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The drunk side of trust: Social capital generation at gathering events

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Abstract

We present a case study to assess the relation between alcohol intake and trust generation at a cultural gathering event. Over a span of six editions (2012–2017), we interviewed and elicited blood alcohol concentration (BAC) of nearly 2,000 attendees of the final concert of "La Notte della Taranta Festival", the biggest concert in Europe dedicated to traditional music (about 200,000 participants per year). Once controlling for the BAC of respondents, and for the belief about own and others' BAC, we find that alcohol consumption during the event is positively correlated with trust generation towards other attendees. Furthermore, looking at the amount of trust devoted to drinkers (the drunk side of trust), we find a positive correlation with both own measured BAC and own believed BAC. Considered together, we argue that these two results are indicative of endogenous group formation in terms of alcohol consumption: drinking during event attendance positively correlates with increased trust to other drinkers in the event audience.

Keywords: Cultural event; Instantaneous social capital; Generalized trust; Blood alcohol concentration; Tourist.

JEL classification: A13; D91; Z10.

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1 Introduction

The relation between social capital and alcohol intake has attracted much attention in the past decades from researchers in social sciences, medicine and psychology. Alcohol consumption at moderate levels is widely recognized to be a lubricant for social interactions (Frank et al., 2014; Au and Zhang, 2016). However, little is known on the underlying mechanisms of such stylized fact.

In this study, we shed light on the relationship between alcohol consumption and two types of social capital of attendees at a gathering event: generalized trust and instantaneous social capital. Whereas the former stems from the traditional World Value Survey question on whether most people can be trusted, for the latter we ask to Festival attendees how much they trust others due to the

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event atmosphere and the sharing of this particular experience. Therefore, generalized trust should be independent from attendees' behavior during the cultural event, while we expect instantaneous social capital to crucially depend on it.

Although the enhancement of social capital due to Festival attendance is well-known in the cultural economics literature (Arcodia and Whitford, 2006), Attanasi et al. (2013) were the first ones to empirically measure it and refer to it as "instantaneous social capital": they consider it as a form of trust "generated by the mere fact of taking part in a shared experience [...], instantaneous both in its formation and in its expiration" (p. 237). The gathering event we analyze is the same as in Attanasi et al. (2013) (who cover Festival editions 2007-2011): "La Notte della Taranta" Festival (NdT henceforth). It is a cultural event held in the South of Italy, characterized by traditional music listening and dancing, coupled with alcohol consumption for most attendees. Since alcohol consumption is part of attendees' behavior during this event, it might be linked to instantaneous social capital, but not to generalized trust, which should in contrast be based on attendees' everyday experiences.

We extend Attanasi et al. (2013) investigating the relation between social capital generation and alcohol consumption during the event. To do this, during NdT editions 2012-2017 we elicited respondents' beliefs on their own Blood Alcohol Concentration (BAC) level and on the average BAC of Festival attendees. In addition, we measured attendees' BAC levels.

One of the difficulties encountered studying the link between social capital and alcohol consumption using survey data is the lack of causality due to the simultaneity occurring between variables capturing social capital and alcohol intake. Some studies try to mitigate this problem implementing instrumental variables techniques, namely by using average values of social capital variables at the community level, thus excluding own social capital contribution (Seid, 2016). Survey data suggest the existence of a robust and positive association between social capital and alcohol consumption (Åslund and Nilsson, 2013; Frank et al., 2014; Seid, 2016), and point out the importance of a moderate level of drinking for facilitating social interactions. Social capital in the sense of connectedness with others in society and in the form of generalized trust may translate in the identification with social norms (Seid, 2016), social capital at the individual level may be linked to alcohol intake. One channel through which this mechanism can operate is social control: individuals reporting a high social support and a high connectedness within society are on average less likely to drink heavily (Åslund and Nilsson, 2013). However, through observational data, it is difficult, if not impossible, to pinpoint the direction and magnitude of this link.

Recent experimental studies have investigated the effect of alcohol consumption on a series of behavioral traits, the most related to our study being altruism and the willingness to cooperate in a negotiation (Au and Zhang, 2016; Bregu et al., 2017; Corazzini et al., 2015; Hopthrow et al., 2007). By randomly assigning subjects into alcoholic treatments, lab experiments solve the problem of self-selection into the (alcoholic) treatment, typical of survey data, i.e. the presence of underlying behavioral differences between drinkers and non-drinkers. In alcoholic treatments, subjects are asked to drink an alcoholic beverage (usually one beer), whereupon they are asked to complete a series of experimental tasks.¹ Differently, in non-alcoholic treatments, behavioral tasks are implemented

¹Experimental subjects are informed about the possibility of consuming alcohol during the experiment at the moment

without prior consumption of alcohol. A few studies also carry out placebo treatments, in which prior to behavioral tasks subjects are asked to drink a beverage with a clear alcoholic smell, but without alcohol content (Corazzini et al., 2015; Hopthrow et al., 2007). This allows to disentangle the perception of alcohol consumption from the real effects of alcohol intake.

