The poor and the Holy Spirit

Poor relief and the mitigation of food crises in the countryside of Holland, 16th-17th centuries

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1. Introduction

Recently, scholars in the field of disaster studies have emphasized the role of collective responses in 'hazard mitigation': the reduction of the risks connected to disasters and the enhancement of the capacity to recovery afterwards through 'non-structural actions' such as community schemes for sharing costs or providing a safety-net for the most vulnerable members of society.[1] Historical research suggests that such actions also affected the capacity of communities in pre-modern Europe to cope with shocks.[2] This paper discusses such an historical case: it deals with the role of poor relief in coping with food crises—episodes of dearth caused by harvest failure, war or other factors—in the countryside of early modern Holland.

From at least the late sixteenth century onwards Holland, in contrast to many other regions in Europe, experienced no major famines.[3] In the past this has been explained by referring to the central position of the region, and in particular of Amsterdam, in the European grain trade. This, the argument goes, ensured a steady supply of cheap bread grains.[4] However, as I have shown elsewhere, compared to other European cities with good access to sea in the seventeenth and eighteenth centuries Amsterdam grain prices were neither exceptionally low nor remarkably stable: rather, they ranked in the middle of the range on both aspects. Of greater importance was probably the fact that from the late sixteenth century onward real wages in Holland, even for unskilled labour, were relatively high.[5] Still, even in the Dutch Golden Age many people had to live on less than a full (male) wage. Unemployment, even if only temporary, frequently implied an acute loss of income; so did widowhood, sickness and old age. Moreover, wage earners that just managed in normal years could easily be pushed over the edge by a material increase of bread prices.

In situations like this, the presence of a well-functioning system of poor relief—a risk-reducing community-based system—could literally mean the difference between life and death. In Holland, the most important formal form of assistance from the viewpoint of food crises was 'outdoor' poor relief: support given by civic institutions or churches to poor people living at home, in cash or in kind. Similar outdoor poor relief systems existed in many places

[1] Cutter, Boruff, and Shirley, "Social vulnerability"; Aldrich, *Building resilience*.
[2] Gerrard and Petley, "A risk society?," 1065–1066; Lambrecht and Vanhaute, "Famine, exchange networks."
[3] Faber, *Dure tijden*. For the definition of a famine as 'a shortage of food or purchasing power that leads directly to excess mortality from starvation or hunger-induced diseases': Ó Gráda, *Famine*, 4.
[4] De Vries and Van der Woude, *First modern economy*, 199–200.
[5] Dijkman, "An early escape from hunger?" For a comparison of price volatility with similar results cf. Nielsen, "Storage," 25.

in early modern Europe, although there were significant differences in organization and, as Van Bavel and Rijpma have recently shown, also in the levels of expenditure.[6] The effectivity and stability of these systems has been the subject of discussion. One line of reasoning, brought forward by Abram de Swaan twenty-five years ago holds that they were inherently instable because of the fact that the response to a general, large-scale problem—poverty—relied on the efforts of small, local communities. Poor relief was indeed, almost everywhere, a local affair. The only partial exception was England, where the Elizabethan Poor Law of 1602 provided a national legislative and fiscal framework, even though the execution was still a local responsibility. According to De Swaan, early modern communities, especially in hard times, were easily tempted to curtail their efforts, inducing the poor to migrate and thus shifting the burden of caring for them to another community, which could not shoulder it either and would follow the same course of action. The ultimate result would be a total collapse of the system. This coordination problem was only overcome when, in the modern era, the state stepped in.[7]

Scholars studying poor relief systems in the early modern Dutch Republic have opposed this proposition. They have argued that despite the decentralized nature of poor relief, the almost complete absence of national regulation and the fact that funding of poor relief was to a significant extent based on voluntary giving instead of taxation, the system turned out to be remarkably stable.[8] However, these studies have almost entirely been restricted to urban contexts: rural poor relief systems have hardly been studied.[9]

Yet there is reason to believe that from the perspective of dealing with dearth the functioning of rural poor relief is at least as important. In a way that echoes De Swaan's theory, research in other parts of Europe has suggested that coping capacity of society as a whole was materially affected by what happened in the countryside. In early modern Italy, for instance, people flocked to the towns when food became scarce, because there they hoped to find the relief that the village community could no longer provide.[10] This suggests that rural poor reliefs robust enough to continue to function during food crises enhanced the stability of the system as a whole and may thus help explain a society's capacity to cope with episodes of dearth.

[6] Van Bavel and Rijpma, "How important."
[7] De Swaan, *Zorg en de staat*, 33–62.
[8] Prak, "Goede buren"; Heerma van Voss and Van Leeuwen, "Charity in the Dutch Republic"; Van Nederveen Meerkerk and Teeuwen, "Stability of voluntarism."
[9] An exception is Gras, *Op de grens van het bestaan.* This study does not discuss Holland, but the eastern province of Drenthe.
[10] Alfani, "Famine of the 1590s," 44–45.

In the case of Holland there are additional reasons to look at rural poor relief in more detail. For one, since the late Middle Ages Holland's rural population largely depended on the market for its food provisioning. Cultivation of bread grains was feasible only in a few places; in most of the country the subsidence of the extensive peat soils, reclaimed in the high Middle Ages, had rendered arable farming impossible from at least the early fifteenth century onward. Smallholders switched to dairying and cattle breeding, supplemented farm income with various non-agrarian activities such as peat digging, shipping, or spinning.[11] In addition, commons were unknown in most of Holland. In regions elsewhere in Europe where commons did exist, they frequently offered relief to the rural poor through the option of grazing a cow, reaping nuts or berries, or collecting fuel on the commons. In Holland, this possibility was closed off. Finally, in the sixteenth and seventeenth centuries agriculture in Holland experienced a drastic transformation. In a process that had started earlier but gained speed in the sixteenth century, urban landownership and lease holding increased. From the end of the sixteenth century onward this was accompanied by the retreat of smallholding and the rise large, specialized farms reliant on wage labour. This materially enhanced agricultural productivity, but it also implied the emergence of a group of landless labourers and proto-industrial workers in the countryside.[12] All of this must have placed a heavy and increasing demand on formal systems of rural poor relief.

