

## **Economic and Financial Crises in Fifteenth-Century Egypt: Lessons from the History**

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*The present paper attempts to study the economic and financial crises of fifteenth-century Egypt, which was ruled by Mamluk dynasty. During the fifteenth century, especially in its first half, Egypt faced horrible economic crisis caused sometimes by rulers' ill-governance and corruptions and sometimes by natural catastrophe such as over flooding of Nile or its drying up, outbreak of epidemics, crop diseases, etc. In many cases two or more factors simultaneously existed. Financial crisis mainly emanated from monetary mismanagement. Two social thinkers of the time – al-Maqrizi at the beginning of the century and al-Asadi at the middle – addressed the situation. They analyzed the problem, pointed out the causes, and suggested remedies. For al-Maqrizi, the deterioration of Egypt's monetary system was the single most important cause of its economic and financial difficulties. As a panacea, he prescribed a return to gold and silver standard and restricting copper coinage to petty transactions. Al-Maqrizi did not realize that the reason for wide spread of copper money was Egypt's dependence on import of precious metals, especially silver, from Europe which was adversely affected in the fifteenth century known as "silver famine". Al-Asadi divided the factors responsible for economic and financial crises of his time into two main categories – socio-economic factor and monetary factor. In the former category he included neglect of agriculture, disturbances of bedouins, oppression of farmers, and sales of government positions. As far the monetary factor is concerned, he dealt it separately and held the bad currency system as the reason behind the high prices which disturbed the whole economy. Al-Asadi did not confine his analysis to monetary problem only. He advocated for an overall reform and strict management of the whole economy, monetary aspect being one of them. He did not restrict money to gold and silver. To him precious metals and copper, all have their utility as money and all can be used at the same time. However, issue of money and minting of coins should be in such a way structured that the counterfeiting and debasement is checked. The main financial problem, in his opinion, was debasement of currency leading to unrestricted supply of money, not the dominance of copper coins. The paper concludes with an appraisal of their diagnosis of the problem, the solution suggested by them and the lessons learned from them.*

**Keywords:** Economic and financial crises. Return to gold and silver money. Economic ideas of al-Maqrizi and al-Asadi. Fifteenth-century Egypt. Inflation in the history of Islam. Monetary mismanagement. Mamluk economics.

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## Introduction

The context of the present paper is the recent financial crisis which has drawn attention to search a parallel in the past at various stages of history. In this background some scholars threw a cursory glance at the Muslim history and hurriedly concluded that "It was the period when the poverty was non-existent. Basic needs of every one were met. No one was "poor" enough to look forward to receive charity. Worldwide famine type situations were intelligently and successfully dealt with. *There is no evidence of financial and economic crisis in the long history (of Islam) spread over about 1000 years*" (Khan, 2009, emphasis added). In fact the economic history of Muslim states largely remained unexplored. Absence of knowledge does not mean absence of existence. There are instances of economic and financial crises even in Islamic history. But the causes and intensity and frequency have not been the same which we experience these days. The present paper aims to study the economic and financial crises of fifteenth-century (corresponding to ninth-century Hijrah) Egypt which was ruled by Mamluk dynasty.<sup>1</sup> In this respect the paper specially attempts to examine the contributions of two social thinkers of the time – al-Maqrizi at the beginning of the century and al-Asadi at the middle – who analyzed the situation, pointed out the causes, and suggested remedies. It will conclude with an appraisal of their diagnosis of the problem, the solution suggested by them and check their relevance in the present day situation. To provide a back ground knowledge of fifteenth-century Egypt, the papers begins with an overview of its political and socio-economic conditions.

### Fifteenth-century Egypt: An overview

The Mamluk<sup>2</sup> sultans established their rules both in Egypt and Syria, Cairo being their capital. They were originally troops of slave- status enlisted to sustain Ayyubid power. After they took control of Egypt, they achieved the re-conquest of the last of the Crusader kingdoms in the Levant, and defeated the Mongols at the critical battle of Ayn Jalut in 658/1260.

The Mamluk sultan Zahir Baybars (1260-77) installed an Abbasid *amir* as caliph at Cairo, who survived the Mongol massacre in Baghdad in 1258. This made the Mamluk government the focus of Islamic world. Even Indian kings obtained their titles of sovereignty from the Abbasid caliph in Egypt. Many European kings extended the hand of friendship towards the Egyptian sultans, and they exchanged ambassadors. Some of them signed treaty for defense and trading purposes. (Lane-Poole, 1925, p. 281; Muir, 1896, p. 38). Both Cairo and Damascus became the centre of Islamic culture and learning after destruction of Baghdad by Mongols in 656/1258.

It seems that in the ninth/fifteenth century Muslim social thinking reached its peak when Egypt saw scholars like Ibn Khaldun (d. 808/1406), al-Maqrizi (d. 845/1442), al-Asadi (9<sup>th</sup>/15<sup>th</sup> century), Ibn al-Azraq (d. 896/1489) and al-Syuti (d. 911/1506). For many succeeding centuries we could not see an intellectual scholarship of that stature in that number.

Fifteenth-century Egypt falls under the dynasty of *Burji* or Circassian Mamluks (784-923/1382-1517).<sup>3</sup> The Mamluk society was stratified into four distinct classes – the ruling class. Public administrators, educators and scholars representing the link

between the rulers and the general public, then the rich class of traders and merchants and finally the group made up of the rest – farmers, labourers, craftsmen, small shopkeepers and the poor masses. As we shall see below, al-Maqrizi divides the population into seven categories to examine the effects of economic and financial crises on Egyptian people. The *fallahin* (plural of *fallah*, farmers or land tillers) were in majority and about the worst economically as they were subject to multiple taxes. (Ibn Iyas, 1960, Vol. 2, p. 30). Al-Maqrizi saw the detrimental effect of excessive taxation and decline in collection – an idea that came to be known as Laffer's Curves in the Twentieth Century. When inhabitants are overburdened by increasing taxes, the revenue collections decrease because people abandon cultivation, leave farming and migrate from the area (al-Maqrizi, *al-Suluk*, 4:791-95; idem. *Ighathah*, p. 44).