As regards the effect of alcohol on altruism, Corazzini et al. (2015) show a negative relation. They measure altruism through individual contributions in a dictator game, either to humanitarian or non-humanitarian causes, and find lower donations to humanitarian projects in the alcoholic treatment. In contrast, Bregu et al. (2017) and Au and Zhang (2016) do not report significant results. Au and Zhang (2016) focus more specifically on the effect of alcohol on the willingness to collaborate in a negotiation, through a bargaining game with adverse selection. They find that a moderate alcohol consumption smoothes the negotiation process by increasing subjects' willingness to collaborate. Importantly for our study, which also takes into account expectations of others' BAC levels, if one expects that her negotiating partner is intoxicated, she is more willing to participate in the negotiation, and this increases the probability that the joint project is started.

From a group perspective, Hopthrow et al. (2007) evaluate the combined effect of group belonging and alcohol consumption on cooperative behavior. They do not find alcohol to play any effect on cooperative decisions, yet groups are less cooperative in the alcoholic treatment than in the placebo, and less cooperative than individuals. This is also important for our study, since we ask attendees to also state whether they trust more another attendee if he/she is drinking alcohol during the event. Such question is meant to detect phenomena of endogenous group formation due to alcohol consumption, which might boost trust within the group of drinkers.

Our study departs from extant literature by focusing on a field cultural environment, in which subjects freely decide to consume alcohol. Another field study has been run during the same cultural event as ours, namely Attanasi et al. (2017). Differently from ours, this is a staged field experiment, thereby involving monetary incentives and theoretically-driven behavioral hypotheses. However, it has been run during only one of the six editions of the gathering event at which our study took place (2012-2017). More precisely, Attanasi et al. (2017) proposed to event attendees in 2013 two versions of the trust game in Cox et al. (2009). They elaborated predictions on behavior of sober (BAC = 0.0 g/l) and inebriated (BAC > 0.0 g/l) participants based on the revealed altruism theory of Cox et al. (2008). They find that alcohol consumption leads to less trust and reciprocity independently of the version of the trust game. Furthermore, inebriated participants show strategic altruism in the role of first mover (trust), but not in the role of second mover in the trust game (reciprocity).

Differently from Attanasi et al. (2017), we are interested in investigating whether, and to what extent, alcohol consumption facilitates the creation of instantaneous social capital, and influences generalized trust, controlling for individual subjective and objective BAC and for the belief on the BAC of other Festival attendees. Our contribution is threefold: i) with respect to survey studies which rely on self-reported answers on alcohol consumption, we provide an exact measure of respondents' alcohol intake, in addition to the belief on own alcohol intoxication. This is important since individuals often tend to underreport behaviors that are considered against social norms, as alcohol consumption must be considered (Åslund and Nilsson, 2013); ii) with respect to lab experiments, we provide a

of the registration to the experimental session.

more realistic setting, with a higher variability in BAC. This allows us to grasp different behavioral attitudes that lab experiments, which report only moderate alcohol levels, cannot observe (Corazzini et al., 2015); iii) we provide evidence on the relation between instantaneous social capital and alcohol consumption within the comparison between the belief of own and of others' BAC. The latter can be interpreted as a measure of the distance between the interviewee and the rest of attendees in terms of alcohol consumption: we assume that the smaller this distance, the closer he/she would feel to the mass of attendees, thereby being more prone to instantaneous social capital generation. To the best of our knowledge, no study so far investigated whether endogenous group formation in terms of alcohol consumption would facilitate the augmentation of social capital among gathering event attendees.

We find instantaneous social capital to be *positively* correlated with own measured BAC, and that beliefs of own BAC enter positively as long as individual controls are not included in the estimations. This suggests that alcohol consumption is positively correlated with trust generation due to event attendance. This is confirmed by the fact that, controlling for alcohol consumption, instantaneous social capital is higher for loyal event followers than for new participants, i.e. attendees being at the event for the first time.

An opposite result is found for generalized trust: while it is not correlated with own measured BAC and own believed BAC, it is *negatively* correlated with beliefs on others' BAC. Thus, believing that other attendees are drunk shrinks trust in others during everyday life. In line with other field studies (e.g., Guiso et al. (2008a,b), we confirm that generalized trust moves up with education and risk proneness.