The aim of this paper is to discover if these systems were nevertheless able to cope with food crises successfully and thus may have contributed to Holland's success in preventing dearth from developing into famine. This is not to claim that rural poor relief, or indeed poor relief in general, provides a full answer to this question. Other aspects, such as the relatively high wages already mentioned or local market regulation (in particular the arrangements for controlling the price of bread), may very well also have contributed. Moreover, next to formal poor relief, informal assistance through family or patronage networks was no doubt also important. Poor relief is therefore one possible contributing factor in a wider range, but because it was specifically directed to the most vulnerable groups in society—those most likely to suffer in case of food shortages—it is likely to be an important one.

The paper focuses on a single case: the village of Berkel, between Delft and Rotterdam. This choice has been determined by the exceptional documentation available for this village. It consists of several tax registers for the sixteenth and seventeenth centuries,

[11] Van Bavel and Van Zanden, "Jump-start," 504–505.
[12] De Vries, *Dutch rural economy*, 127–135.

data on burials and baptisms going back to the late sixteenth century, and—most important of all—the accounts of the local civic poor relief institution, the Holy Spirit, from the 1580s onward (although with gaps). Two episodes of dearth will be investigated in detail: the years 1595-1598 and the years 1698-1699.[13] These episodes have been selected firstly because of the fact that they both represent serious episodes of dearth covering more than a single year; the literature on food crises demonstrates that while most societies were able to deal with the consequences of a single bad harvest, such prolonged periods of dearth frequently caused serious problems.[14] Secondly, the fact that the first episode of dearth took place when the transformation of Holland's rural society was in its early stages while the second one occurred when this transformation was well under way, will allow for an assessment of the consequences of these changes for coping capacity.

It will be clear that it is risky to draw conclusions for all of rural Holland on the basis of information from a single village. When possible an attempt is made to at least partially overcome this problem by drawing comparisons with other villages in Holland, or with the situation in the towns. The next section briefly describes the economic and social structure of Berkel. Section 3 discusses the organization of poor relief in the village and its functioning during normal years. The sections 4 and 5 discuss the responses of the Holy Spirit to the crises of the late 1590s and late 1690s respectively. Conclusions follow.

2. Berkel: social and economic structure

Around 1500 Berkel, situated in the Delfland region between Delft and Rotterdam, on the southern edge of Holland's central peat district, was a sizable village of around 600 inhabitants. The village economy, as in many other places in the region, was largely based on a combination of peat mining and dairying. In the *Enqueste* of 1494, an assessment of the economic situation of the towns and villages in Holland made for taxation purposes, the villagers described their main activities as 'peat digging, keeping some cows and sowing a

[13] The analysis in this and in the next two section is largely based on the accounts of the Holy Spirit over the years 1592-1602 and 1692-1702: Stadsarchief Rotterdam, Archief Ambacht Berkel en Rodenrijs (hereafter: SA AABR) inv. nos. 1306-488 and 1306-496 (unfoliated).
[14] Ó Gráda, *Famine*, 31–33.

little land'. They then continued to state that the lands they owned were all but depleted of peat; digging for peat was only possible on lands belonging to outsiders.[15]

There was probably some truth in this: a tax register from 1553, the *tiende penning kohier*, marks about 30% of the land in the village as depleted or—more often—partially depleted. Almost all of this land belonged to villagers, many of whom in addition leased one or more other plots of land from a fellow villager or, indeed, from an outsider.[16] However, the tax registers also show that in the middle of the sixteenth century urban landownership in Berkel was, in relative terms, modest. For central Holland as a whole urban landownership in the middle of the sixteenth century has been estimated at 41%.[17] In 1553 only 23% of the land in Berkel was owned by burghers or urban institutions; in 1561 it was, at 17%, even less. The reasons are not immediately evident: perhaps urban investors lost interest in peat lands that neared depletion, selling them off to villagers. A third element that stands out from the 1553 tax register is the fact that holding size was quite large: 35% of land users had a holding of 10 to 25 *morgen* at his (or her) disposal, 42% a holding of 25 to 50 *morgen.* Comparative data for the entire region are not available, but a few examples from other villages in the Rijnland region, north of Delfland, suggest that there holdings were on average much smaller.[18]

Some of the larger land users may well have made use of some hired labour for peat mining or as farm hands. Still, even at the very end of the sixteenth century, the share of the population that depended mainly or entirely on wage labour or proto-industrial activities was limited. In a 1597 tax register two-thirds of the heads of households in the village were referred to as 'farmers'. The share of labourers and weavers was only 11%.[19] In short, at the end of the sixteenth century, after more than a century of intensive peat mining, Berkel was still a relatively egalitarian society.

Change, however, was on its way. In the late sixteenth and early seventeenth century the village population expanded, although growth rates were only half of those in rural Holland as a whole—and much lower than in the peat mining villages of Rijnland.[20] In the course of the seventeenth century the occupational distribution also shifted. Two tax registers

[15] Fruin, *Enqueste*, 244–245. For peat mining in Berkel: Diepeveen, *Vervening in Delfland en Schieland*., 25-26, 49, 147, 148.
[16] Van der Vorm, "Kohieren 1544, 1553, 1556"; Van der Vorm, "Kohier 1561."
[17] Van Bavel, "Rural development.", 182, 195.
[18] De Vries, *Dutch rural economy*, 132; Van Gelder, *Nederlandse dorpen*, 78–79. A *morgen* is about 8500 m2 or 2.1 acres.
[19] Van der Krogt, "Berkel en Rodenrijs: Kohier van het getimmerte, 1597."
[20] In 1623 Berkel had 900 inhabitants (Van der Krogt, "Berkel en Rodenrijs: Volkstelling 1623." For averages for rural Holland: De Vries, *Dutch rural economy*, 84–87; cf. Van Tielhof, "Turfwinning."

dating from 1674 and 1715 respectively mention almost as many labourers and textile workers—the two categories appear to overlap—as farmers and peat men.[21]

Table 1 Occupational structure in Berkel in 1597, 1674 and 1715

Occupation	1597: share of heads of households	1674: share of total labour force	1715: share of total labour force
Farmers & peat miners	68%	37%	34%
Labourers & textile workers	11%	30%	29%
Craftsmen, shopkeepers & other services	10%	22%	17%
Professionals and officials	3%	2%	2%
None / unknown	8%	9%	17%
Total	100%	100%	100%

Sources: see text.

Some care is required, for the 1597 register only presents the occupations of the heads of households, whereas in 1674 and 1715 everybody with an income is included. Yet even if this difference is taken into account, the increase in the share of labourers and proto-industrial workers, in keeping with developments in other parts of rural Holland, is evident. That a shift like this would have put pressure on local poor relief seems unavoidable.