Fifteenth-century Egypt saw number of outbreak of plague which led to demographic crisis. Depopulation led to decreased economic productivity (Shoshan, 1982, p. 97); while demand for health care during the epidemics increased, the fee of the physicians augmented many fold (al-Maqrizi, *Ighathah*, p. 35). Plague which started in 1403 remained for three years and destroyed forty villages. Death toll is estimated variously as one-third, one-half, two-third or 60 percent of the population. As an average it occurred every 1.7 years. Most destructive were those which spread during 809/1406, 822/1419, and 833/1429 (Nasir, 2003, p. 91). For some writers 'the complex economic problem of the later Mamluk period remains largely a population problem' (Shoshan, 1982, p. 98). In the opinion of Udovitch also, demographic decline due to frequent occurrence of plague was the main factor behind the serious decline of all the economic sectors – agriculture, industry and commerce (Lopez, Miskimin and Udovitch, 1970, pp. 115, 121).

The size of population is, no doubt, a major determinant of the level of prices, but there are other factors which also play a part, including the amount of money in the nation and, as the economists put it, the velocity of its circulation. The period after the onslaught of the Black Death witnessed an increase of more than 100 percent in the wages of workers – both skilled and unskilled – due to shortage of man power (al-Maqrizi, *Ighathah*, 1957, p. 75). This must have affected the prices of their products.

Egypt's agriculture has been traditionally based on rise of the Nile. Whenever it was delayed, a famine-like situation arose. Ibn Iyas never fails to report the level of its rise each season and its consequences on economic life. There was no technique to manage and utilize the rain water. Whenever, it rained heavily it caused more damage than benefit. Historians of the period note many such occasions when rain created havoc, closure of markets and destruction of crops (Ibn Iyas, 4: 193, 198, 199, 206; Ibn Tulun, p. 348). Rise and fall of Nile level was a matter of great speculations. Whenever Nile delayed in rising to its plentitude-level in Egypt, or rainfall did not come in time in other part of the sultanate, producers, sellers, middlemen all started hoarding for the coming tough days, which multiplied the shortage and suffering. On the contrary, a little change in Nile's water level and rainfall to the best hope of people, brought ease and decrease in prices (al-Maqrizi, *al-Suluk*, 4: 318, 330).

In some of the years of famine, the farmers could not cultivate land as they were unable to manage seeds (al-Maqrizi, *Ighathah*, pp. 41-42; 44-45). The evil of lending seeds to the farmers at 11% interest are also reported (al-Nuwayry, *Nihayat*, vol. 8, p. 252). Al-Asadi also writes that when farmers came from village to the city to deposit

agricultural taxes, the banker or the goldsmith checked and evaluated their amount of money in a deceitful manner that their money fell short of the required amount to such an extent that they were forced to borrow money from him on interest to pay their obligations (al-Asadi, 1967, p. 122.).

Long ago Ibn al-Qayyim (d.751/1350), in the early Mamluk period, wrote: “Some people try to practice interest: they use the term “*al-mu`amalah*” (business or transaction) instead of interest, and change its form by introducing a middle man or a pretended sale and repurchase transaction” (Ibn al-Qayyim, 1320 H., P. 191). He meant *'inah* and *tawarruq*. He denounced this legal fiction.

Since Egypt and Syria were located at the centre of world trading route, international trade and commerce always existed there. However, due to frequent currency changes and debasement, it was adversely affected (al-Maqrizi, *al-Suluk*, vol. 3, p. 281; vol. 4, p. 437). Merchandises were sent through Makkah from India to Alexandria and thence to Europe. However, during the fifteenth century monopolization of major trade articles by some of the Mamluk Sultans hard hit the foreign trade. It discouraged the private traders and retailers. Fifteenth-century also saw the end of Karimi merchants who could prove a contending force against European mercantilists had they received the state patronage (Islahi, 2009, pp. 91-92).

Mamluk history is full of instances of monetary mismanagements. As early as in eighth/fourteenth century Mamluk rulers used debasement and unrestricted money expansion to meet the deficit in their spending. The great scholar of early Mamluk period Ibn Taymiyah (663-728/1261-1328) who witnessed the turmoil resulted due to debasement practiced by Mamluk rulers of his time suggested that, ‘the authority should mint the coins (other than gold and silver) according to the just value of people’s transactions without any injustice to them’ (Ibn Taymiyah 1963, Vol. 29, p. 469). Ibn Taymiyah advised the ruler, not to start business in money by purchasing copper and minting coins and thus doing business with them ..... He should mint coins of real value without aiming at any profit by so doing (Islahi, 1988, p. 141). The story was repeated during our study period also.

Generally three kinds of monetary units – *dinar* (gold), *dirham* (silver) and *fals* (copper coin, plural=*fulus*) circulated. While the *dinar* was very scarce, the *fals* was the predominant coin. Circulation of dirhams always fluctuated. At the beginning of the Mamluk era the dirham contained two-third of silver and one third of copper. But in the course of time the proportions were reversed (al-Qalqshandi, 1913, vol. 3, p. 443).

One of the reasons why Mamluk Sultans resorted to copper money was lack of their own resources of precious metals, and the same was reason for the spread and dominance of European gold money in Egypt. Shoshan, a specialist of Mamluk monetary system, observes that the reason for wide spread of copper money was Egypt's dependence on import of precious metals, especially silver, from Europe which was adversely affected in the fifteenth century known as "silver famine" (Shoshan, 1982, pp. 98-103).