Finally, looking at the amount of trust devoted to drinkers (the drunk side of trust), we find a positive correlation with both own measured BAC and own believed BAC, and a negative correlation with beliefs on others' BAC. We interpret these results as evidence of endogenous group formation in terms of alcohol consumption. Indeed, both own measured BAC and own believed BAC are always much lower than others' believed BAC, hence everyone feels like he/she is drinking less than the others (on average). Thus, the fact that drinking helps trusting more someone who is drinking with respect to someone who is not drinking can be seen as an individual acceptance of such group behavior: given individual beliefs on others' believed BAC, it is more likely that the unknown attendee (you would trust) is drinking more than you are doing. Interestingly, the drunk side of trust negatively correlates with age and education, and is higher for tourists attending the event: We explain below that also these results are in line with our endogenous group formation explanation.

The remaining part of the article is structured as follows. Section 2 presents the data and the methodology followed to collect them, as well as descriptive statistics of the final sample. Section 3 presents the main results and Section 4 discusses them and offers concluding remarks.

2 Data and Methodology

In this section we describe the main characteristics of the cultural festival at which the survey took place, as well as the methodology implemented in order to collect respondents' information and pref ${\rm erences.}^2$

The data used in this study were collected during six consecutive editions (2012-2017) of "La Notte della Taranta" Festival, held each year in the province of Lecce (South of Italy) in late August, since 1998. The event is among the most important European folk festivals, and attracted approximately 300,000 attendees per year during editions 2012-2017. It consists of 15 itinerant minor concerts (approximately 85,000 attendees per year, with a median of 7,000 attendees per concert) and a final concert (approximately 200,000 attendees per year). For both types of concerts entry is free. The data employed in our analysis refer to the final concert, where both the mass-gathering effect and individual alcohol consumption are higher.³ The final concert attracts about 200,000 attendees each year, and it consists of a one-night huge dance floor. The original aim of the Festival was to recover and reanimate the traditional local folk music ("pizzica"). Over the years, the organizers involved international musicians to take part in the final concert, in order to melt different folk music and styles. Although weakening the traditional connotation of the Festival, this has boosted the number of Festival attendees and especially its tourist attraction, with more than half of attendees being non-local in the last six editions.

Survey data were collected through guided interviews. A total of about 15-25 interviewers per year, both males and females, approached Festival attendees in a random and independent order during the final concert, from 6pm until 4am.⁴ Once the questionnaire was completed, a sub-sample of subjects was asked to undergo an alcohol test.⁵ Importantly, attendees were not informed before the completion of the questionnaire about the possible BAC measurement, which occurred throughout the years with the same Tesmed Safety digital professional alcoholmeters (electronic breathalyzers). They were only informed that 1.90 g/l represented the upper limit measurable by our alcoholmeters. This allows us to investigate whether there are systematic under/overreporting patterns in BAC levels across genders, since, according to social norms, men usually tend to be proud of their alcohol intake, while women may try to conceal it (Åslund and Nilsson, 2013). The same randomization process implemented for respondents selection is applied for choosing those who are asked to undergo the alcohol test. Approximately 10% of those asked, refused to undergo the test. Overall, a total of 2663 individuals were surveyed at Festival editions from 2012 to 2017, and among these, 1811 were tested for their BAC level. Descriptive statistics of the whole subject pool are reported in Table 1, and a thorough description of the variables used in the analysis is reported in Table 5 of Appendix 1.

The whole sample of respondents is gender-balanced. It consists of a vast majority of young individuals: about 38% are younger than 25 years old, and 26% are between 26 and 30. Almost 60% of them have completed high school. Half of the sample declares to be in a profession characterized by precarious income, and also half of respondents is at the event for tourist reasons, with 45% participating at the NdT for the first time.

The average BAC registered is 0.33, with no significant differences across genders. However, if we

²For a more detailed description of "La Notte della Taranta" Festival, see Attanasi et al. (2013).

 $^{^{3}}$ In 2016 and 2017 NdT editions, we also collected data at the final concert rehearsal, which took place the night before the actual final concert, with an average number of attendees of about 50,000. These data are not analyzed in this paper, and are available from the authors upon request.

 $^{^{4}}$ The questionnaire administered is reported in Appendix 2.

⁵In the 2017 Festival edition, the whole population sampled was also asked to undergo the alcohol test.

exclude those with a BAC equal to zero, the average BAC registered is 0.52, which is slightly above the legal amount for driving established in the Italian legislation (0.50). Respondents slightly overestimate their BAC, and females tend to overestimate it more than males (the average own reported BAC of females is 0.39 vs. 0.35, Wilcoxon rank-sum test, p-value = 0.092). Yet, when comparing the discrepancy between measured and self-reported own BAC, females do not differ with respect to men. This suggests absence of differences in social norms in the tendency to guess one's own BAC.