3. The Holy Spirit and its functioning in normal years

We know surprisingly little about the organization of poor relief in the countryside of early modern Holland. In many towns poor relief systems were reformed at the end of the sixteenth century. As elsewhere in Europe, medieval arrangements for the care of the poor, characterized by fragmentation and incidental distributions, were no longer able to cope with the rising numbers of poor as a result of population growth, urbanization and increasing social and economic inequality. The preferred solution included a coordinated relief system under the responsibility of the urban authorities, restriction of relief to the 'deserving poor'—those fallen into poverty for reasons beyond their own doing, such as sickness, handicaps or old age—and strict measures against vagrants and beggars.[22] In the countryside, the need to reform was probably much less pressing. In most villages there was only one poor relief

[21] Van der Krogt, "Berkel en Rodenrijs: Kohier van het familiegeld, 1674"; Van der Krogt, "Berkel: Familiegeld 1715."
[22] Prak, "Armenzorg 1500-1800," 54–56; Teeuwen, "Generating generosity," 33–42.

institution anyway, which already had a public character: the Holy Spirit. Moreover, most rural communities did not have to deal with the permanent influx of poor that worried the authorities in the towns. This made it much easier to keep check of the needy, their requirements and the ways that those could best be met with. For reasons of efficiency, reforms were therefore not required.[23]

The Reformation, however, did have consequences for the organization of rural poor relief. According to A.Th. van Deursen, the Holy Spirit remained the only poor relief institution in many villages, but at the same time he mentions several early seventeenth-century villages where besides the Holy Spirit a diaconate of the Dutch Reformed Church and organizations of various other religious communities were active.[24] In Delfland this was clearly the normal situation: from the late sixteenth century almost every Delfland village had, next to the Holy Spirit, a Reformed diaconate. The diaconates mainly took care of the members of the Dutch Reformed Church, which at this early stage was almost everywhere a small minority. Occasionally it also provided relief to others, as long as these were regular church-goers and their behaviour was considered beyond reproof.[25] The main sources of income of the two institutions differed: whereas the Holy Spirit could usually fall back on a real estate portfolio built up in the Middle Ages, the diaconates primarily relied on donations.[26]

Poor relief in late sixteenth-century Berkel conforms to this Delfland pattern. The local Holy Spirit was of a respectable age: the institution is already referred to in 1317, in the earliest account of the counts of Holland that has been preserved, as one of the users of comital land in Berkel.[27] The tax registers of the middle of the sixteenth century (the *tiende penning kohieren*) record the Holy Spirit as the owner of multiple small plots of land in Berkel; in 1553 the total amounted to *34 morgen*.[28] The organization continued to function after the Reformation and held on to its medieval properties, although, as elsewhere in Holland, it took several years for the revenues from land rents to recover from the damage done by warfare and inundations in the early 1570s.[29] However, from 1587 onward poor relief in Berkel was no longer the exclusive domain of the Holy Spirit. In that year the

[23] Abels and Wouters, *Nieuw en ongezien* 2, 276–277.
[24] Van Deursen, *Bavianen en slijkgeuzen*, 107–112.
[25] Abels and Wouters, *Nieuw en ongezien* 2, 283.
[26] Van Deursen, *Bavianen en slijkgeuzen*, 109–114.
[27] Hamaker, *Rekeningen der grafelijkheid* I:111. Cf. p. 202 for a later reference.
[28] Van der Vorm, "Kohieren 1544, 1553, 1556."
[29] SR AABR inv. no. 1306-488. The accounts between 1578-1585 show low income levels. For the development of land rents in Holland in this period in general: Kuys and Schoenmakers, *Landpachten in Holland*, 35–40.

Reformed Church established its own diaconate, which, as elsewhere in Delfland, provided relief for the members of that church.[30]

The management of the Holy Spirit was in the hands of a poormaster (the accounts mention only one at a time) appointed in this position for a year by the village authorities; in some cases the same person was re-appointed a few years later. The poormaster was often a local craftsman, or belonged to the more substantial farmers. His job was to screen applicants for relief, decide on the allowances they were to receive, organize distribution, and manage the finances of the organization. In years not marked by dearth the financial position of the Holy Spirit was healthy enough. An analysis of revenues and expenditure in two blocks of three 'normal' years, at the very beginning of the seventeenth century and at the end of it, indicates comfortable surpluses in both periods (table 2). The composition of revenues and expenses, however, changed. In the course of the seventeenth century the share of land rents in revenues declined, while the contribution of revenues from a diversity of other sources, ranging from testamentary bequests and donations in the village alms boxes to the sale of land and the repayment of debts, increased.

Table 2: Revenues and expenditure of the Holy Spirit in Berkel in normal (non-dearth) years around 1600 and around 1700

	1592-1594 (population: c. 750)	**1692-1694 (population : c. 900)**
Revenues		
Average per year in guilders	300 guilders *(573 in guilders of 1692-94)*	1356 guilders
Land rents	65,7%	37,9%
Interest on capital	15,0%	17,7%
Other revenues	19,4%	44,4%
Expenditure		
Average per year: in guilders	254 guilders *(484 in guilders of 1692-94)*	1045 guilders
Bread (and other foodstuffs)	48,3% *	23,8%
Other forms of relief	26,4% *	22,5%
Other expenses (non-relief)	24,2%	53,7%

Sources: SR AABR), inv. nos. 1306-488 and 1306- 496. Population numbers: Van der Krogt, "Berkel en Rodenrijs: Kohier van het getimmerte, 1597"; Van der Krogt, "Berkel: Familiegeld 1680".
* Based on 1594 alone; for 1592 and 1593 this information is not available.