Like currency in Mamluk regime, prices were also highly unstable. The first half of fifteenth century saw frequent rise of prices of grains, especially during the years

1403-1405, 14015, 1419-1421, 1425, 1428, and 1449-53 (Nasir, 2003, p. 254). Apart from monetary expansion, decrease in agricultural product was the major factor for the increase in prices of foodstuffs. For example, when Nile did not rise to the desired level in 1403 and in 1415 and all the grain storage emptied, prices increased to a very high level (al-Maqrizi, *al-Suluk*, vol. 4, p. 338). In Many cases, the reason for rise in prices was hoarding and speculative practice by traders, thus creating artificial shortage, and monopolization of trade by elites and rulers worsened the situation many fold (al-Maqrizi, *al-Suluk*, vol. 4, pp. 691, 711, 782-83). Examples of efforts by some of the sultans to fix the prices of essential goods and subject the offender to punishments are also not rare (al-Maqrizi, *al-Suluk*, vol. 3, p. 818; vol. 4, pp. 334-35).

In Mamluk period scope of *hisbah* (market supervision) was widened and collection of certain duties was included in its functions. Due to corruption on a grand scale in the government and in its institutions, the *hisbah* also became a profit earning office for the *muhtasib* (the in charge of *hisbah*). Instances are reported when a person offered bribery to obtain the position of *muhtasib*. In such a situation generally the office was held by those who lacked the basic qualities for that position. Sometimes *muhtasib* accepted bribery to ignore his duty of price checking (Ibn Iyas, 4: 378, Ibn Tulun, p. 216; al-Jaziri, pp. 1000, 1144). Whenever an honest market officer was appointed the situation improved and objective was achieved. Otherwise, it defeated the purpose. Examples are also found when price control resulted in black marketing or further shortage (al-Jaziri, p. 978). Subsidy and rationing was adopted to solve the problem of shortage arising out of administrative fixation of the price (ibid. p. 1164).

Al-Maqrizi notes the extravagance and misappropriation of public treasury by the rulers. Silk Carpets were laid down for the sultan to walk over from his residence to the fort while people were suffering from hard living (al-Maqrizi, *al-Suluk*, vol. 3, p. 1016). Deficit was also met by debasement of currency, issue of copper money (ibid. vol. 4, p. 27), and through auction of government offices (al-Maqriz, *Ighthah*, p. 43).

### **Economic and financial crises**

During the fifteenth century, especially in its first half, Egypt faced horrible economic crisis caused by rulers' ill-governance and corruptions sometimes and sometimes by natural catastrophe such as over flooding of Nile or its drying up, outbreak of epidemics, crop diseases etc. as noted above. In many cases two or more factors simultaneously existed. Financial crisis mainly emanated from monetary mismanagement which adversely affected people's lending and borrowing, saving and investment, trade and commerce, production and consumption, exchange and distribution, etc. From such situations both ruling class and common man suffered but the suffering of the latter was many fold greater as the rulers tried to recoup resources by imposition of regressive taxes, monopolizations of business and hoarding of foodstuffs. The most affected class was that of small farmers, labors, and artisans.

The profound change in Egypt's monetary system had affected the Egyptian economy throughout the larger part of the fifteen century. It was manifested at around the year 1400 in the emergence of copper money as the country's basic currency instead of the two precious metals, gold and silver. Copper money no more remained the poor man's money (al-Maqrizi, *al-Suluk*, vol. 4, pp. 165, 205, 280, 306; idem. *Ighathah*, p. 71).

Situation so much worsened that the chief justice of Cairo was forced to decree that money quoted in deeds and contracts should be specified in terms of copper *fulus* (al-Maqrizi, *al-Suluk*, vol. 3 p. 1117). It became almost the only means of payment for domestic transactions. However, foreign trade required gold or silver coins.

In 1403 it was officially announced to deal in *fulus* by weight only. This was because of decreasing weight of *fulus* due to cutting and shedding. In the fourteenth century it weighed 4.25 grams. In early fifteenth century it ranged between 1.5 and 3 grams, 1982, p. 108). Not only weight but quality of metallic contents also declined by mixing iron and lead (al-Maqrizi, *al-Suluk*, vol. 4, pp. 549, 623-30). One clear reason for this malpractice was decline of the quantity of copper which was caused due to wear and tear, its increasing use for utensils, and its outflow to other countries (Shoshan, 1982, pp. 110-111). "The copper dirham of account"<sup>4</sup> was substantially devalued between 1402 and 1404, but later on remained stable until 1423. Thereafter, until 1450, debasement was accelerated again. Thus, in 1429 and 1435 the money of account was devalued by about 50 per cent, and in 1448 by 30 per cent (Shoshan, 1983, p. 59).

Al-Suyuti, the great scholar of late Mamluk period, notes that during the year 821/1414, the *fulus* became expensive after being abundant and cheap. It became very difficult for those who were indebted to repay their loans in term of *fulus*. Earlier, the *fulus* had had an exchange rate of 8:1 or 9:1 to the *dirham*; and they had an exchange rate with *aflori dinar* 260:1, with the *harjah* 280:1, with the *nasiri* 210:1, and with the *Egyptian qintar* 600:1 (1 qintar fulus=100 Egyptian *ratl*). After the *fulus* became expensive, their exchange rate to the *dirham* became 7:1. As far *dinar* is concerned, all kinds of it – *aflori*, *harjah*, *nasiri*, and *Egyptian qintar* - lost fifty *fulus* in exchange. That is, an exchange rate with the *aflori dinar* of 210:1, with the *harjah* of 230:1, with the *nasiri* of 160:1, and with the *Egyptian qintar* of 550:1. The situation was reversed at the end of the century when it was announced that 30 *dirham* would be exchanged for one *ratl* (450 grams) *fulus*, while earlier 36 *dirhams* were exchanged for a *ratl fulus*. (al-Suyuti, 2000, p. 96). This seems to be an improvement in the metallic content of the copper coin.

