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“Please give me an invoice”: VAT evasion and the Portuguese tax lottery

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an invoice

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Abstract

Purpose – The Portuguese tax authority implemented a lottery to encourage citizens to request invoices as a strategy to fight value-added tax (VAT) evasion. As the law does not require citizens to request sales invoices with the consumers' tax number, doing so is a form of voluntary cooperation in tracking down tax evaders. The purpose of this paper is to understand why ordinary citizens decide to join forces with tax authorities in the fight against VAT evasion by requesting invoices with their tax identification number.

Design/methodology/approach – An empirical study was conducted to explore the underlying motivation for Portuguese consumers to request sales invoices with their personal tax identification. The study combines quantitative and qualitative data.

Findings – The results from this study show that rewarding citizens is clearly a factor to be considered in any policy to maximize citizens' cooperation in tracking down tax evaders. They indicate that fiscal benefits have a stronger effect on the request of invoices than the lottery and that it is necessary to promote good governance and justice.

Practical implications – Findings should be used to inform a cost-effective public policy that takes into account citizens' concerns and combine deterrent measures and rewards in the form of tax benefits, rather than tax lotteries.

Originality/value – This paper provides new insights into VAT lotteries, which seem to be increasingly favored by policy makers but are an area under-researched. By recommending a course of action to maximize citizens' cooperation in tracking down tax evaders, the paper provides useful practical implications and is a contribution for the study of VAT evasion policies.

Keywords VAT evasion, Fiscal benefits, Invoices, Tax lotteries, Tax policies

Paper type Research paper

Introduction

Paying taxes is a civic duty in that revenues from these taxes enable governments to pursue public policies presumed to be in the common interest. Taxes are particularly important in periods of austerity, when governments take measures to squeeze public spending and increase tax collection to reduce public debt. This strategy often generates public resentment. Struggling with tight personal budgets and getting less in return for their taxes, citizens may be unwilling to comply with tax authorities. It is therefore crucial to develop effective approaches to improving taxpayer cooperation. The focus of this paper is on a strategy used by the Portuguese tax authority to engage citizens in cracking down on potential tax evaders in a context of financial bailout.

Portugal was the third Eurozone country to have to ask for an international bailout, after Greece and the Irish Republic. To achieve the targets established by the bailout agreement in 2011, the Portuguese Government introduced a surcharge of 3.5 percent on income and raised taxes. The value-added tax (VAT) rose 2 percentage points in two years, and at the time of writing the standard rate is 23 percent. Traditional attempts to foster tax compliance



based on deterrence models have been unsuccessful, and tax evasion has remained a widespread problem in the country.

In 2013, the Portuguese tax authority announced a paradigm shift regarding the approach to tax evasion based on a closer contact with taxpayers by sending e-mails or text messages with notifications of tax submission deadlines and warnings of audits. A scheme was implemented according to which part of the VAT received for some services (hairdressing, car repair services, hotel and catering services) could be returned to the customers, if they requested the invoices for the goods or services supplied. The government attempted to implement a new piece of legislation that would oblige consumers to provide their fiscal number whenever they made a purchase. Public reaction was negative and thousands of Portuguese citizens instead of providing their own number, requested the invoice using the number of the prime minister and the then chancellor of the exchequer.

One year later, a lottery (“Fatura da sorte,” literally “lucky invoice”) was launched to “value and reward taxpayers fiscal citizenship” (Decreto-Lei 26-A/2014, 1452-2) and engage them in cracking down on tax evaders by requesting invoices for goods and services they have paid for. These invoices must include the purchaser’s personal tax identification number and are converted into lottery tickets according to the value of each transaction. Since then, weekly lotteries have been held and the draw broadcasted live on television. Initially, upmarket cars were offered as prizes, but two years later they were replaced by ordinary treasure bills of €35,000 every week and €50,000 twice a year.

According to governmental sources (Governo de Portugal, 2015), in 2014 the number of sales invoices with the consumer taxpayer number communicated to the tax authorities leapt by 36.3 percent in comparison to the previous year, and one year later, the total number of sales invoices increased by 51.2 percent (Governo de Portugal, 2016). The VAT-GAP, an estimation of the revenue losses due to tax evasion, decreased from 16 to 12 percent between 2013 and 2014 (European Commission, 2015). This has been attributed to the lottery and the fiscal benefits mentioned above, but no study has been conducted to assess the exact impact of the above measures on tax revenues.

As in other European Union countries, an invoice is required for VAT purposes, either in electronic or paper form, for goods and services transactions. If the buyer agrees with the seller not to include the VAT on the price, the government suffers the loss of tax revenue. VAT revenues represented in 2015 around 72 percent of the total indirect taxes and 38.2 percent of total tax revenues, but it is thought that a large proportion of VAT is uncollected due to business transactions, which fail to provide invoices to consumers (FFMS, 2017).