Likewise, the composition of expenditure shifted. In the late sixteenth century the Holy Spirit spent half of its annual budget on bread distributions to the local poor. Much smaller sums were spent on other forms of poor relief: mainly cloth, shoes and shoe repairs, medical care

[30] Abels and Wouters, *Nieuw en ongezien* 2, 271.

and small sums in cash for transients. The organization thus basically performed the same functions as urban poor relief institutions.[31] This was probably nothing out of the ordinary: in the early seventeenth century, the diaconate of Hazerswoude offered more or less the same range of goods.[32] There is only one exception: in Berkel fuel was not distributed, suggesting that the recipients had access to locally mined peat through other channels. The category 'other expenses' was modest: its main components were the maintenance costs of the local school building, school fees for the poor children and administration costs.[33]

At the end of the seventeenth century less was spent on bread distributions, at least in relative terms. Purchases of peat for distribution among the poor, however, had been added. The Holy Spirit now also frequently settled house rents. Several recipients, probably orphans and elderly people, were boarded out to other villagers, in which cases the Holy Spirit paid a lump sum for their maintenance—even if these other villagers were close relatives. The very considerable increase of the category 'other expenses' can partly be attributed to the purchase of a government bond of 600 guilders in 1694 (in later years more purchases of this type were to follow), partly to taxes on landed properties which had not yet existed a hundred years earlier, and finally also to an increase of administration costs.

Before looking in detail at developments during the two periods of dearth, it is worthwhile to position the contribution paid by the Holy Spirit to formal poor relief in the village in a wider perspective. The first issue to consider is the role of the organization in relation to the efforts of other local institutions, particularly the diaconate of the Dutch Reformed Church but also the catholic community. In the late sixteenth and early seventeenth century membership of the Reformed Church was probably small,[34] but it must have increased afterwards: at the end of the eighteenth century 45% of the population was reformed.[35] As elsewhere in Delfland poor church members no doubt looked for help to the diaconate. Catholics, on the other hand, probably relied largely on the Holy Spirit. Although a sizable proportion of the village adhered to Catholicism—an informal survey conducted by the catholic priest around 1650 arrived at 85 catholic families or about 40% of the population, while in the late eighteenth century this share was 49%—information on organized catholic

[31] Prak, "Armenzorg 1500-1800," 73–74. For a detailed case study (Delft): Van der Vlis, *Leven in armoede*., chapters 4 and 5.
[32] Van Deursen, *Bavianen en slijkgeuzen*, 122.
[33] School fees should logically have been included in the category 'other relief expenses', but this turned out to be complicated: in the accounts they are often lumped together with the maintenance costs of the school building.
[34] Wouters and Abels, *Nieuw en ongezien* 1, 238.
[35] SR AABR, inv. no. 1306- 247.

poor relief is lacking.[36] However, the fact that at the end of the seventeenth century the Holy Spirit supported two *kloppen*, catholic women living a life of chastity and piety, suggests that catholic poor relief was, at best, a supplement to the relief provided by the Holy Spirit, not a replacement.[37] All in all, an estimate of 50 to 60% for the share of the Holy Spirit in total formal poor relief in the village seems reasonable for the late seventeenth century; in the late sixteenth century it was probably more, perhaps 70 to 80%.

These estimates allow for a tentative assessment of a second issue: the development of the total volume of poor relief in Berkel, and how it compared to the situation elsewhere in Holland. Table 3 summarizes the available information for the same two non-dearth periods as before, with some important additions from 1680: for this year reliable information on the total number of people receiving relief is available from yet another tax register, the *kohier van de zeep- en zoutbelasting*.[38]

Table 3: Volume of poor relief in Berkel

	1592-1594 (population: c. 750)	**1692-1694 (population: c. 900)**
Share of households receiving poor relief		11% (in 1680) -Graft 15% -Lisse 3%, -'s Gravendeel 4% -Noordwijk 8% -Delft 15%
Expenditure per household	34-39 guilders *(66-75 in guilders of 1692-94)*	29-35 guilders -Graft 1680: c. 67 guilders -Delft 1670: c. 50 guilders
Expenditure per capita of the village population	0.32-0.37 guilders *(0.61-0.70 in guilders of 1692-94)*	0.90-1.08 guilders -Graft 1680 c. 3 guilders -Delft 1670: 1.81 guilders

Sources: see table 2; Graft: Van Deursen, *Dorp in de polder*, 213-215; other villages: Dijkman, "Dagelijks brood" ; Delft: Van der Vlis, *Leven in armoede*, 64 and Van Nederveen Meerkerk and Teeuwen, "Stability of voluntarism", 97; deflator: revised version of Allen, datafile "Amsterdam").[39]
*Based on 1593 and 1594; for 1592 this information is not available.

In two respects relief efforts had increased significantly between the late sixteenth and the late seventeenth century: a much larger share of the population received support—this share was sizable compared to several of the other villages—and expenditure per capita had also increased. However, corrected for inflation allowances had been reduced by about half,

[36] Velthuyse, *Katholiek Berkel en Rodenrijs*, 37–38.
[37] SR AABR inv. nr. 1306-496, account over 1694.
[38] Van der Krogt, "Berkel: Familiegeld 1680."
[39] Van Deursen, *Dorp in de polder*, 213–215; Van der Vlis, *Leven in Armoede*, 64; Van Nederveen Meerkerk and Teeuwen, "Stability of voluntarism", 97; Dijkman, "Dagelijks brood"; Allen, Datafile "Amsterdam".

suggesting that through the expedient of lowering allowances, the Holy Spirit in Berkel was able to support a larger number of households. Allowances were not just lower than in the town Delft, but also considerably below the level customary in the village of Graft. The fact that at the same time, at least in normal years, the Holy Spirit was able to book comfortable surpluses raises the question whether the organization could have spent more on relief than it did. On the other hand, its prudency did mean that a substantial reserve was at hand in times of emergency. It is to these times that we now turn.

4. The crisis of the late 1590s

The food crisis of the second half of the 1590s affected a much wider region than just Holland. To a significant extent, the crisis can be attributed to harvest failures due to bad weather in 1595 and 1597. Admittedly, not all problems were weather-related. In northern France, the situation was exacerbated by the wars that had been going on since the middle of the 1580s and by disease.[40] England was, at least internally, at peace, but here too food shortages became evident, leading to famines in 1596 and 1597 in the north. In the south the situation was not as bad, but even there raised numbers of burials signaled distress.[41] The Dutch Republic did not escape problems either. Leo Noordegraaf has pointed out that seventeenth-century Dutch authors had made light of the situation because of their desire to highlight the affluence and stability of the Republic. Noordegraaf refers to several reports contradicting the message that all was well. The years 1595 and 1597 were marked by extensive flooding in Holland and Utrecht. The intermediate year 1596 witnessed a mice plague in the entire Republic.[42] Grain prices rose, in Holland as well as elsewhere. Graph 1 displays the development of rye prices in Amsterdam and Utrecht between 1586 and 1605: the bulge in the late 1590s stands out.