As we noted above, debasement severely affected the lending and borrowing relations. It benefited the debtors to the detriment of lender as it diminished the value of dirham of account (*dirham min al-fulus*). This led to frequent controversies. Here is an example. In 1429, following one of the periodic change in the value of dirham of account, its value declined to one-third as compared to its value in 1403. Debtors tried to return their loans according to the newly established value of dirham to *ratl* of *fulus*, which meant paying less than would have to pay earlier. Creditors insisted that the debts should be settled according to the value at the time of contract. The problem generated a debate among legal scholars which was finally resolved in an opinion given by Cairo's chief justice. He decreed that in every document sums of money had to be specified in gold or silver terms only (al-Maqrizi, *al-Suluk*, vol. 4, 795). In this way he abrogated the decree issued in 1403, noted above, which had recognized the copper money as the basis for all kinds of contracts.

Increasing costs and falling profits discouraged investment (al-Maqrizi, *Ighathah*, p. 47). For example, cost of collection of flowers exceeded revenue obtained by selling them. This adversely affected horticulture (al-Maqrizi, *Khitat*, vol. 2, p. 24). In many

cases ready crops could not be harvested due to high wages (al-Maqrizi, *al-Suluk*, vol. 4, p. 179); Both al-Maqrizi (*al-Suluk*, vol. 4, p. 225) and al-Asadi (*al-Taysir*, p. 92) blame the Sultan for negligence of land development and irrigation facilities which badly affected the farming and agricultural product. The latter provided data of this decline (ibid. 93). A major portion of arable lands was granted to army and ruling elites who exploited the tenants (al-Qalqashandi, *Subh al-A`sha*, vol. 3, p. 451).

### **Al-Maqrizi<sup>5</sup> on causes and remedy of the crisis**

Distressed by Egypt's acute economic and financial crises, in the early years of fifteenth century, al-Maqrizi authored his famous work *Ighathat al-Ummah bi Kashf al-Ghummah* (briefly quoted in this paper as *Ighathah*)<sup>6</sup> in the year 808/1405. The main theme of the book is the high price (*al-ghala'*) and economic fluctuations of the early 15<sup>th</sup> century in Egypt arising out of wrong political, economic and monetary policies of the Mamluk sultan. He criticized the excessive coinage of copper *fulus*, the cessation of gold and silver coinage and the adoption in 806/1403 the dirham of *fulus* as a unit of account. He believed that the Egyptian ruler deliberately stopped the minting of silver (al-Maqrizi, *al-Suluk*, 4: 28-29)."

***Difference between the past and present crises.*** While describing the economic crisis of his time, al-Maqrizi gives an account of the past periods of inflation and bygone disastrous years. He visualizes that the difference between past incidences of high prices, famine and starvation and the present ordeals is that in the past generally they occurred because of natural calamity, such as paucity of rain, failure of Nile to reach its plentitude-level, spread of epidemics, etc. The government intervention could have diluted the impact of those crises through forcing the hoarders and speculators to release grains, or by imposing price control or by importing grains from unaffected areas. But the existing ordeals (in 808/1405) befallen Egypt is due to human fault (al-Maqrizi, *Ighathah*, pp. 4, 41).

As al-Maqrizi himself writes, his intention in this book is to discuss the factors behind the prevailing worst situation of the Egyptian economy and its ruining effects and to prescribe the remedy (al-Maqrizi, *Ighathah*, 1940, pp. 3-4). He says: "Anyone who takes the stock of the situation will realize that the people's suffering is due to malfeasance of the rulers and the leaders and their negligence of people's welfare. This is not like what dearth and destruction occurred in the past" (ibid. p. 4).

According to al-Maqrizi, there were three main factors behind this sad situation – political, economic and monetary instability. He gives a brief account of those factors: First, government, judiciary and administrative posts are obtained through bribery. Second, high cost of land and consequently very high cost of production; the rent has increased ten times what it used to be before these events. Third, debasement of the currency and unrestricted supply of *fulus* (copper coins) (ibid. pp. 43, 45, 47). Perhaps, to him the most important of all these three factors was the last one which he dealt most extensively. He concentrates on coinage in Islam and writes its detailed history up to his own time to point out how deviant is coinage system of his own age and advocates for reform in the existing monetary structure.

Al-Maqrizi claims that gold had been the only money in Egypt in pre-Islamic period as well as in Islam. It is Europeans<sup>7</sup> who introduced *dirhams* after their occupation (ibid. p. 23). The situation worsened when copper coins became the main currency during the early Circassian Mamluk regime. In his opinion, this unrestricted expansion of copper money resulted into high inflation. He seems to have an idea of relation between quantity of money and prices. In the events of 806/1404 he writes that gold coins have been cancelled. Gold price increased from 20 dirham a *mithqal* to 240 *dirhams* (al-Maqrizi, *al-Suluk*, vol. 4, p. 27, 306).

Monetary situation improved during the sultan al-Mu'ayyad Shaykh (d. 824/1421) who carried monetary reform at the suggestion of al-Maqrizi to whom the latter presented his treatise on money *Shudhur al-'Uqud*. Sultan al-Mu'ayyad minted dirham of silver and after a gap of thirty years first time in Egypt dirham of pure silver circulated (ibid. p. 289). Al-Maqrizi praises the Sultan for this reform. However, worsening situation of money continued, *fulus* dominated the scene and value of al-Mu'ayyad's silver dirham was still mentioned in term of copper *fulus*. He suggests the Sultan certain measures how to correct this shameful situation (ibid. pp. 31-36).

Al-Maqrizi considers gold and silver as real and natural money. He supports his stand by the fact that each nation used them as money. The Prophet (peace be upon him) mentioned *zakah* in term of silver *dirhams* (al-Maqrizi, *Ighathah*, p. 51). He claims that since the known history of mankind only gold and silver were used as money, and the system worked smoothly. This does not mean that al-Maqrizi is unaware of the evolution of money. He accepts that various nations have used different commodities as medium of exchange such as eggs, loaves of bread, leaves, skins of trees, cowries, etc., but to him all these substances of money were for petty sale and purchase. They never assumed the status of legal tender or fiat money. The situation was completely changed in the year 806/1403 when the copper coins became the dominant form of money. Even the value of gold *dinar* was expressed in term of copper dirham, used as unit of account.