The assumption underlying tax lottery schemes is that unless citizens are offered an extrinsic reward they will not cooperate with tax authorities in chasing tax dodgers. Admittedly, there is research that supports the view that rewarding citizens increases their compliance. However, other studies indicate that most citizens are potentially willing to comply with the tax authority if they believe it is the right thing to do (e.g. Alm and Torgler, 2011). Furthermore, other factors play a crucial role in influence compliance decisions, as discussed later.

Although still rare in Europe, tax lotteries have been used to increase VAT compliance in various countries (e.g. Brazil, China). Nonetheless, VAT lotteries have been largely overlooked in the literature (Delgado and Sequeira in Fookan *et al.*, 2014). Admittedly, there exist studies (Naritomi, 2015; Wan, 2010) that have investigated monetary reward systems in the form of tax lotteries and their effectiveness in terms of costs and benefits. However, surprisingly, the impact of tax lotteries on consumers’ attitudes to cooperate with tax authorities has not yet been examined.

This study aims to address the above gap in the literature and discuss the VAT tax lotteries as a policy design to combat VAT evasion. Specifically, the current study explores

the motives that influence Portuguese citizens to join forces with the tax authority in chasing VAT evaders by requesting sales invoices with their tax identification number. This is particularly relevant in a context of austerity measures as a consequence of a huge public debt.

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The paper begins with an overview of the relevant literature, followed by the development of the research questions to be investigated. The empirical study is then presented, and the results discussed. In the final section, limitations are acknowledged and some conclusions are drawn.

Tax lotteries

The literature on tax compliance shows that attempts to promote tax compliance based only on deterrence measures have been rather ineffective (see e.g. Feld and Frey, 2002; Kirchler, 2007). Consequently, tax authorities have turned to strategies that focus on motivating citizens to cooperate with them. In the last few decades, instrumental motivations have received much attention (Tyler, 2011). Financial incentives to elicit desirable behavior have been used for centuries in different fields, but research on positive rewards applied to tax compliance is still scarce.

There is evidence that supports the view that rewarding taxpayers increases their compliance. For example, Alm *et al.* (1992) conducted a study with different reward systems and concluded that there were advantages in using the lottery scheme. Similarly, Bazart and Pickhardt's (2010) experimental design revealed that rewards in the form of individual lottery winnings had a strong positive impact on tax compliance. Other findings (Brockmann *et al.*, 2016; Torgler, 2003, 2007) point in the same direction. Conversely, a study on the effectiveness of bonuses for compliance and fines for non-compliance found that the effect of bonuses on compliance was much weaker than had been predicted (Nosenzo *et al.*, 2014).

A variety of monetary reward programs either through tax refunds or lotteries have been implemented in different countries. In Peru, compliant taxpayers are rewarded with tax rebates and preferential treatment. In Teziutlán, Mexico, gifts (e.g. furniture and electrical appliances) are monthly drawn for compliant taxpayers. In Argentina, the tax authority implemented a lottery and the prize was cash. The lottery was initially well received, but the public enthusiasm waned, and it was later replaced by another type of lottery. After sending the billing information online, taxpayers received a number to win a car. Once more, the initial enthusiasm for the lottery decreased and the program was abandoned (Giarrizo, 2012).

Naritomi (2015) investigated the role played by rewards in improving tax enforcement by analyzing a monetary reward program implemented in the Brazilian city of Sao Paulo designed to address VAT evasion. Consumers who asked for invoices were rewarded with tax rebates and monthly lottery prizes. An online system was also created for consumers to verify invoices reported by establishments, and filling complains if they failed to do so. According to her findings, the companies reporting revenue augmented by 22 percent over four years. China, Korea, the Philippines, South Korea, Taiwan, among other countries, also run monetary reward systems in the form of lottery schemes. The general conclusion seems to be that they promote tax compliance (Naritomi, 2015; Wan, 2010).

The first country in Europe to introduce a VAT tax lottery was Malta in 1997, where consumers are required by law to keep the invoices for 24 hours after the purchase (Ungureanu and Dascălu, 2015). Slovakia started a VAT tax lottery in 2013 and consumers have to register the invoices in the lottery draw with the unique identification number of the cash register issuing the invoice, the date and time of the transaction and the amount of the transaction (Fookan *et al.*, 2014). A VAT tax lottery was also implemented in Romania in 2015. Among other requirements, invoices must be issued by a fiscal electronic cash register and only the invoices with the winning amount can enter the competition. To the best of

our knowledge, there is no published information regarding the effect of these lotteries on VAT evasion.

Despite their popularity, much controversy remains over the use of lotteries (see Rychlak, 1992). While positive rewards in the form of financial incentives have been used with some success, there is also evidence that materialistic incentives can have a harmful effect on civic duties and can thus crowd out a sense of public spiritedness. The crowding out of the intrinsic motivation has been thoroughly studied. An important contribution for the understanding of the crowding-out effect came from Titmuss (1997), who investigated why the American market-based system of blood donation was inferior to the British system, which was based merely on altruistic contributions. He concluded that offering money to pay for the blood eroded citizens' sense of duty.