[40] Benedict, "Civil war and natural disaster."
[41] Appleby, *Famine in Tudor and Stuart England*, 135–139; Clark, "A crisis contained?," 46–48; Outhwaite, "Dearth, the English Crown," 34–37.
[42] Noordegraaf, "Dearth," 75–77.

Graph 1: Rye prices in Amsterdam (*Burgerweeshuis)* and Utrecht *(Domkapittel)* in gr Ag/hl, 1586-1605

Sources: Posthumus, *Nederlandse prijsgeschiedenis* 2, columns 28a and 392.

A brief comparison to England and France for wheat, the only grain for which this is possible, suggests that while the situation in Amsterdam was not nearly as dramatic as in Paris, it was at least as serious as in London: the price peak in Amsterdam was not higher, but it took longer for prices to return to normal levels (see Appendix).

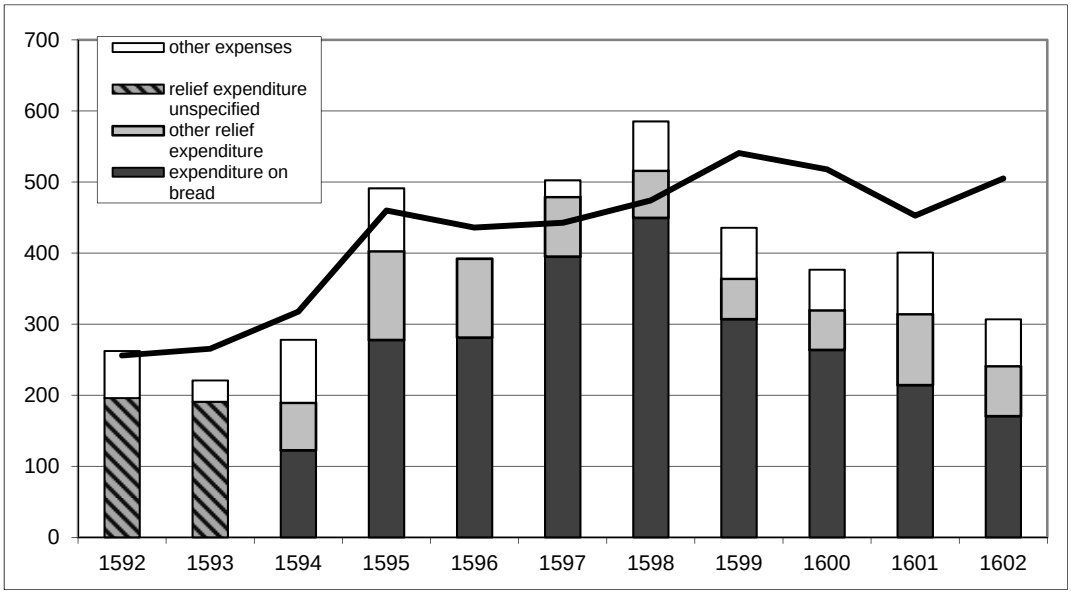
In the towns of Holland, the poor felt the consequences. Although mortality figures for the late sixteenth century are available for some towns in Holland, they are difficult to interpret: the era also witnessed several outbreaks of plague, some of them local, others of wider importance. Qualitative sources, however, indicate the severity of the situation. In Leiden, where the textile industry had gone into a slump, a large part of the urban population appealed to the authorities for subsidized bread in 1597.[43] Alkmaar also supplied bread against reduces prices, but had to maximize the amount that could be purchased at half a loaf per week per person. The local authorities, fearing that the regular grain trade would not be able to supply the town with grain, sent out a representative to Danzig to purchase rye there.[44] Poor relief institutions had serious trouble coping with the situation. It is not a coincidence that exactly in 1596 or 1597 in Delft, Edam and Haarlem important reforms of the poor relief system were set in motion.[45]

[43] Van Deursen, *Bavianen en slijkgeuzen*, 103.
[44] Noordegraaf, "Levensstandaard en levensmiddelenpolitiek," 76–77.
[45] Prak, "Armenzorg 1500-1800," 59–61. For Delft also Abels and Wouters, *Nieuw en ongezien* 2, 229–233; Van der Vlis, *Leven in armoede*, 37–39. For Haarlem: Spaans, *Haarlem na de Reformatie*, 174–180.

In the countryside the situation was also serious. Although the Berkel burial registers go back to 1583, they are very incomplete for the first couple of decades: analyzing them is of no help in assessing the impact of the crisis in the village. Baptisms offer more perspective: birth rates usually decline in periods of distress and the baptismal records of the Dutch Reformed Church appear to be fairly complete. They suggest a significant dip during the crisis years: in the years 1590-1594 on average 27 children per year were baptized, between 1595 and 1599 only 19.[46] However, numbers are too small to draw firm conclusions; moreover the fact remains that the cause of the decline—dearth or plague—cannot be established with certainty.

That dearth did cause trouble in Berkel is evident from the accounts of the Holy Spirit. While, as we saw, in the years 1592 to 1594 the accounts had closed with a surplus, in 1595 and again in 1597 and 1598, deficits could not be avoided (graph 2). It bears noticing that Berkel was not the only community where poor relief organizations exceeded their budgets. In the winter of 1596/97 the expenditure of the diaconate of nearby Zevenhuizen was 960 guilders while the regular revenues amounted to no more than 260 guilders.[47] In Berkel the burden could be born, although only just: in 1597 and 1598 in particular the annual budget was almost completely exhausted.

Graph 2 Expenditure and revenues of the Holy Spirit in Berkel, 1592-1602



Source: SR AABR, inv. no. 1306-488.

[46] Van Asperen, "Dopen 1587-1695" (Original: SR AABR 1307-512D).
[47] Van Deursen, *Bavianen en slijkgeuzen*, 103.

In part, the rise in expenditure can be attributed to a higher bread price. Households included in the regular distributions in 1594 received on average around 20 guilders worth of bread; at the peak of the dearth, in 1598, this sum had increased to 35 guilders. There was, however, also something else going on: the number of recipients of poor relief increased substantially during the crisis. In 1593 eight households regularly received relief, in 1594 six. In 1595 this number had risen to ten and in 1597 even to fourteen. Notably, after 1599, when the crisis was over, this number barely declined: in 1600 and 1601 twelve households required support from the Holy Spirit. This suggests that for some households that lived on the fringes of poverty anyway the dearth of the 1590s was the proverbial straw to break the camel's back.