***Impact of the financial crisis on various sections of the society.*** Al-Maqrizi examines the impact of the crisis on different sections of the society. For this purpose he classifies the entire population into seven categories. Al-Maqrizi has very clear concept of money income and real income when he says that though the rulers, rich merchants, and small shopkeepers, in the first second and third categories respectively, receive much greater amount, their condition is no more better than what it used to be because they could buy only smaller quantities. The fourth category, cultivators and land tillers, who could irrigate their crops during the years of drought, increased their fortunes. Al-Maqrizi has the idea that during the inflation, the group of people who have fixed income are hard hit as is the case of fifth category that consists of jurists, scholars, and circle army. The sixth category, manufacturers, artisans and wage earners, benefit because their income is not fixed. They are getting enhanced wages especially because majority population of this group has died of plague. Finally the poor and needy (the seventh category) have already perished and the remaining are near to annihilation (al-Maqrizi, *Ighathah*, pp. 73-75). In the last he presents his proposal to redress the situation. His solution is to revert to the silver coinage and to base the currency on gold and silver only (ibid. pp. 80-81).



To sum up, for al-Maqrizi, the deterioration of its monetary system was the single most important cause of Egypt's economic and financial difficulties. As a panacea, he prescribed a return to gold and silver standard and relegation of copper coinage to the role that God and custom had ordained for it, viz., restricting it to petty transactions (al-Maqrizi, *Ighathah*, p. 47).

### **Al-Asadi on causes and remedy of the crisis**

After the second decade of fifteenth century, economic condition stabilized for the next two decades before experiencing again similar crisis around the midcentury. The intensity of the midcentury economic crisis can be imagined by the fact that in Ramadan 855/1452, meat and cheese disappeared from the market and wheat price reached seven *Ashrafi* per *irdabb* (about 70 kilograms). This situation continued for four year before returning to the normalcy (Ibn Iyas, vol. 2, p. 291). Economic and Financial Crisis distressed the population. Due to high grain prices, it became difficult for farmers to get seeds (*ibid.* 435). People looted shopkeepers in the market (*ibid.* 411). At that time another scholar Muhammad b. Khalil al-Asadi<sup>8</sup>, a contemporary of al-Maqrizi from Syria, addressed the economic and financial crisis and the prevailing inflation in the year 855/1451. It is not known whether he was aware of and influenced by al-Maqrizi's work. He studied the decayed economic condition of his time arising out of decrease in production, rise in prices, widening gap in the income of various sections of the society, drought and starvation, flight of peasants and workers. He laments the terrible economic condition and divides the factors responsible for the existing economic and financial crises into two main categories – socio-economic factor and monetary factor. In the former category he includes neglect of agriculture, disturbances of bedouins, oppression of farmers, and sales of government positions (al-Asadi, *al-Taysir*, 1967, pp. 92-96). He considers the existence of coercion, tyranny and oppression as the most damaging factor in development activities and exhorts to eliminate them (*ibid.*, p. 93). The foreign trade was also adversely affected because of various custom duties charged from the merchants (*ibid.* pp. 83-84). Sale and purchase of positions was a common source of corruption. Those who obtained a position through bribery, their first and main concern was to get back their money and then earn the additional amount. He recommends formulation of a just wages policy (*ibid.*, pp. 182-83).

As far monetary factor is concerned, he deals it separately and holds that the bad currency system is the reason behind the high price (*al-ghala'*). In addition to monetary factor, he notes irresponsible role of *hisbah*, un-standardized weights and measures, hoarding and monopoly, and middlemanship. His proposals to solve these issues include correction of weights and measures, monetary reform, rationing of foodstuffs and increase in production (*ibid.*, pp. 115-146).

According to him, at the government level, the corruption emanates, on the one hand, from ignorance of Shari`ah sources of income, like *zakah*, *kharaj*, *jizyah*, *ushr*, *khumus*, etc. and resorting to various non-Shariah taxes, on the other hand (al-Asadi, *al-Taysir*, pp. 78-79). He says that apparently the income derived in this way is considered as supporting and beneficial to the ruler but in fact it is not. It weakens the foundation of the sultanate (*ibid.*). Over and above is the fact that these public incomes are not spent on productive heads and building of infrastructure for the

development of the economy. He cites an example: "A village belonging to *bayt al-mal* that could support ten military personnel and their families was granted by the authority to his relative with no return to the public treasury. Had it been retained by the government and that relative was provided with sustenance from the *bayt al-mal* according to Shari'ah rules, it would have proved better" (*ibid.*, pp. 81-82). He expresses his concern for development programs and emphasizes on undertaking of development activities like improvement of lands, excavation of canals and provision of water resources, removal of obstacles in cultivation of fields, building of irrigation system and bridges, management of drainage and floods in every region as was the practice from the early Islamic period throughout this period till gradually corruption prevailed (*ibid.*, p. 93)

***Al-Asadi's measurement of inflation.*** Al-Asadi tries to calculate inflation rate. To him if wheat price is one dinar per *irdabb* (about 70 kilograms) in Egypt, one *ratl* (450g) Egyptian bread is available at one copper dirham, This he considers a normal rate. If wheat is sold at 2 dinars per *irdabb*, the price of one *ratl* bread will be two dirham. This he considers as *ghala*<sup>9</sup> (inflation) or highly abnormal price. On the other hand if price goes below one dinar per *irdabb*, the *rakha'* or low price will be at the same rate. He never saw price of bread had gone below one *ratl* per dirham even if wheat price went below one dinar<sup>10</sup> as it happened during the Ashrafiyah<sup>11</sup> and Zahiriyah<sup>12</sup> regimes when one *irdabb* wheat was sold at one hundred copper dihrum of account (*dirham min al-fulus*), i.e. 40% of dinar; it means at less than half a dinar. Even sometimes its price decreased to 3 *irdabbs* per dinar (al-Asadi, *al-Taysir*, p. 143).<sup>13</sup> In the year 854/1450 when he started writing his treatise price of bread reached to 6 dirham per *ratl*. Then it jumped to 8 dirham per *ratl* of bread. This means 600 to 800 percent price rise (*ghala'*). However, people got some relief when next year, Ramadan 855/1451 the price fell down and ranged between 4 to 5 dirham per *ratl* of bread. This happened in spite of ware houses being full of grains because of hoarding and hiding.