To attach a financial value to something that is considered socially important may degrade one's "moral standing" (Tetlock, 2003). Or, as Morgan (2000, p. 777) claims, "the linkage between private gain from lotteries and public goods provision may actually reduce a taste for altruism or 'warm glow' that individuals obtain through giving." Thus, incentives create a potential conflict between the direct extrinsic effect of the incentives and how these incentives can crowd out intrinsic motivation in the short run and the long run. Following this idea, it is plausible to think that if Portuguese consumers requested an invoice because they thought it was the right to do, the tax lottery may change their motivation to do so.

Motives to request an invoice with the personal tax identification number

Under the Portuguese fiscal law, consumers are required to ask for an invoice when they purchase goods and services (Governo de Portugal, 2012), but there is no legal obligation to keep the invoice. Most pertinent for this study, there is no legal obligation to request invoices with the consumer's tax identification number. Hence, requesting an invoice is optional and it may be considered as a response to the tax authority request to ask for sales invoices. Broadly speaking, compliance is a response to a request to act in a desired manner and various factors influence compliance decisions (see e.g. Cialdini and Goldstein, 2004). In the case of requesting sales invoices, several considerations may influence Portuguese consumers.

Portuguese consumers may ask for invoices hoping to win the lottery prize or to receive the tax benefits mentioned above. If this is the case, they will be more likely to request invoices if they obtain a personal material benefit. Moreover, the Portuguese are the biggest European spenders per capita on draw base games (e.g. EuroMillions lottery) (EUROSTAT, 2017). A taste for gambling may influence the willingness to ask for an invoice, although the relationship between a taste for gambling and willingness to participate in tax lotteries remains unproved.

Financial interest may not be the key driver behind the request of invoices. As the literature available regarding compliance indicates, compliance is frequently based more on ethical considerations rather than instrumental motives (e.g. Alm, 2019; Alm and Torgler, 2011). The moral imperative to be honest regarding taxes has often been referred to as "tax morale" (e.g. Feld and Frey, 2002; Torgler, 2003; Williams and Horodnic, 2016). Thus, Portuguese consumers may ask for invoices driven by ethical concerns and a sense of civic duty.

Consumers may ask for the invoice merely because they think that is what others do and expect them to do. Social influence is clearly important in determining compliance (e.g. Wenzel, 2007), and the motivation of behaving in a cooperative way is often influenced by the desire to follow social rules (Frey and Torgler, 2007). Perceptions of the dominant social norms are also important determinants of compliance, but it is not possible to state that the behavior of requesting invoices is a social norm. Unlike paying taxes, requesting receipts is not yet established as a pattern of socially desirable behavior. Social links are essential for compliance and individuals feel inclined to support groups to which

they belong (Tyler, 2011). Research findings suggest an association between patriotism and motivation to cooperate with the state (e.g. Gangl *et al.*, 2016). Hence, Portuguese consumers may request the invoices motivated by patriotic feelings.

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Perceptions of justice have consistently been found to play a crucial role in tax compliance (e.g. Feld and Frey, 2007; Tyler, 2006, 2011; Wenzel, 2003). Albeit indirectly and unintentionally, consumers who pay for products or services and do not ask for an invoice cooperate with tax evaders. Thus, Portuguese consumers may ask for the invoices because they think that those who evade VAT obtain an unfair advantage over non-evaders. Furthermore, numerous studies show that in countries where the informal economy is widespread, perceptions of tax evasion are more favorable (e.g. Heyes and Shapland, 2017). Thus, the willingness to request an invoice may be negatively associated with the acceptability of tax evasion.

Finally, sociodemographic attributes may explain variability in the willingness to request invoices. Existing literature on tax evasion has suggested that older taxpayers and women tend to be more compliant (e.g. Devos, 2014; Lago-Peñas and Lago-Peñas, 2010; Williams and Horodnic, 2016), and the self-employed have been found to possess lower tax morale (Frey and Torgler, 2007). The effect of education and qualifications on tax avoidance behavior is not yet well understood (Devos, 2014). Some studies indicate that the more educated are more likely to be compliant (Lago-Peñas and Lago-Peñas, 2010), but other studies show an absence of any relationship between education and tax morale (Molero and Pujol, 2012).

Summarizing, financial incentives can increase compliance, but can also undermine the spontaneous will of individuals to take a voluntary action. In the case of requesting sales invoices, since there is no legal obligation to request them with the consumer's tax identification number, Portuguese consumers may choose to do so for different reasons. They may request invoices attracted by the material rewards (lottery prize and financial benefits), but they may be motivated by non-financial reasons such as ethical and justice concerns, social influence and social links. It is plausible to think that attitudes toward requesting invoices may be associated with the acceptability of tax evasion. Individual characteristics may play a role in the willingness to request invoices.