A closer look at the backgrounds of the recipients of poor relief is illuminating. In the ten years between 1593 and 1692 a total of eighteen households received relief on a regular basis (for 1592 this information is not available). Four groups can be distinguished. For the first two, no direct relation with the development of food prices can be discerned: five households received support during the entire period, while four either disappeared from the accounts before the crisis started or did not enter them until later. More interesting are the other two groups. Three households sought and received support from the Holy Spirit during the years of dearth but could manage without afterwards: among them were a cobbler and the wife of a miller of polder mill. Six households first appeared in the accounts of the Holy Spirit in 1595, 1596 of 1597, but continued to receive aid after the crisis was over. Among them were three weavers one of whom was originally from Brabant, another immigrant from the southern Netherlands (possibly also a weaver) and later his widow, and a labourer; the sixth was another miller of a polder mill. It is hardly a surprise: those without access to land—labourers and proto-industrial workers, many of them migrants—were hardest hit by the food crisis. These were the people that needed the support of the Holy Spirit most. Because at this stage in time this group was small and because the Holy Spirit was in a comfortable financial position, relief could be given where and when it was needed, although the decline in the number of baptisms suggest that this did not solve all problems.

Still, there was another group that was even more vulnerable: those without a permanent home. It is probably not a coincidence that they mainly appear in the accounts of the Holy Spirit in the years when food prices were highest. In 1595, for instance, reference was made to a 'poor woman', two Scots (probably soldiers, for one had been shot in the arm) and an Englishman. In 1597 another soldier arrived, plus a poor skipper and a woman with six children. All received a small sum of cash from the Holy Spirit: no more than a few *stuivers*.

Again, this was not unusual: the diaconate in Maassluis, for instance, a fishing village where the number of transients was much larger, followed the same course of action.[48] A little cash to buy some bread and get to the next village was all rural poor relief institutions had to offer to this group of nameless wanderers.

5. The crisis of the late 1690s

The Golden Age of the Dutch Republic did not put an end to periods of significantly raised prices. Dramatic grain price peaks continued to occur, for instance in 1630/31, 1661/62, and also in 1698/99.[49] The crisis of the late 1690s was intense, but not as long-lasting as its predecessor in the late 1590s. Due to a cold and wet summer, in 1698 harvests failed in large parts of northern Europe, including the Baltic region. When in October the city of Danzig prohibited all grain exports, authorities in the Dutch Republic were alarmed. The mayors of Amsterdam, a city dominated by mercantile interests and at other times a staunch protagonist of free grain trade, pleaded with the Estates General for an export prohibition. The Estates, convinced that serious trouble was on its way, readily conceded. Grain prices did not abate in the next year and the export prohibition remained in force. The option of at least partially lifting the prohibition was often discussed, not only because the grain trade was the backbone of Amsterdam's wealth but also because the authorities were very much aware that export prohibitions were likely to discourage imports and might thus exacerbate the situation. However, only in 1700, when Danzig reopened the trade, were the export bans revoked, at first partially, and finally, in September, completely.[50]

During the two years of the crisis many towns and villages in Holland faced grain shortages. Bread prices, which through the system of bread price setting were connected to grain prices, rose. The authorities in Haarlem sold grain to the local bakers for submarket prices in order to avoid another increase of the bread price.[51] Amsterdam did the same, restricting the sale of subsidized bread to poor household. The captains of the civic militia were given the duty to identify these households and issue them with tokens to be handed in at the bakeries. They did not have an easy job: in the poor quarters of the city the mood was getting grim. Concerned about the possibility of famine among the urban population,

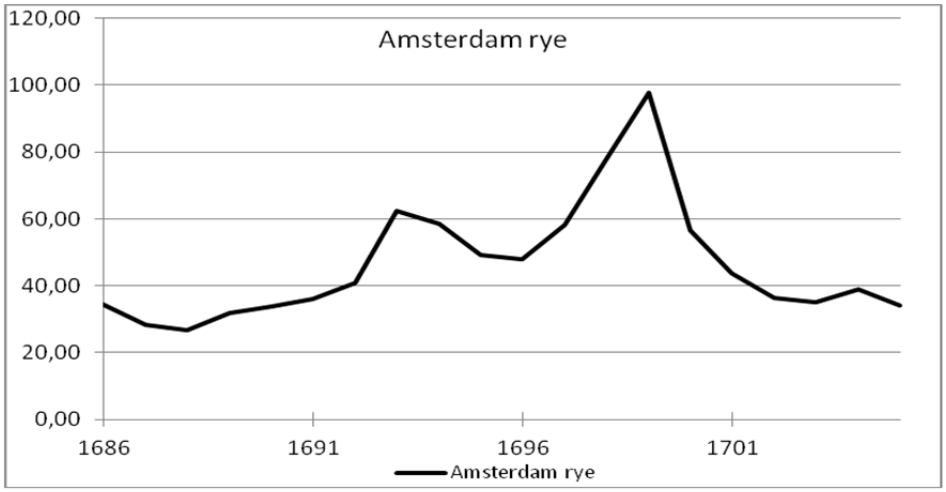
[48] Abels and Wouters, *Nieuw en ongezien* 2, 285–286.
[49] Dijkman, "An early escape from hunger?"
[50] Van Dillen, "Dreigende hongersnood.", esp. 195, 212, 225.
[51] De Vries, "Political economy of bread," 104.

Amsterdam also curtailed grain transports from the city to other places in the Republic: such transports required a license issued by the mayors. Licenses were granted only sparingly, although Amsterdam towns and villages in Holland were given preference over communities in the other provinces.[52]

The towns of Holland resented the restrictions imposed by Amsterdam, but took similar measures themselves. In Rotterdam, inhabitants from the villages surrounding the town were allowed to buy on the urban market only what they needed for their own households for a week; purchases that according to the local officials exceeded household requirements were to be returned to the seller. Village bakers who wanted to purchase stocks required a special pass from the town secretary.[53]

Price data confirm the severity of the situation. Between 1686 and 1690 the average rye price at the Amsterdam corn exchange had been around 97 guilders per *last* (3010 liters); as graph 3 shows, in 1699 the price had more than tripled. That in Amsterdam grain prices were higher than in the neighbouring countries "and possibly than anywhere else in the world", as a member of the Estates of Holland claimed, is not true, but a comparison with wheat prices with London and Paris shows that although Amsterdam was not much bothered by the dearth that London and Paris had had to deal with in the early 1690s, in 1698/99 the city was no better off than its counterparts in France and England (see Appendix).