It may be pointed out that al-Asadi measured the price rise by taking an important and essential commodity, the bread. This perhaps represented the other commodities as well. Had he included a basket of commodities, he would have been considered the first economist who guided to the measurement of inflation.

***Poverty into plenty.*** There were many reasons for rising price in spite of granary being full such as men blocking the arrival of grain in the open market, hoarding and hiding grain by flour grinders and storekeepers, adulteration, and monopolies enjoyed by certain sections (al-Asadi, *al-Taysir*, pp. 143-44). He presented the case of foodstuffs, being a necessary good, just an example. The same situation prevailed in all kind of commodities (*ibid.*, p. 145).

***His suggestions for monetary and economic reform.*** Al-Asadi recommends issue of gold and silver coins of four denominations: a coin of full standard weight, its half, quarter and one eights. This will facilitate all kind of transaction. Copper coins (*fulus*) may also be used for daily small purchases. But they should be issued by the sultan, to put a check on uncontrolled expansion. Al-Asadi believes that undue price increase (*ghala'*) due to debased currency will be controlled after monetary reforms suggested by him (al-Asadi, *al-Taysir*, pp. 129-30). Al-Asadi does not insist on limiting money

to precious metals. The other metals can work and should work as money but they must be controlled by the government.

According to al-Asadi, attention should be paid to properly manage the non-monetary factors also. For example, to ensure the supplies and keep the price stable the officials concerned must calculate what quantity of foodstuffs each city and village daily needs. Then on the basis of that calculate the requirement for a month and for the whole year. When crop is ready, acquire the quantity such calculated and the provision for the seeds, and leave the rest to be sold in the free market. The stored grains must be brought to the market whenever required. This would ensure flow of supply that would keep the prices at the normal level. (al-Asadi, *al-Taysir*, pp. 141-42). To prove this point he presents a statistical model of Egypt and Cairo. He says that if in this way calculated, it will appear that Egypt and Cairo need 360,000 *irdabb* (one *irdabb* = about 70 kilograms) wheat each year and that quantity can be obtained from one *kurah* (district) only whereas in Egyptian territory there were originally 103 such *Kurah*; now remained 84 only (*ibid.*, pp. 142-43). In this way al-Asadi may be considered the inventor of quantitative analysis in the history of Islamic economic thought. But his quantitative model, to the best of our knowledge, could not be further improved.

### Comparison and appraisal

We have seen in the preceding pages that fifteenth century Egypt passed through a period of economic difficulties. Especially its beginning and midcentury saw severe economic and financial crises which were addressed by al-Maqrizi and al-Asadi respectively. In the opinions of both scholars, Egypt's economic difficulties were due to incompetent and corrupt administration, oppressive taxation, increasing Bedouin's encroachments on agricultural areas, the flight of the rural population, the loss of cultivated lands to the desert, disruption of lucrative long distance trade and to a debased monetary system in which copper coins predominated and coins of the precious metals were exceedingly rare. In the opinion of al-Maqrizi, the deterioration of its monetary system was the single most important cause of Egypt's economic difficulties. Therefore he dealt extensively with this aspect of the economy and advocated for return to gold and silver standard and restricting copper coinage to petty transactions only.

Many experts of the economic history of fifteenth-century Egypt do not agree with the analysis of al-Maqrizi. For example, Udovitch observes: "What Maqrizi did not, and possibly could not understand was that Egypt's monetary problems were not the result of its unfortunate financial policy, but a manifestation of its unfavourable position in the international trade" (Lopez, Miskimin and Udovitch, 1970, pp. 123-24). Thus, the issue of copper coins was not due to corruption but because of compulsion, as Egypt lost its stock of precious metals and was passing through a period of 'silver famine'. Egypt did not have its own mines of silver. It depended for supply of precious metal on external sources: West Africa for gold and Europe and Central Asia for silver (Ashtor, 1976, PP. 291-92). Favourable trade balance and arrival of pilgrims constituted two major streams of supply of these metals. Any disturbance in these two sources had drastic effects on monetary matters of Egypt. Towards the year 1400 the flow of Western silver eastward is reported to have been only a trickle; there were

some contemporary claims that the traditional direction of the silver movement from West to East, was reversed, and that the '*métal blanc*' started to flow westward instead (*Shudhur al-Uqud*, 1967, 39). Contraction of the sources of Egypt's precious metals supply and its unfavourable balance of trade caused the loss of gold and silver during fifteenth century (Lopez, Miskimin and Udovitch, 1970, pp 126-28). It was 'the shortage of gold and silver which led to the abundant monetization of copper.' (ibid. pp. 125-26).

Al-Asadi experienced scarcity in plenty; prices rose in the wake of granary being full of foodstuffs. This means it was not time of famine or starvation. Nor was the corrupt monetary system the sole cause of inflation. Al-Asadi was not only against debasement, but also against leaving any chance for the public to play with the quality and quantity of money issued by the state. He foresaw the detrimental effects of such activities on the economy. It is, therefore, that he suggests issue of coins with 100 percent purity, and standardized shape and weight that could not be tempered with (al-Asadi, *al-Taysir*, pp. 129-33).