The current study

The key aim of this study was to investigate the motives that might influence citizens to request invoices with their personal tax identification number and, more broadly, to cooperate with the tax authority for improving tax compliance. It was hypothesized that the willingness to request invoices with the consumer's tax identification number was positively associated with rewards (the lottery prize and tax benefits), perceptions of justice, civic duty/tax morale, social influence, patriotic feelings, and negatively associated with the acceptability of tax evasion (tax morale). Sociodemographic factors were also explored.

Data and method

Participants

After obtaining permission from the University's Ethics Committee, a sample ($n = 942$) was obtained through a snowball technique whereby respondents were invited to complete an online questionnaire and were asked to pass the questionnaire to friends, colleagues and acquaintances. The criterion for participation was completion of secondary education and the sample for this study consists of respondents who requested invoices with their tax identification number. A total of 11 respondents who had never provided their tax number were removed from the initial sample. Data were analyzed using IBM SPSS Statistics (v25).

The mean age of the respondents was 43.55 years ($SD = 13.807$, min. = 18, max. = 81) and 485 (52.1 percent) were female. About 82.1 percent had attended higher education

(of whom 30.4 percent had post-graduate studies), and 17.9 percent had received the secondary or vocational education. Most respondents were in active life, 68.2 percent were employed either in private or public (39.5 percent) organizations, 13.1 percent were self-employed, 7.6 percent were students, 6.7 percent retired and 3.1 percent unemployed (see Table I).

Instrument

A questionnaire was built for this study. Respondents were asked if they requested an invoice with their tax personal identification number whenever they paid for products or services. On the basis of prior research on tax compliance, in particular Kirchler and Wahl (2010), respondents were asked to choose three reasons for requesting an invoice (“When I ask for an invoice I do so because [...]”): (a) “I can win a prize in the lottery”; (b) “I can receive tax benefits”; (c) “if we all ask for an invoice all taxpayers would pay less and we would all benefit” (perceptions of justice); (d) “it is my duty as a citizen”; (e) “to support the state and other citizens” (social responsibility); and (f) “it is what others expect me to do” (social influence).

Tax morale was measured by a single item: “Generally speaking, is cheating on tax never justified, always justified or something in between? (1 = never justified; 9 = always justified).” This item has been widely used in other studies (e.g. Kirchler and Wahl, 2010).

To explore the possibility that potential personal gains from VAT non-compliance might influence the likelihood of asking for an invoice, one hypothetical situation was included. Respondents were asked about the likelihood of requesting the sales invoice if a discount was offered resulting from not charging VAT (23 percent) on a €5,000 value service using a response scale in which 1 = very unlikely and 5 = very likely.

	Total sample <i>n</i> = 931 <i>M(SD)/n(%)</i>	“I always ask for an invoice with my tax number”		<i>p</i>
		Yes (<i>n</i> = 536) (57.6%) <i>M(SD)/n(%)</i>	No (<i>n</i> = 395) (42.4%) <i>M(SD)/n(%)</i>	
<i>Age</i>	43.54 (13.814)	44.73 (13.948)	41.92 (13.482)	0.002
<i>Gender (female)</i>	485 (52.1%)	287 (59.2%)	198 (40.8%)	0.302
<i>Education level</i>				
Secondary school	167 (17.9%)	107 (20.0%)	60 (15.2%)	0.115
Bachelor’s degree	481 (51.7%)	276 (51.5%)	205 (51.9%)	
Post-graduate studies	283 (30.4%)	153 (28.5%)	130 (32.9%)	
<i>Self-employed (0/1; no/yes)</i>	122 (13.1%)	49 (40.2%)	73 (59.8%)	< 0.001
<i>Knowledge about benefits of the invoice (1–5)</i>	4.02 (0.874)	4.03 (0.832)	3.99 (0.928)	0.498
<i>Taste for gambling (1–4)</i>	2.04 (0.788)	2.07 (0.801)	1.99 (0.767)	0.167
<i>Patriotic feelings (1–5)</i>	4.09 (0.883)	4.13 (0.892)	4.04 (0.869)	0.152
<i>Tax morale (1–9 scale)</i>	2.67 (2.136)	2.54 (2.125)	2.85 (2.139)	0.031
<i>Possible VAT non-compliance (1–5 scale)</i>	3.11 (1.418)	3.07 (1.438)	3.16 (1.392)	0.313
<i>Reasons for requesting the invoice with individual tax number</i>				
Expectation of the lottery prize	60 (6.4%)	37 (61.7%)	23 (38.3%)	0.507
Tax benefits	484 (52.0%)	285 (58.9%)	199 (41.1%)	0.399
Perceptions of justice	560 (60.2%)	351 (62.7%)	209 (37.5%)	< 0.001
Civic duty	441 (47.4%)	288 (65.3%)	153 (34.7%)	< 0.001
Social responsibility	121 (13.0%)	68 (56.2%)	53 (43.8%)	0.743
Social influence	18 (1.9%)	13 (72.2%)	5 (27.8%)	0.204