Graph 3: Rye prices in Amsterdam (Corn Exchange) in gr Ag/hl, 1686-1705



Source: Posthumus, *Nederlandse prijsgeschiedenis* 1, 573-576.

[52] Van Dillen, "Dreigende hongersnood," 215–220.
[53] Hazewinkel, "Misgewas en duurte," 176–177.

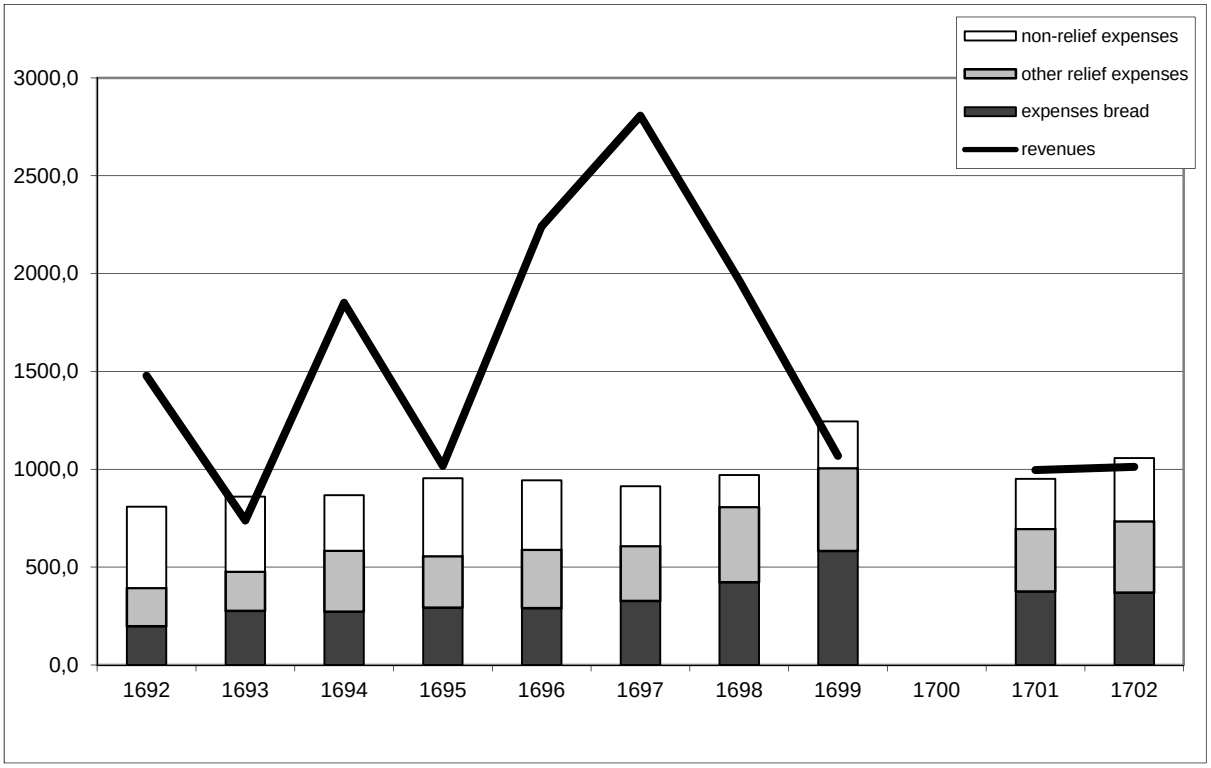
Burial data from Rotterdam, virtually the only sizable town for which reliable long-term demographic research has been done, suggest that the crisis had an impact on mortality: although in 1698 the number of burials was not raised, in 1699 it was 36% above the normal level.[54] Figures for burials at the Reformed Church in Berkel point in the same direction: here, in 1698 the number of burials was 21% and in 1699 24% above normal.[55]

The dearth put poor relief institutions under pressure: as demand rose, so did expenses. Some urban institutions acted with foresight. The diaconate of the Dutch Reformed Church in Rotterdam had purchased, at considerable costs, a large quantity of grain before it was too late. The town council agreed to bear the expenses and also promised additional grain from the urban granaries if supplies should run out.[56] The Holy Spirit in Berkel was also confronted with mounting expenses, leading to a deficit in 1699 (graph 4). However, this deficit was small and it was more than compensated for by the surpluses of previous years. A substantial part of these surpluses had been invested in government bonds, but the organization retained a liberal buffer in cash. While in the late 1590s the purse had been almost empty, this time the Holy Spirit was never in any kind of financial trouble.

As we saw earlier, at the end of the seventeenth century the pattern of expenditure was different from what it had been a hundred years earlier, but the Holy Spirit still spent substantial sums on 'bread and groceries' (*brood en winkelwaren*), as it is called in the accounts. Expenses on this item increased during the crisis. Between 1692 and 1694 the average annual sum spent on bread (and groceries) was 249 guilders; in 1699 it was 582 guilders. Unfortunately, the late seventeenth-century accounts do not systematically mention how many households received relief in the form of bread. Sometimes a short list of decisions on allowances is attached to the accounts, showing that most households received one or two six-pound loafs of bread per week, but the registration is haphazard; the cashbooks that must have contained the details have not been preserved.[57] Expenditure on bread did show a greater increase than rye prices or bread prices, as graph 5 demonstrates. This suggests that more bread was distributed, even though it does not necessarily follow that the number of recipients also increased. Certainly transients were treated no differently than in the 1590s: they were given small amounts of cash, but no more that.

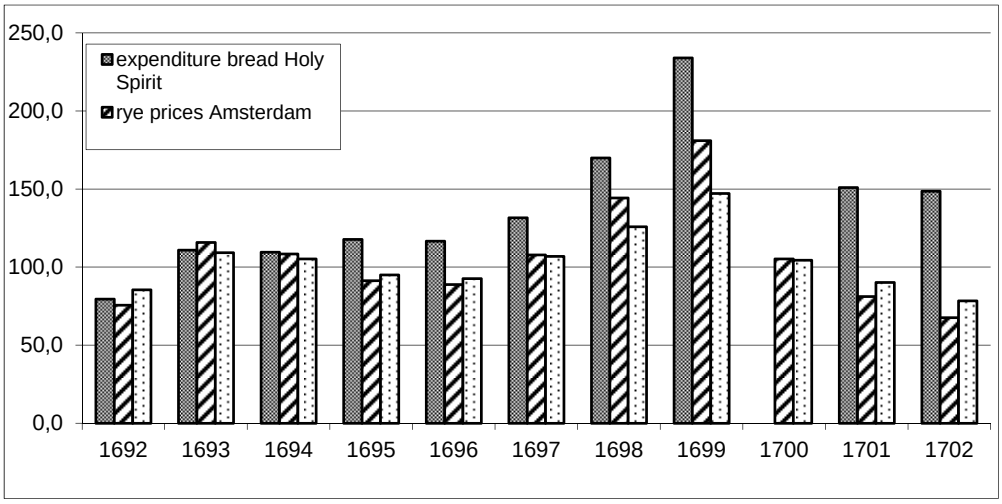
[54] Dijkman, "An early escape from hunger?"; Mentink and Van der Woude, *Demografische ontwikkeling te Rotterdam*, 124–127.
[55] SR Archief Hervormde Gemeente Berkel en Rodenrijs, inv. no. 1414-755 (transcript at the website of the Rotterdam archive: http://www.stadsarchief.rotterdam.nl/berkel-en-rodenrijs)
[56] Hazewinkel, "Misgewas en duurte," 172.
[57] SR AABR, appendices to accounts over 1692 and 1695 (but referring to later years).

Graph 4 Expenditure and revenues of the Holy Spirit in Berkel, 1692-1594



Source: SA, AABR inv. no. 496.
Investments in government bonds of 600 guilders in 1694, 2576 guilders in 1696 and 2000 guilders in 1697 have not been included in non-relief expenditure.

Graph 5 Indices of expenditure on bread (and groceries) by the Holy Spirit in Berkel, rye prices in Amsterdam and bread prices in Leiden (average over 1692-1694=100)



Sources: see graphs 3 and 4; Leiden bread prices: from Allen, datafile "Amsterdam", column BG.

Notably, an effect similar to what was observed in the late 1590s can be discerned here: expenses for bread remained at relatively high levels in the years directly following the crisis.

The account of 1702 is followed by a series of withdrawals or reductions of allowances dating from the year 1705: something not found in any of the accounts since 1684. This may simply be the effect of arbitrary registration, but if it is not, than this suggests that for some people recovery after the crisis took several years. This is yet another sign that the impact of a a severe episode of dearth was, even in a wealthy country like seventeenth-century Holland, not negligible.

6. Conclusions

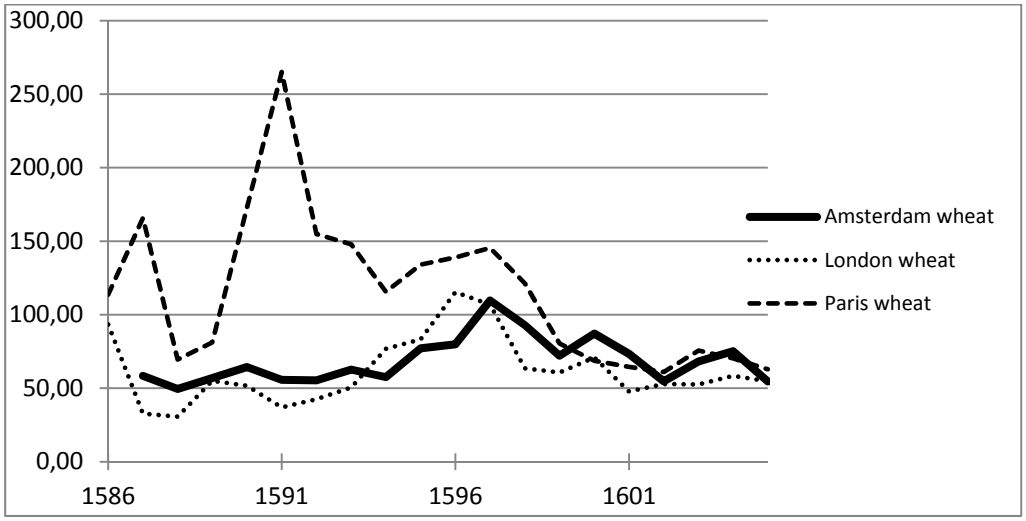
The aim of this paper was to assess the capacity of rural poor relief systems in Holland to cope with food crises against the background of the transformation of rural society that took place between in the late sixteenth and early seventeenth centuries. In both of the two periods under examination the Holy Spirit in Berkel helped to mitigate the impact of the crisis: it raised its level of expenses to accommodate an increased demand of its 'regulars' in the face of significantly raised food prices. In the late 1590s it was also flexible enough to help others: people who had previously been able to manage on their own, but were unable to do so in times of dearth. Although this put a heavy pressure on finances, the organization just managed to get through without having to take recourse to credit.

During the crisis of the late seventeenth century, at a time when even in normal years both in absolute and in relative terms many more people required relief than a century before, the Holy Spirit was nevertheless able to give that support. If anything, the sound financial situation allowed the organization to shoulder the burden with greater ease than before: the system showed no signs of the collapse predicted by De Swaan. If, as the literature on famines claims, the countryside was the weakest link in the entire regional relief system, then the fact that in Holland this link was reinforced by well-functioning rural organizations may indeed have helped to keep famine at bay. There was, however, a double price to be paid. Firstly, continuity of the system was ensured by reducing allowances in normal years: at the end of the seventeenth century people received much less than a hundred years earlier. Secondly, relief was, both in the early and in the later period, largely restricted to locals. This second aspect is of course not new, but it is an important consideration in view of the fact that hunger-induced diseases spread easily when people were at drift. Keeping them where they were thus mattered, but the same system that promoted this, also disadvantaged those that were on the move anyway.

Finally, although this analysis of a rural poor relief system has not challenged the statement that Holland escaped from famine at an early stage, it did bring up some issues to nuance that claim. It is difficult to establish if the crisis of the 1590s was accompanied by raised mortality, but there are indications that this was the case in the late 1690s: not a dramatic increase perhaps, but an increase nonetheless. In addition, there are also indications that for some recipients of poor relief both crises had a long-lasting impact and that recovery was not immediate.

Appendix

Wheat prices in Amsterdam, London and Paris in Ag/hl, 1586-1605



Wheat prices in Amsterdam, London and Paris in Ag/hl, 1686-1705

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