Al-Maqrizi concentrated on monetary phenomenon only. Measures to solve other socio-economic problems, and increase production could not get his due attention. Al-Asadi does not confine his analysis to monetary problem only. He advocated for overall reform and strict management of the whole economy, monetary aspect being one of them. He stressed upon maintenance of peace and security and healthy environment conducive to efficient economic activities. He emphasized not only proper distribution of the cake but also suggested measures for enlargement of the size of cake and its equitable distribution. He does not restrict money to gold and silver. To him precious metals and copper, all have their utility as money and all can be used at the same time. However, issue of money and minting of coins should be in such a way structured that they cannot be copied and debasement is avoided. The main financial problem, in his opinion, was debasement of currency leading to unrestricted supply of money, not the dominance of copper coins.

### **Concluding remarks**

Al-Maqrizi believed that the major factor behind economic and financial crisis of fifteenth century Egypt was its corrupt monetary system and the ruler deliberately stopped the minting coins of precious metals and called for return to bimetallic standard. But the history of the period shows that it is because of short supply of silver that 'copper emerged as Egypt's most widely used currency'. This was the reason for the dominance of copper *fulus* in the first half of the fifteenth century.

Being a champion advocate of a monetary system based on precious metals, al-Maqrizi has been extensively quoted in the present day controversy of gold *dinar*.<sup>14</sup> But the empirical study of the past has shown that it is no guarantee that gold money will succeed in all circumstances. Reliance on issue of copper money in al-Maqrizi's time was due to lack of precious metals. This made his panacea irrelevant to his own time. Surely, it has no relevance in today's complex situation of economy and finance.<sup>15</sup> It may be noted that Sultan Mu'ayyad Shaykh, to whom al-Maqrizi presented his treatise on money *Shudhur al-Uqud fi Dhikr al-Nuqud*, implemented the latter's recommendations and issued silver dirham in 818/1415 known as al-

Mu'ayyadi.<sup>16</sup> But the outcome was not as al-Maqrizi expected. He expresses his dismay and counts it a 'shameful situation' that the value of dirham is attributed to copper *fulus*, not the other way round (al-Maqrizi, *Shudhur*, pp. 35-39). In fact, there was not sufficient silver coinage due to shortage of silver in Egypt. Therefore Shaykh's initiative to restore the traditional role of silver did not succeed.<sup>17</sup> People did not stop use of copper in bulk. Since their all exchange needs were fulfilled by copper money, they did not bother Mu'ayyadi dirhams. Copper coins predominated in internal circulation and on all levels of transactions. The result was that in 826/1423, the successor of Mu'ayyad Shaykh had to renounce the silver coins and return to 'copper standard' (al-Maqrizi, *al-Suluk*, vol. 4, pp. 629-30).

It is also proved that the economic and financial crises during fifteenth-century Egypt occurred not due to use of money based on non-precious metals and that bimetallism would have ensured price stability. There are instances of increase in prices even when gold and silver coins were in use.<sup>18</sup> Al-Maqrizi being a top historian and expert of traditions must have been aware that prices increased at the time of the Prophet as well when gold dinars and silver dirhams were in use.<sup>19</sup> The prices increased continuously during the period of second caliph Umar and he had to adjust at least three times the blood money (*diyah*) because camels, fixed as compensation, became very expensive (al-Bayhaqi, 1344 H., 8: 77).<sup>20</sup> No doubt, money is the blood of economy. So there is need to maintain a suitable quantity of it for the economy to avoid high or low pressure of it, as both cases are destructive for the health of economy. It is, therefore, in all ages it has been considered prerogative and responsibility of the government to issue money and to supervise it (al-Nawawi, n.d., Vol. 6, p. 10). This does not mean that the other aspects of the economy got no significance. Al-Maqrizi recognized some other causes of economic and financial crises, but he gave importance to monetary factor only. The weakness of his prescription is that he sought the solution in adoption of only gold or gold and silver standard of money and ignored the other causes.

There is no doubt that the gold standard had some advantages when it was in practice. Its merits as compared to 'a man-made currency not tied to a metal' are admitted even by modern economists (*The New Palgrave Dictionary of Money and Finance*, vol. 2, p. 265). To Crowther, a gold standard ensured stability of exchange rate and provided built-in control on expansion of money supply (Crowther, 1967, P. 281, 284). But the mankind has passed that standard as it crossed the earlier stages of barter economy, commodity money and metallic money. It is at the threshold of electronic money. Now after fall of bimetallism, it is not practicable to take the economic world back into history.

As compared to al-Maqrizi, al-Asadi's analysis of the situation is more pragmatic. He realized that the economy's fundamental flaws cannot be cured by simply introduction of dinar and dirham. The financial crisis was product of debasement and counterfeiting, be it dinar, dirham or copper *fulus*. Therefore he insists on standardization of money in such a way that the others cannot imitate it and possibility of debasement is eliminated. In other words, he argues for efficient monetary management. He also pays attention to other factors responsible for economic crisis and recommends measures that include not only monetary reform but also elimination of corruption, removal of discrepancy in weight and measures leading to fraud and deception, correct management of public distribution,

enlargement of production through strengthening agricultural relations, and promotion of trade and commerce. This kind of comprehensive internal economic reform is fully relevant to present day complex economic situations. It is a pity that al-Asadi and his work were ignored in his own time and it still missed the attention of researchers today.