Table I.
Respondents and reasons for requesting an invoice with the tax number

Notes: *n* = 931. Two groups of respondents: Yes = respondents who always requested an invoice with their tax number; No = respondents who many times or few times requested an invoice with their tax number

Two questions dealt specifically with patriotism: “For me, belonging to the Portuguese community is very important” and “I feel proud of belonging to the Portuguese community” (1 = completely disagree; 5 = completely agree) and the patriotic feelings variable was assessed taking into account the average of both questions. Two questions evaluated the “taste for gambling” and the “degree of knowledge about the benefits of asking for an invoice with the personal identification tax number.” The former was assessed by a four-point scale (1 = always; 4 = never) and the latter by a five-point scale (1 = null; 5 = very good).

The questionnaire included an open question inviting respondents to give their suggestions regarding the tax lottery. Respondents were asked to identify their age, gender, educational level and occupation. Table I shows the most relevant variables.

Findings

Survey findings

More than half of the sample (57.6 percent) always requested an invoice with the tax number whenever they made a purchase. The majority of the respondents rated their knowledge about the advantages of requesting an invoice as good (40.3 percent) and very good (33.2 percent). Regarding tax morale, for 45.6 percent of the respondents tax evasion was never acceptable, and only 1.9 percent thought it was always acceptable ($M = 2.67$, $SD = 2.136$, on a nine-point scale where a lower value corresponds to a higher tax morale). However, answers to the hypothetical situation of evading VAT revealed that the likelihood of requesting an invoice decreased when there were potential personal gains. For 41.3 percent of the respondents, it would be likely or very likely that they would not request an invoice if they were offered a discount of 23 percent by avoiding VAT.

The scores for patriotic feelings ($M = 4.09$, $SD = 0.886$, on a 1–5 scale) were relatively high and the results indicate a relatively low taste for gambling ($M = 2.04$, $SD = 0.788$). The large majority of the respondents had seldom participated in lottery games (55.3 percent few times and 23.4 percent never). Regarding other variables (gender, employment, knowledge about the benefits of the invoice and taste for gambling), no differences were found between respondents who always asked for invoices and those who asked many times or few times (Table I).

Significant differences were found between respondents who requested an invoice with their tax number and those who did not. The former were significantly older ($M = 44.7$, $SD = 13.948$ vs $M = 41.9$, $SD = 13.482$, $p = 0.002$), not self-employed ($p < 0.001$) and showed considerably higher tax morale (where lower value means higher tax morale, $M = 2.54$, $SD = 2.125$ vs $M = 2.85$, $SD = 2.139$, $p = 0.031$).

Tax morale was explored by dividing the sample into two groups using the median as a cut-off point and then a χ^2 test was performed. Results show a significant relationship between the frequency of requesting invoices and tax morale (higher vs lower) ($\chi^2(1) = 10.480$, $p = 0.001$, OR = 1.544, 95%CI: 1.186–2.009). The probability of always asking for the invoice was 1.5 times higher when respondents had a tax morale score higher than the median.

As for reasons to request the invoice with the tax number, the majority of respondents (60.2 percent) chose a “matter of justice,” followed by “getting tax benefits” (52 percent) and “civic duty” (47.4 percent). For a smaller percentage of respondents, the reason was to support the state and other citizens (social responsibility) (13 percent), the possibility of receiving the lottery prize (6.4 percent) and social influence (1.9 percent). See Table I.

The respondents who always requested the invoice with their tax identification number due to “perceptions of justice” and “civic duty” did so significantly more than those who did not always request an invoice (respectively, 65.3 vs 34.7 percent, $p < 0.001$ and 62.7 vs 37.5 percent, $p < 0.001$). No significant differences were found for other motives (lottery prize, tax benefits, social responsibility and social influence) (Table I).

Qualitative findings

Quantitative data are objective and give a broad picture, but qualitative methods are particularly suitable for gaining insights into opinions and motivations. As mentioned earlier, the questionnaire included an open question, which attracted many comments and, as the large and rich body of suggestions and remarks complemented the quantitative data, they were analyzed in detail. Of the entire sample, 32.6 percent wrote down their opinions and suggestions. The broader analytic process involved discussion of the major themes with the three members of the research team. The data coding and analysis was conducted using QDA Miner v.20.

A total of six categories emerged representing the major themes, and of the total number of suggestions, 27.4 percent involved to increase control over potential tax evaders and punish tax evaders; 25.7 percent a decrease of taxes and an increase in tax deductions and other benefits; 12.7 percent regarded governance issues, and 10.5 percent involved equity and justice concerns; and 8 percent education. In what follows, we shall present an overview of the most salient findings.

Views on the lottery. We begin by commenting on the main views on the tax authority-run lottery. On the whole, respondents approved of the lottery as a means of motivating consumers to ask for an invoice to fight tax evasion. As one participant put it, "It is the principle of the carrot that functions for all activities." There were nevertheless respondents who disapproved of the lottery and thought it was a bad idea to replace civic duty with lotteries: "To give benefits (prizes) to customers who ask for an invoice subverts the civic principle on which the tax system is based, which is to think about the community and not the individuals."

Governance. The most salient issues involved broad concerns regarding bad governance and corruption. Many respondents blamed the government and politicians in general for tax evasion. Some respondents seemed to take the opportunity to vent their feelings regarding the government, banks and big corporations writing long and emotional paragraphs. This is clearly exemplified in the following:

"Those who earn little money have to pay taxes, those in charge of banks and who owe millions are forgiven and amuse themselves." The phrase "the corruption of politicians" recurred several times, and the suggestions to fight tax evasion capture well their views: "[the best way to fight tax evasion] is to send the politicians to jail"; "[politicians] should stop robbing the country."

The importance of developing trust and credibility was also often mentioned as well as calls for transparency and accountability regarding the money from tax collection. Accordingly, it was suggested that the state should set the example by reducing expenses and strengthening democracy to promote trust and goodwill to carry out civic duties, such as paying taxes. The following quote illustrates this idea: "They [governments] should show that the money is used for the public good."

The perceived treatment by tax authority was often commented upon. For some, taxpayers were treated as if they were criminals, and it was suggested that tax authority should use a more humanistic approach. As one of them argued, "it is enough to read the documents sent by the Portuguese tax authority to see that threats and intimidation are the usual means to deal with taxpayers;" "To have to go to the local tax office is a painful experience, and the customer service is appalling." Many respondents claimed that the only way to promote citizens' cooperation was to increase the credibility of public institutions and get them closer to the citizens. Some pointed out that the Portuguese legislation was based on the idea that citizens are unreliable and unworthy of trust.

Control and punishment. An examination of respondents' suggestions distinctly indicates that control and punishment were seen as the most powerful method to fight tax evasion, and some of these suggestions included denouncing tax evaders. Here are some

illustrative examples: “Prizes for those who anonymously report tax evaders and protection of their identity, instead of lotteries!”; “Tax inspection to bank accounts and property”; “Tighter control over companies, liberal professionals and public managers.”

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One respondent suggested that shop bags should be checked, and if the consumers could not show the invoice, they should be arrested. Along the same lines, another respondent suggested five steps in detail to fight tax evasion, all of them based on increasing control and punishment, with different degrees of punishment according to the level of tax fraud. Investing in audits and establishing a culture of denunciation was seen by some as the best way to fight tax evasion, and one respondent recommended the creation of a service to receive denouncements.

Justice concerns. A typical comment was that tax authorities were very efficient to the common people, but inefficient regarding the “big people” (powerful people, i.e., politicians, bankers). The suggestions related to justice express resentment and clearly indicate how ingrained perceptions are of the way tax evaders could get away with it without being punished. One of them articulated this: “The big scams are organized mainly by solicitors and accountants, not by common folk.”

Social injustice and an unfair tax system were mentioned by some as a reason for tax evasion. Another topic often mentioned was the undeserved poor, who lived at the expenses of the state. Respondents demanded inspections to those who were on unemployment benefits and/or other social benefits, and were getting an income without paying taxes. Some of them reported cases of acquaintances who were receiving benefits “and made fun of those who had to work,” while there were many people who needed help and could not get it.

Some respondents suggested that there were professional occupations prone to tax evasion such as housekeepers and building construction workers who did not pay taxes and were not tracked down by the tax authority inspectors. Other respondents expressed the thought that in Portugal there was a widespread bad image of business people, for whom the only way of escaping bankruptcy was by evading taxes.

Education and promotion of civic spirit. While some respondents thought that it would be impossible to change the Portuguese cultural mindset, others believed that the only way was through education. This is well illustrated in the following quote: “[It’s necessary] To make people aware that paying taxes is inherent to their condition of being citizens, instead of rewarding them with tax lotteries. To pay taxes is not a merit or a game, but an obligation.” About 8 percent of the respondents recommended the organization of campaigns to promote tax education and civic spirit. Some went further and suggested compulsory classes to teach the civic duty of paying taxes (and simultaneously create a line to receive denouncements), and free education on taxes for adults at different levels.

Tax and other benefits. As previously said, about 26 percent of the respondents favored tax and other benefits. Some of them suggested that the Portuguese tax authority should run more lotteries with small prizes so that more people could receive a prize. A significant part of the respondents thought that if taxes were lower, people would have less of an incentive to evade taxes. Others suggested other forms of giving benefits to taxpayers and rewarding those with high levels of compliance. Suggestions included more fiscal incentives without a cap. Some respondents suggested that “all expenses should be deductible on income taxes” and that “deductions should make a significant impact on the amount of taxes to pay.”