	Type	Mean	SD	Min	Max	
Socio-demographic variables						
Female	D	0.50	0.50	0	1	
Age		2.15	1.15	1	5	
Education		3.15	0.75	1	5	
Own income	D	0.48	0.50	0	1	
Tourist	D	0.52	0.50	0	1	
First time at NdT	D	0.45	0.50	0	1	
Low-stake risk		0.40	0.47	0	1	
High-stake risk		0.22	0.39	0	1	
Alcohol variables						
BAC measured		0.33	0.42	0	1.90	
Belief own BAC		0.37	0.43	0	1.90	
Belief others' BAC		1.03	0.51	0	1.90	
Delta BAC		0.02	0.32	-1.60	1.70	
Trust variables						
Generalized trust	D	0.38	0.49	0	1	
Generalized trust (0-10 scale)		4.41	2.70	0	10	
Instantaneous social capital	D	0.27	0.44	0	1	

Table 1: Summary statistics - selected variables

Notes: Dummy variables are marked with D. Number of observations is 2663.

D

0.17

0.37

0

1

Trust to drinkers

Interestingly, we find a massive overestimation of other Festival attendees' BAC, which is overall around 1, with important differences throughout the years, in particular since 2016 onwards, most probably due to an increased attention against illegal alcohol sellers at NdT facilities and due to higher security controls driven by recent terrorist attacks (see Panel (a) in Figure 1). As shown in Panel (b) in Figure 1, the overestimation of others' BAC follows a positive trend over the hours spent at NdT, and it is exacerbated after midnight, whereas own measured and perceived BAC do not follow such a sharp and increasing pattern.



Figure 1: BAC over years and hours

As regards instantaneous social capital and trust in others, Figure 2 shows that the two follow the same trend over years, with the former being always significantly higher than the latter, with the only exception of year 2015, in which instantaneous social capital slightly exceeds generalized trust. We suspect that this may be due to the peak of alcohol consumption at the 2015 event edition, as shown in Figure 1, Panel (a).



Figure 2: Generalized trust and instantaneous social capital over years

The trend of instantaneous social capital appears to be more unstable over years with respect to generalized trust. This may be indicative that other factors such as the perceived quality of the music or the percentage of tourists, among others, which vary over time, may boost results. Yet, overall, approximately one third of event attendees report to generate trust on others due to the attendance to the event, and the reason most frequently reported for such finding is the sharing of the same experience, followed by the fact of feeling part of a community which shares the same tastes and values.

3 Results

We start the analysis considering the association between alcohol consumption and instantaneous social capital. In addition, we consider the link between alcohol consumption and generalized trust. We finally dig in the role played by trust to drinkers in explaining our main findings (the drunk side of trust).

3.1 Alcohol and instantaneous social capital

Table 2 provides estimation results of a logit regression with instantaneous social capital as dependent variable. As regressors, we include the three BAC measures employed in our data set (own measured BAC, believed own BAC and believed others' BAC). On top of individual demographic controls, we are interested in capturing the role played by being a tourist, being at NdT for the first time, the propensity to take risky decisions and an interaction term between gender and believed others' BAC. We also include year fixed effects and hour interval controls to account for time trends across years and hours. Importantly, we include as regressor generalized trust expressed on a 0-10 scale, as this represents the idiosyncratic tendency of each individual to trust others, and we want to estimate the additional trust in others driven by event attendance.

As expected, own measured BAC has a positive and significant coefficient in all model specifications, whereas the belief regarding own BAC is positively associated with instantaneous social capital only when individual controls are taken into account in the regression analysis. This suggests that individual controls may be somehow correlated with own believed BAC. Interestingly, we do not find any relation between instantaneous social capital formation and believed others' BAC.

Not surprisingly, a higher generalized trust is positively correlated with instantaneous social capital, and also a higher age and being more prone to take risks positively affects instantaneous social capital.

In contrast, being a new attendee at NdT shrinks the social capital generation, indicating a positive effect of event loyalty: people attending the Festival for several editions are peraphs more enthusiastic and willing to be involved in the event, feeling to be part of a group they do not even know, given the huge number of its members: "the Festival people". The sense of belonging to this self-selected big group seems to be strengthened given the repetition of the same experience.

