	çiftlik, alaka	12000
Selanik müftüsü Mustafa	alakaları mahsulatı	10000
Hacı Amiş	alakaları mahsulatı	5000
Hacı Derviş	alakaları mahsulatı	5000
hacegandan Ali Arif Bey	alakaları mahsulatı	5000
Mevlevi şeyhi müteveffa Hacı Ahmed ve Hacı Mustafa Ağazade İsmail	alakaları mahsulatı	5000
Sidrekapsi voyvodası	aşar ve mahsulatı	3000
Karaferyeli Yahya Bey	mahsulunden	3000
Selanikli Derviş Ağazade Seyyid İsmail	mahsulunden	3000
Kelemerye nahiyesi ziraatçıleri	mahsulunden	15000
Selanik-Varvadin nahiyesi ziraatçıleri	mahsulunden	20000
Bazargan nahiyesi ziraatçıleri	mahsulunden	15000
Serha nahiyesi ziraatçıleri	mahsulunden	10000
... Nahiyesi ziraatçıleri	mahsulunden	5000
İshak Paşa mütevellisi	mahsulunden	5000
Yakup Paşa mütevellisi	mahsulunden	2000
Sabika başkatip Ahmed Şerif ve biraderzadesi	alakaları mahsulatı	4000
Yeniçeri hasekilerinden Boçkozade Osman Ağa	alakaları mahsulatı	5000
Other	ashab-ı alaka, aşar, erbab-ı çift ve çiftlikat ve anbar	83000
TOTAL		350000

APPENDIX 3

	Year	Source	Price	Unit	Measure	Notes
Salonica	1770-73	D.MKF.30528	60	para	Istanbul Kilesi	miri fiyat
Salonica	4 /1782	C.DH.15995	60	para		
Salonica	11/1789	C.BLD. 7053	6	guruş	Selanik kilesi	
Salonica/Egypt	1795	C.BLD.841	18	guruş	Selanik kilesi	
Salonica/Egypt	1795	C.BLD.841	14	guruş	purchase price	Selanik kilesi
Salonica	1795	ZD 19 (107/1)	2	guruş	Istanbul Kilesi	paid by the mubayaacı
Salonica	1794-95	ZD 19 (156/1)	3	guruş	Istanbul Kilesi	when delivered
Salonica	1794-95	ZD 19 (156/1)	110	para	Istanbul Kilesi	after bargain
Salonica	1794-95	ZD 19 (156/1)	3.5	guruş	Istanbul Kilesi	after bargain
Ağriboz	1794-95	ZD 19 (156/1)	100	para	Istanbul Kilesi	after bargain
Koron/Morea	1794-95	ZD 19 (176/1)	3	guruş	Istanbul Kilesi	
Golos	1794-95	ZD 19 (173/2)	153	para	Istanbul Kilesi	for smugglers
Samsun	1794-95	ZD. 19 (8/1)	3.25	guruş	Istanbul Kilesi	for smugglers
Mihaliç	1794-95	ZD. 19 (11/1)	3.25	guruş	Istanbul Kilesi	
Jaffa	1794-95	ZD 19 (74/2)	66.6	para	Istanbul Kilesi	
Bergos	1794-95	ZD 19 (83/2)	80	para	Bergos kilesi	high-quality
Varna	1794-95	ZD 19 (83/2)	160	para	Varna kilesi	
Danube	1794-95	ZD 19 (83/2)	480	para	İbrail kilesi	Albanian
Danube	1794-95	ZD 19 (83/2)	320	para	İbrail kilesi	Kızılca
Alçaklar	1794-95	ZD 19 (83/2)	110	para	Varna kilesi	Kızılca
Tekfurdağı	1794-95	ZD 19 (85/1)	80	para	Tekfurdağı kilesi	less than Bergos Kilesi
Tekfurdağı	1794-95	ZD 19 (152/1)	90	para	Tekfurdağı kilesi	after bargain
Silivri	1794-95	ZD 19 (85/2)	80	para	Istanbul kilesi	cleaner than T.dagi grain
Silivri	1794-95	ZD 19 (152/1)	100	para	Istanbul Kilesi	after bargain
Silivri	1793-94	ZD 19 (115/1)	3.5	guruş	Istanbul Kilesi	bad harvest
Serres	1794-95	ZD 19 (108/1)	2	guruş	Istanbul Kilesi	
Egypt	1793-95	ZD 19 (111/1)	2.5	riyal	1 erdeb	good harvest
Salonica	1805-06	C.ADL.5290	2	guruş	Istanbul Kilesi	
Salonica	1809-11	KK 5577	60	para	Istanbul Kilesi	miri fiyat
Salonica	1809-10	KK 5577	140	para	Istanbul Kilesi	rayic
Salonica	1810-11	KK 5577	180	para	Istanbul Kilesi	rayic
Salonica	1811-12	KK 5577	180	para	Istanbul Kilesi	rayic

APPENDIX 4

Assignment	Source	Region	Date	Title	Name
mubayaacı	C.BLD. 3763	Salonica	1753		Şerifzade Yusuf Bey
mubayaacı	C.ML. 29505	Salonica	1767		İsmail
mubayaacı	C.ML. 27853	Salonica	1770	kapucubaşı	...Paşazade Ali Bey
mubayaacı	D. MKF. 30528	Salonica	1770-3	kapucubaşı	Hazinedarazade Ali Ağa
mubayaacı	C.BLD.3925	Golos	1773		İsmail
mubayaacı	C.DH.15995	Salonica	1782	kapucubaşı	El-Hac İsmail
mubayaacı	C.BLD.841	Salonica	1788-89	kapucubaşı	Ali Arif Efendi
mubayaacı	C.BLD.7053	Salonica	1789	mevlana	Seyyid Ömer
mubayaacı	C.BLD.3905	Salonica	1790		Zeyn el-Abidin Bey
sir-i rayic nazırı	C.BLD.3905	Salonica	1790		Seyyid Yusuf Bey
mubayaacı	C.ML.29872	Salonica	1790		mir Mehmed
mubayaacı	ZD 19 (106/1), (108/1)	Salonica	1795	kapucubaşı	Mehmed Emin Bey
mubayaacı	KK 2959	Salonica	1795	kapucubaşı	S. Paşazade Mehmed Emin Bey
mubayaacı	C.BLD. 2341	Tırhala	1795	kapucubaşı	Arif Ahmed Paşazade Derviş Abdullah Bey
mubayaacı	ZD 19 (173/2)	Golos	1795	kapucubaşı	Derviş Abdullah Bey
mubayaacı	C.BLD.3802	Salonica	1796-8	kapucubaşı	Seyyid Abdülkerim Bey
mubayaacı	C.BLD. 6647	Salonica	1800		Şerifzade Şerif Mehmed Emin Bey
mubayaacı	C.BLD. 6648	Salonica	1800	kapucubaşı	Seyyid Abdülkerim Bey
mübaşir	C.BLD. 6649	Salonica	1800	kapucubaşı	Hüseyin Bey
mubayaacı	C.BLD.3802	Salonica	1800		Şerifzade Şerif Mehmed Emin Bey
mübaşir	C.BLD.3802	Salonica	1800	kapucubaşı	Cihanzade Hüseyin
mübaşir	C.BLD.3803	Salonica	1800	kapucubaşı	Cihanzade Hüseyin
mubayaacı	C.BLD.841	Salonica	1804	kapucubaşı	Emin Bey
mubayaacı	KK 5577	Salonica	1809-12	kapucubaşı	Yusuf Bey
mubayaacı	KK 5577	Golos	1810-13	kapucubaşı	El-Hac Mehmed Emin Ağa