Technical and other suggestions. Technical and other suggestions covered the replacement of cash by cards, the creation of a software that would not allow any purchase to be made without issuing a tax invoice, the use of a language that could be understood by everybody (instead of “technical language” understood only by some), the reduction of the volume of legislation, abolition of offshore companies (e.g. in Madeira) and

the implementation of special programs for taxpayers unable to pay their taxes. A suggestion often referred to was the simplification of the tax system and one respondent suggested “a flat tax revolution.” Some respondents recommended that the invoice should be issued without the need to ask for it: “The question ‘Do you want an invoice?’” should be replaced by “If you do not want an invoice [...]”

Discussion

The purpose of the present study was to investigate the motives that may influence Portuguese citizens to request sales invoices with their personal tax identification number, and indirectly cooperate with tax authority for improving tax compliance.

Survey findings indicate that justice concerns, tax benefits and civic duty are the most important factors for requesting an invoice. They also reveal that the lottery is not a significant factor in encouraging respondents to always request an invoice with their tax number. Furthermore, results show a significant relationship between requesting invoices and tax morale, giving support to the line of research that shows a strong negative relationship between tax morale and participation in the informal economy (e.g. Torgler, 2003; Williams and Horodnic, 2016).

The qualitative findings are consistent with those of the survey. On a whole, respondents approved of the lottery and tax benefits as a means to fight VAT evasion, but they expressed serious concerns regarding governance and other social issues. Those who disapproved of the tax lottery argued that it was wrong to replace a civic duty with a financial reward.

Fairness and justice considerations motivated many respondents to request an invoice. Even though few of them asked for an invoice to help the state and other citizens, 47 percent perceived requesting an invoice as a civic duty. This finding is in accordance with previous research (e.g. Trivedi *et al.*, 2003), and suggests that Portuguese citizens are not purely driven by self-interest. They are also strongly concerned about issues of fair treatment and governance.

The responses to the open question indicate that attitudes toward requesting invoices reflect discontent with public services, disapproval of government policy and political dissatisfaction. These are factors that have been identified as playing an important role in compliance (e.g. Torgler and Schneider, 2007). Responses also clearly show that trust in the institutions is an important consideration for requesting an invoice and cooperating with the tax authority confirming previous research (e.g. Kirchler, 2007; Stark and Kirchler, 2017; Wenzel, 2003).

The responses to the open question offer insights regarding how respondents felt about how tax evasion has been addressed. They indicate that the perception that the government mismanages taxpayers' contributions makes them reluctant to fully cooperate with the tax authority, which is consistent with prior studies (e.g. Tyler, 2006). They also suggest that taxpayers feel that they are treated unfairly by the tax system. Respondents (presumably, compliant taxpayers) wanted more control over tax evaders and wanted to see them punished, an idea expressed in many of the respondents' suggestions for fighting tax evasion. This is fully in line with previous findings. People are willing to punish those who do not cooperate to prevent unfair outcomes (Fehr and Fischbacher, 2003), and both control and punishment are needed to fight tax evasion (e.g. Kirchler, 2007).

Findings with this sample do not confirm a relationship between asking for invoices and a taste for gambling, but they concur with prior research that shows that age has a positive effect on tax compliance and tax morale (e.g. Frey and Torgler, 2007; Stark and Kirchler, 2017). Older respondents were more likely to request an invoice out of a sense of civic duty. In line with some studies on tax compliance (Frey and Torgler, 2007), the self-employed asked less for sales invoices than other professional occupations. As for gender, no significant differences were found in accordance with other studies (e.g. Bazart and Pickhardt, 2010).

Undeniably, the current findings provide evidence that tax benefits motivate consumers to request invoices. While not denying the importance of material rewards, the moral considerations expressed by some provide support for the idea that asking for an invoice is not entirely only about benefits. Responses to the open question show anger over the flow of fiscal burden and broad concerns regarding governance, justice and social obligations.

Please give me
an invoice

It is not possible to evaluate the effect on VAT evasion without knowing exactly how much revenue is lost from VAT non-compliance and how much is spent on the lottery. It is also difficult to isolate the effect of the lottery from the impact of fiscal benefits. The hope of the lottery policy is that Portuguese consumers grow accustomed to requesting an invoice and will continue to do so without the aid of lottery. However, the enthusiasm for the new lottery may fade over time and lead to a decrease in requests for invoices as it happened in other countries (see Giarrizo, 2012). Quite apart from considerations concerning the sustainability of the tax lottery, policies that count on self-interest rather than civic considerations may have adverse effects on a sense of civic duty and may undermine motivations based on social norms (Brockmann *et al.*, 2016).

Although the tax lottery may have called attention to VAT evasion, it is not likely to change attitudes. To promote a culture where requesting invoices is regarded as the social norm requires more than giving away prizes. It has been sufficiently shown that policies based on a sense of moral obligation and justice promote citizen engagement (OECD, 2014), and “social norms such as civic virtue and public-spiritedness are great bargains” (Sandel, 2012, p. 119).