Also being interviewed after 9 pm contributes to the decrease in social capital generation, particularly after midnight. One possible explanation might be that when "voluntarily" entering a new group, the early enthusiasm may lead one to think that other people in the group are trustworthy. Once the initial excitement dies down, trust in other group members decreases as well. Notice that, as shown in Panel (b) in Figure 1, the spread between the belief on others' BAC and own measured (and believed) BAC sharply increases after 9 pm. This misalignment between individual and group alcohol consumption is in line with the decrease of instantaneous social capital over time within the same concert.

Finally, we find a positive effect of time as represented by the positive and significant coefficient of the year variable. This indicates an ever-growing social cohesion among event attendees throughout event editions.

3.2 Alcohol and generalized trust

Even though the focus of our study is on the determinants of instantaneous social capital generation, and more specifically on the role played by alcohol consumption, it is important to shed light on whether generalized trust mediates the effects found for instantaneous social capital.

As mentioned in Section 1, since alcohol consumption is an integral part of event attendance for most people, we expect it to be linked to instantaneous social capital. In contrast, we do not expect any link between alcohol consumption and generalized trust (trusting most of the people in general): the latter should rather depend on attendees' everyday experiences and not on sporadic events.

This intuition is corroborated by regression results of Table 3, which show no association between own measured BAC and the dependent variable, generalized trust. The same result holds with respect to own believed BAC.

However, belief on others' BAC positively enters, although only when individual controls are not included in the estimations. This might be seen as a negative opinion on others' (too high) alcohol consumption by attendees with a high level of generalized trust.

Our hypothesis of independence of generalized trust from event attendance is supported by the non-significant coefficients of the hour dummies: generalized trust remains stable throughout event attendance. Moreover, also the time progression of event editions over years does not correlate with generalized trust. In contrast, individual characteristics such as education and proneness to take risks positively affect the willingness to trust others, thereby confirming previous results on the determinants of generalized trust (see, e.g., Hong and Bohnet (2007)).

3.3 The drunk side of trust

Looking at whether event attendees are willing to trust to a larger extent people who are drinking at the event versus people who are not drinking enables us to further investigate the mechanisms underlying instantaneous social capital formation at the gathering event.

As depicted in Table 4, we find that both own measured BAC and own believed BAC positively correlate with trust to drinkers in all model specifications. This finding holds even after controlling for the idiosyncratic trusting inclination captured by generalized trust, which, on itw own, is positively associated with trust devoted to drinkers. This is indicative of a sort of homophily in trusting dynamics occurring during the event: attendees who consume alcohol are more prone to trust other attendees who are also drinking during the event. In addition, being a tourist entails a higher trust towards drinkers, whereas age and education negatively affect the propensity to trust drinkers.

In the last part of the next section, we discuss all these results in terms of endogenous group formation due to alcohol consumption during event attendance.

	(1)	(2)	(3)	(4)
Own BAC	0.490**	0.472^{**}	0.732^{***}	0.716^{***}
	(0.191)	(0.193)	(0.225)	(0.226)
Belief own BAC	0.436^{**}	0.409^{**}	0.282	0.249
	(0.202)	(0.204)	(0.239)	(0.241)
Belief others' BAC	-0.076	0.011	0.307	0.347
	(0.135)	(0.139)	(0.211)	(0.212)
Generalized trust (0-10 scale)			0.332***	0.335***
			(0.030)	(0.030)
Female			-0.047	-0.075
			(0.326)	(0.327)
Age			0.156^{**}	0.147^{**}
			(0.073)	(0.073)
Education			-0.080	-0.096
			(0.103)	(0.103)
Own income			0.097	0.088
			(0.158)	(0.158)
Tourist			-0.079	-0.037
			(0.166)	(0.168)
First time at NdT			-0.331**	-0.296*
			(0.166)	(0.168)
High-stake risk			0.451^{**}	0.466^{**}
			(0.185)	(0.186)
Female [*] Belief others' BAC			-0.110	-0.067
			(0.285)	(0.287)
9-12pm (Ref. cat.: 5-9pm)			-0.382**	-0.350*
			(0.182)	(0.183)
0-3am			-0.627***	-0.556***
			(0.208)	(0.211)
Year		0.105^{***}	- /	0.096**
		(0.035)		(0.043)
Constant	-1.302^{***}	-213.466***	-2.968***	-197.423*
	(0.143)	(70.636)	(0.467)	(85.680)
Pseudo \mathbb{R}^2	0.022	0.028	0.146	0.150
Observations	1369	1369	1208	1208