### Endnotes

1. The Mamluk dynasty was established in Egypt in mid-thirteenth century after abolishing the Ayyubid dynasty in 648/1250 and it came to an end in early 16<sup>th</sup> century when Ottoman Sultan Salim First (d. 926/1520) defeated Mamluk Sultan Qansawh Ghawri in 1517 C.E.
2. In Egyptian history, Mamluks are divided into an earlier group called the *Bahri* Mamluks (684-784 H./1250-1382 C.E.), and a later group, the *Burji* Mamluks (784-923 H./1382-1517 C.E.); the *Bahri* Mamluks were originally soldiers based on Roda Island by Cairo, on the Nile (*Bahr*), while the *Burji* Mamluks were associated with the Citadel (*Burj*). The *Bahri* Mamluks derived largely from Qipchaq tribesmen in what is now southern Russia, with Mongols and Kurds; the *Burji* Mamluks were mainly Circassians, from the Caucasus Mountains.
3. It was established by al-Zahir Barquq (d. 801/1399), a *burji* slave, in 784/1382, by overthrowing Bahri mamluk sultan al-Salih b. Sha`ban to whom the former was a body guard.
4. During the Mamluk period, a new monetary element "copper dirham of account" (*dirham mia'l-fulus*) was introduced. for example, see *al-Suluk*, 3:1059 in the events of 804/1401, and *Suluk* 4: 944). Some rendered it as 'trade dirham'. It originally represented one real copper coin of a dirham weight (about 3 grams), but with the continuous debasement and decline of the weight of copper coinage the 'copper dirham of account' no longer stood for one single *fals*; instead it equaled a gradually increasing number of copper coins.}
5. Taqi al-Din Ahmad b. 'Ali al-Maqrizi, a prolific writer historiographer and economic historian, was born in last days of the *Bahri* Mamluk dynasty in the reign of al-Ashraf Sha`ban (d. 778/1377). Al-Maqrizi saw the fall of *Bahri* sultans. The last sultan of this dynasty was al-Salih b. Sha`ban who was overthrown by his body guard Barquq (d. 801/1399), a *burji* slave, in 784/1382. At that time al-Maqrizi was 18 years old.
6. There is a misconception that *al-Ighathah* is a work on famine. No doubt, al-Maqrizi mentioned a few cases of famines in Egypt in the past that caused high prices and starvation. But the main theme of the book is the high price (*al-ghala'*) and economic and financial difficulties of the early 15<sup>th</sup> century in Egypt arising out of wrong political, economic and monetary policies of the Mamluk sultan. Generally a famine is accompanied by high prices but not the other way round. According to Allouche (1994, 13) the book is 'a critique, if not an outright indictment, of the Circassian administration's economic and monetary policy. It is a polemical work written by a former official of the *hisbah* that focuses on the etiology of a specific economic crisis'. The work is a valuable source of the economic history of Egypt in early 9<sup>th</sup>/15<sup>th</sup> century especially in the area of money and coinage. It has served for the author as a basis for another work entitled *al-Nuqud al-Islamiyah* in which he retained some of the sections of *al-Ighathah* while making certain additions and

improvements. In this way al-Maqrizi became the first who wrote an exclusive tract on money in Islam. It was presented to Mamluk Sultan al-Mu'ayyad Shaykh in 818/1415 with the hope that he would bring reform in the corrupt monetary system prevailing since more than a quarter century. The book succeeded in its objective to some extent.

7. It seems that al-Maqrizi has referred to the later history of Egypt. Otherwise in early Islamic history both types of coins were in use. Byzantines had gold dinar and Iranian *Kisra* had silver dirham. Arabs used both. They did not have their own money.
8. Muhammad b. Muhammad b. Khalil al-Asadi's birth, life and death remain obscured. He authored four valuable works on socio-economic problems of his time but only survived entitled *al-Taysir wa'l-I'tibar wa'l-Tahrir wa'l-Ikhtibar* in 855/1451. His work itself is the only source to know about him. He lived in Damascus. At that time Egypt and Syria were ruled by Circassian Mamluk. The Caliph was al-Qa'im bi-Amri'llah Hamzah b. Muhammad (d. 855/1451). A study of al-Asadi's work would reveal that he occupied position of a *muhtasib*. His book is a rich source on economic thinking and economic history of Mamluk regime. In addition to some other useful information that it contains, it deals with burning issues of the time such as how to reform monetary situation, various economic transactions, abolition of oppressive taxes, cheating and fraud in weight and measures, and corruptions causing shrinkage of public money. It also consists of policy suggestions to rectify the situation and protect lives, property and dignities (al-Asadi, *al-Taysir*, p.180). It is surprising that in spite of its significance as a source material for economic history and Muslim economic thinking, the book has not received attention of researchers. In English language there is no work on Asadi's economic thought, while in Arabic there are only a few articles).
9. It may be noted that in modern Arabic the term used for 'inflation' is '*tadakhkhum*'. In old days the *ghala*' was used for all kind of high prices.
10. The reason may be the fact that in production of bread the value added at flour and at baking stage may have been the major constituent of the bread price.
11. Refers to the reign of Sultan al-Ashraf Barsbay (825-42/1422-38).
12. Refers to the reign of Sultan al-Zahir Jaqmaq (842-57/1438-53).
13. During that period an average exchange rate of dinar to dirham was 1:250.
14. For example, see Haneef and Barakat (2006).
15. For details one may refer to Hasan (2008).
16. Comparing Shaykh's dirham with that issued by Umayyad caliph Abd al-Malik (26-86/664-705), al-Maqrizi said that while Abd al-Malik's dirham had three qualities, Shaykh's dirham had six merits or even more (al-Maqrizi, *Shudhur*, pp. 33-34).
17. One of the strongest arguments against introduction of gold dinar in the present day Muslim countries is also the fact that they produce 'annually less than 10% of total output of the yellow metal' (Hasan, 2008, p. 20) and their stock of precious metals is not enough to fulfill the need of supply of money.
18. According to Hasan (2008, p. 11), "Paul Einzig, for example, had long back shown in the very opening chapter of his book *Inflation* that prices in the world have been rising over the past five thousand years: the upward legs of the cycles tended to grow longer, and downward turns sharper, while the bottoms were agonizingly broader, recovery being slow and painful."

19. It is reported that prices soared in Madinah and people requested the Prophet (peace be upon him) to fix the price, but he did not agree and said: "Allah grants plenty or shortage; He is the sustainer and the real price maker (musa'ir). I wish to go to Him having done no injustice to any one in blood or in money" Abu Dawud, vol. 3, p. 286).
20. As the history of the period shows, the prices of other goods had also increased because of increasing income through spoils of war and other sources.

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