Trust is essential for cooperation and to build social capital (Tyler, 2011), and it has been well established that trust in the authorities and political institutions plays a major role in tax compliance (e.g. Feld and Frey, 2002, 2007; Kirchler *et al.*, 2008). The perception of how governments manage and spend taxpayers’ contributions influences the levels of trust in governments (e.g. Tyler, 2006).

Equally important is the perceived treatment by tax authorities (Feld and Frey, 2007) and the degree of satisfaction with public services. Citizens may have the intrinsic motivation to cooperate with the tax authority, but may not do so because of their perception that non-compliance is prevalent in the country and do not feel treated as they deserve. This is aggravated by the cultural view of tax non-compliance as a clever way to deal with the state (see Rego *et al.*, 2006).

Trust alone may not be sufficient to obtain citizens’ cooperation. The calls for severe coercive measures by many respondents are in accordance with the view that perceived injustice encourages evasion and a weak control makes it possible. Moreover, it is worth noting that deterrence has been the dominant strategy in the country. To change taxpayers’ motivation, a bespoke combination of coercive power and fair procedures is necessary. Furthermore, individual characteristics must be taken into account and no approach to tax compliance will be suitable to all taxpayers (Wenzel, 2007). They are not a homogeneous group and differ in their motivation to request a sales invoice. Devising policies to improve their cooperation requires recognizing the existence of different interests and then targeting suitable policies.

In a context of austerity measures and the public scepticism regarding government, fostering civic engagement alone may not be sufficient to stamp out tax evasion. This may not be possible without appeasing the dissatisfaction with the austerity measures as a consequence of a financial crisis. Much tax evasion is undertaken as “acts of social protest,” as mentioned earlier. The VAT lottery does nothing to address the Portuguese citizens’ dissatisfaction. They will continue to have ambivalent feelings toward taxes until their main concerns are addressed. Therefore, commitment to fight corruption and transparent use of tax revenues are critical to get citizens’ cooperation.

There is a growing trend in different countries to emphasize the role of tax administration as a provider of services to citizens-clients (Alm and Torgler, 2011). The Portuguese tax authority could embrace this paradigm and develop new approaches including, for example, sending taxpayers personal tax summaries detailing their taxes and how they are spent. Education campaigns showing the importance of tax revenue for funding public goods and services would be an important contribution. Additionally, it may be important to consider teaching school-age children the concept of taxes. Some countries (Austria, Canada and Sweden among other countries) have tried an approach of tax officials visiting schools (Walsh, 2012).

It is also essential that tax authorities cooperate with researchers by sharing tax records and other data. This cooperation is crucial to design an efficient tax policy. In closing, we would like to recommend a cost-effective public and a course of action that involves having Portuguese citizens' concerns at the core of any tax policy, and combining deterrent measures and positive rewards in the form of tax benefits, rather than tax lotteries.

The conclusion we can draw from the survey findings and the respondents' comments and suggestions is tempered by the characteristics of the sample and thus may not be generalized to the rest of the population. Other limitations to this study should be acknowledged, which may be construed as research opportunities. Further work should extend the scope by the addition of more diverse samples and the use of other methods to reach sectors of the population with low levels of education.

Furthermore, as with the most online data collection, there is no way of knowing if the sample was more biased than it would have been with a paper-and-pencil questionnaire. Although the open question attracted many comments, it would have been desirable to explore them in an interview. Research using interviews could prove enlightening. Future studies should also add other variables such as fiscal knowledge and awareness.

Despite the limitations raised herein, by analyzing the motivation to ask for an invoice, this study makes a contribution to the literature on tax compliance in general and the policy of tax lotteries in particular. As emphasized throughout the paper, whether or not to request a sales invoice depends on different factors. The government can use these insights to devise policies to improve compliance.

Conclusion

The recognition of the importance of public cooperation by policy makers is an important step forward in the combat to tax evasion. However, it is necessary to know how to best motivate citizens to aid the authorities and the motivation of behaving in a cooperative way may be influenced by different factors. Although VAT lotteries seem to be increasingly favored by policy makers, their effectiveness and potential side effects are not known. From the perspective of tax compliance being a civic duty, it would seem that tax lotteries undermine the foundation on which the tax system is based and would thus be counterproductive. Findings of the current study suggest that it may not be the case, but the lottery prize is not the main reason to request an invoice.

Portuguese consumers seem to be willing to cooperate with tax authorities in chasing tax dodgers if they get anything in exchange, which may take the form of rewards (tax and other benefits), justice and good governance. The main conclusion to be drawn is that rewarding citizens is clearly a factor to be considered in any policy to maximize citizens' cooperation in tracking down tax evaders. But it is not enough. It also seems necessary to design incentives that address their concerns, nurture public spirit and promote good governance and justice.

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