 Table 2: Logit regression on Instantaneous Trust

Notes: Logit coefficients are reported. * p < .1, ** p < .05, *** p < .01

	(1)	(2)	(3)	(4)
Own BAC	0.188	0.185	0.158	0.161
	(0.162)	(0.162)	(0.174)	(0.174)
Belief own BAC	0.220	0.219	0.201	0.202
	(0.171)	(0.171)	(0.186)	(0.186)
Belief others' BAC	-0.275***	-0.269**	-0.199	-0.203
	(0.106)	(0.109)	(0.158)	(0.159)
Female			0.124	0.125
			(0.235)	(0.235)
Age			0.052	0.053
			(0.053)	(0.053)
Education			0.155^{**}	0.155^{**}
			(0.076)	(0.076)
Own income			0.137	0.138
			(0.115)	(0.115)
Tourist			0.136	0.133
			(0.123)	(0.124)
First time at NdT			-0.055	-0.059
			(0.122)	(0.123)
High-stake risk			0.458***	0.456^{**}
			(0.141)	(0.141)
Female [*] Belief others' BAC			-0.129	-0.131
			(0.210)	(0.210)
9-12pm (Ref. cat.: 5-9pm)			-0.013	-0.015
			(0.134)	(0.134)
0-3am			0.229	0.223
			(0.150)	(0.152)
Year		0.008		-0.008
		(0.027)		(0.031)
Constant	-0.287***	-15.665	-1.225^{***}	14.154
	(0.110)	(54.265)	(0.327)	(62.146)
Pseudo \mathbb{R}^2	0.005	0.005	0.016	0.016
Observations	1746	1746	1548	1548

Table 3: Logit regression on Generalized Trust (Dummy)

Notes: Logit coefficients are reported. * p < .1, ** p < .05, *** p < .01

0	0			
	(1)	(2)	(3)	(4)
Own BAC	0.451^{**}	0.476^{**}	0.534^{**}	0.569^{**}
	(0.221)	(0.219)	(0.236)	(0.235)
Belief own BAC	0.861^{***}	0.873^{***}	0.700***	0.724^{***}
	(0.233)	(0.232)	(0.253)	(0.252)
Belief others' BAC	-0.398**	-0.481^{***}	-0.231	-0.284
	(0.166)	(0.169)	(0.252)	(0.254)
Generalized trust (0-10 scale)			0.086***	0.083***
			(0.031)	(0.032)
Female			0.405	0.407
			(0.366)	(0.368)
Age			-0.173^{**}	-0.154^{*}
			(0.088)	(0.088)
Education			-0.231*	-0.220*
			(0.124)	(0.124)
Own income			0.267	0.279
			(0.183)	(0.184)
Tourist			0.486**	0.430**
			(0.199)	(0.201)
First time at NdT			0.037	0.003
			(0.190)	(0.191)
High-stake risk			0.184	0.194
-			(0.210)	(0.209)
Female [*] Belief others' BAC			-0.184	-0.199
			(0.316)	(0.317)
9-12pm (Ref. cat.: 5-9pm)			-0.110	-0.148
			(0.210)	(0.211)
0-3am			-0.307	-0.388
			(0.244)	(0.247)
Year		-0.119***	` '	-0.117**
		(0.043)		(0.050)
Constant	-1.668***	237.499***	-1.637^{***}	233.794**
	(0.167)	(85.944)	(0.539)	(99.876)
Pseudo \mathbb{R}^2	0.039	0.045	0.068	0.074
Observations	1304	1304	1157	1157

Table 4: Logit regression on Trust to drinkers

Notes: Logit coefficients are reported. * p < .1, ** p < .05, *** p < .01

4 Discussion and Conclusions

In this paper, we empirically study the relation between alcohol intake and trust generation at a cultural gathering event. We rely on a large dataset of nearly 2,000 attendees of the final concert of "La Notte della Taranta Festival", the biggest concert in Europe dedicated to traditional music (about 200,000 participants per year). We run our survey study over a span of six consecutive editions (2012–2017), by interviewing a randomly selected sample of event attendees, and measuring their blood alcohol concentration (BAC) through electronic breathlyzers.

We find instantaneous social capital to be *positively* correlated with own measured BAC, and that beliefs of own BAC enter positively as long as individual controls are not included in the estimations. This suggests that alcohol consumption is positively correlated with trust generation due to event attendance. This is confirmed by the fact that, controlling for alcohol consumption, instantaneous social capital is higher for loyal event followers than for new participants, i.e. attendees being at the event for the first time.

An opposite result is found for generalized trust: while it is not correlated with own measured BAC and own believed BAC, it is *negatively* correlated with beliefs on others' BAC. Thus, believing that other attendees are drunk shrinks trust in others during everyday life. In line with other studies, we confirm that generalized trust moves up with education and risk proneness.

Finally, looking at the amount of trust devoted to drinkers (the drunk side of trust), we find a positive correlation with both own measured BAC and own believed BAC, and a negative correlation with beliefs on others' BAC. We interpret these results as evidence of endogenous group formation in terms of alcohol consumption. Indeed, both own measured BAC and own believed BAC are always much lower than others' believed BAC, hence everyone feels like he/she is drinking less than the others (on average). Thus, the fact that drinking helps trusting more someone who is drinking with respect to someone who is not drinking can be seen as an individual acceptance of such group behavior: given individual beliefs on others' believed BAC, it is more likely that the unknown attendee (you would trust) is drinking more than you are doing.

Interestingly, the drunk side of trust negatively correlates with age and education, and positively with the fact of being a tourist. Both results confirm our interpretation of alcohol intake during the event as a mean of endogenous group formation. In fact, Table 1 shows that the event we analyze is a young-only event (about 65% of attendees under 30 years old) with low average education level (only 30% of attendees hold a university degree). Thus, the younger and the less educated an attendee is, the more he/she feels part of the (most) representative group of attendees, which is enjoying the concert by drinking alcohol.

A similar explanation might be provided for the fact that the drunk side of trust is higher for tourists rather than for locals. Indeed, the gathering event we analyze hosts each year on average about 100,000 tourists, with around 40% of them coming to the place where the event is held just for the event (greatly motivated tourists). This result confirms the finding in (Attanasi et al., 2013) that instantaneous social capital is greater for tourists rather than for locals. It also extends this finding, by showing that alcohol consumption during the event is a key element for tourist attraction, since it helps their identification with the event (alcoholic) atmosphere.

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Appendix 1: Tables and Figures

Variables	Definition		
	Socio-demographic variables		
Female (D)	Dummy=1 if respondent is female [question 1 in Appendix: Question-		
	naire]		
Age	Respondent's age in intervals (1 if ≤ 25 ; 2 if 26-30; 3 if 31-39; 4 i		
	40-60; 5 if >60) [question 2]		
Education	Respondent's education (1 if primary school; 2 if secondary school; 3 i		
high school; 4 if bachelor; 5 if Master/Ph.D.) [question 21]			
Occupation	Respondent's occupation (1 if artist; 2 if housewife; 3 if employee; 4		
	if unemployed; 5 if free-lancer professional; 6 if self-employed; 7 if re-		
	tired/disabled; 8 if student) [question 22]		
Own income (D)	Dummy=1 if respondent's occupation is employee, free-lancer profes-		
	sional or self-employed [question 22]		
Tourist (D)	Dummy=1 if respondent regulary lives during the year outside the area		
	where the concert is held (province of Lecce) [question 3]		
Originary (D)	Dummy=1 if respondent is originary from the area where the concert		
	is held (province of Lecce) [question 4]		
First time at NdT (D)	Dummy=1 if respondent is at NdT for the first time [question 5]		
Low-stake risk	Respondent's proneness to low-stake risk (hypothetical question: 1 i		
	respondent agrees to buy a lottery ticket of either 0.5 or 2 euros; 0.5 i		
	respondent is indifferent between agreeing or not; 0 if respondent does		
	not agree) [question 11]		
High-stake risk	Respondent's proneness to high-stake risk (hypothetical question: 1 i		
	respondent agrees to buy a lottery ticket of either 5 or 7 euros; 0.5 i		
	respondent is indifferent between agreeing or not; 0 if respondent does		
	not agree) [question 12]		
	Alcohol variables		
Belief own BAC	Respondent's answer to "In consideration of the fact that the lega		
	alcohol limit for driving is 0.5 (grams/liter), how much do you think is		
	your alcohol level right now?" [question 23]		
Belief others' BAC			
Belief others' BAC	Respondent's answer to "How much do you think is the average alcoho		
	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24]		
Own BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25]		
	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24]		
Own BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25]		
Own BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25] Belief own BAC - Own BAC		
Own BAC Delta BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25] Belief own BAC - Own BAC Trust variables		
Own BAC Delta BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25] Belief own BAC - Own BAC Trust variables Dummy=1 if respondents' answer to "Generally speaking, do you think		
Own BAC Delta BAC	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25] Belief own BAC - Own BAC Trust variables Dummy=1 if respondents' answer to "Generally speaking, do you think that most of the people can be trusted or that it is better not to trust		
Own BAC Delta BAC Generalized trust (D)	Respondent's answer to "How much do you think is the average alcoho level right now at the Festival?" [question 24] Respondent's BAC measured at the Festival [question 25] Belief own BAC - Own BAC Trust variables Dummy=1 if respondents' answer to "Generally speaking, do you think that most of the people can be trusted or that it is better not to trust others?" is "Yes, most of the people can be trusted" [question 7]		

Table 9. List of science variables	Table 5:	List of	selected	variables
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 $Continued \ on \ next \ page$

Variable	Description
Instantaneous trust (D)	Dummy=1 if respondent's answer to "For the mere fact that a person
	(you do not know) is here tonight, does she deserve to be trusted more
	than a person you do not know and who is not here tonight?" is "Yes"
	[question 9]
Sharing same experience (D)	Dummy=1 if respondent's motivation to Instantaneous trust=1 is "be-
	cause we are sharing the same experience at NdT" [question 10]
Trust to drinkers (D)	Dummy=1 if respondent's answer to "Tonight, would you trust more a
	person who is drinking alcohol rather than one who is not?" is "Yes"
	[question 20]
Notes: D refers to a dummy va	ariable.

Table 5 – Continued from previous page

Appendix 2: Questionnaire

PLACE and DAY of the interview: TIME of the interview: Interviewer's name:

- 1. Gender: Male / Female
- 2. Age range: up to 25 / 26-30 / 31-39 / 40-60 / more than 60
- 3. Where do you regularly live during the year? Village where the Concert is held / Province of Lecce / Apulia, but outside the Province of Lecce / Italy, but outside Apulia / Abroad
- 4. Are you originary from the area (Province of Lecce)? Yes / No
- 5. First time at the Festival La Notte della Taranta? Yes / No
- 6. Would you be willing to pay a small amount to take part in the final concert of La Notte della Taranta? Yes / No / I don't know
- 7. Generally speaking, do you think that most people can be trusted, or that "not to trust is better"?Yes / No (not to trust is better)
- From 0 to 10, how much do you trust other people in general, where 0 indicates "it is better not to trust at all" and 10 indicates "it is better to fully trust"?
 0 / 1/ 2/ 3/ 4/ 5/ 6/ 7/ 8/ 9/ 10
- 9. Does a person (you don't know), for the mere fact of participating this evening at the same concert, deserve to be trusted more than another one you don't know and who is not here tonight?

Yes / No / I don't know

- 10. If you answered "Yes" to the previous question: Which one of the following items pushes you to have a greater trust towards a person who is here tonight (and that you don't know)?
 - there is a lot of people
 - there is a lot of people dancing
 - there is a lot of people drinking
 - the type of music
 - you are sharing the same experience of the final concert of La Notte della Taranta
 - here the traditional folk music from Salento is being promoted
 - you feel part of a community characterized by the same tastes and values
 - you trust the organizers of La Notte della Taranta Festival
 - Other (specify)
- 11. HIPOTHETICAL QUESTION: Would you agree to pay a ticket of 0.5 / 2.0 Euros to create a fund that at the end of the evening is assigned to a person drawn at random among 100 participants?

Yes / No / I don't know

- 12. HIPOTHETICAL QUESTION: Would you agree to pay a ticket of 5 / 7 Euros to create a fund that at the end of the evening is assigned to a person drawn at random among 100 participants? Yes / No / I don't know
- 13. In percentage terms, how many Festival attendees have consumed (are consuming or will consume) alcohol during the final concert?
- 14. In your opinion, in percentage terms, how many Festival attendees have consumed (are consuming or will consume) cannabis (or other drugs) during the final concert?
- 15. Have you consumed or will you consume alcohol during the final concert? Yes / No
- 16. If you answered "Yes" to the previous question, have you consumed more or less with respect to other nights in which you went out in this period? More / Less / The same amount

17. If "More" or "Less": In which way have the following factors influenced your choice of drinking more or less alcohol:

(On a scale from 1 to 5)

- I must drive (only if answer is "Less")
- tonight there is a lot of people
- tonight there is a lot of people dancing
- tonight there is a lot of people drinking
- the type of music
- the fact of being at the final concert of La Notte della Taranta Festival
- 18. How would you define your alcohol consumption throughout the year? Low / Intermediate / High
- 19. Would you participate in the final concert of La Notte della Taranta Festival if alcohol consumption were forbidden?
 Yes / No / I don't know
- 20. Would you trust more a person who is here tonight and who is consuming alcohol or a person who is not drinking alcohol? Yes / No / I don't know
- 21. Education:

Primary school / Secondary school / High school / University degree / Post-graduate degrees (Master/Ph.D.)

Artist / Housewife / public or private Employee / Out-of-work / Freelance / Self-employed / Retired or Invalid / Student / Other (specify)

- 23. Considering that the legal threshold of Blood Alcohol Concentration for driving is 0.5 (g/l), how much do you think is your BAC in this moment?
- 24. How much do you think is the <u>average</u> Blood Alcohol Concentration at the Festival in this moment?
- 25. Respondent's measured BAC:

^{22.} Job: