

ATTENDANCE MOTIVATIONS AND VISITOR SEGMENTS WITHIN A UNIVERSITY AGRICULTURAL FESTIVAL

Carla Barbieri

Department of Parks, Recreation, and Tourism
University of Missouri
BarbieriC@missouri.edu

Yasuharu Katsube

University of Missouri

Christine Tew

University of Missouri

Abstract.—Festivals attract a variety of visitors driven by a complex set of motivations. The objective of this study was to identify and classify motivations for attending the South Farm Showcase (SFS), a university-based agricultural festival in Missouri. The study further developed a motivation-based segmentation of festival visitors and examined their distinct characteristics.

Analysis identified two motivation factors (*Fun and Entertainment* and *Theme Identity*) and two types of visitors (*Entertainment Seekers* and *Institutional Loyals*). Entertainment Seekers and Institutional Loyals differ in their socio-economic characteristics and in their leisure and tourism preferences. Marketing, management, and academic implications of these findings are presented.

1.0 INTRODUCTION

The South Farm Showcase (SFS) is a 1-day festival that the College of Agriculture, Food, and Natural Resources at the University of Missouri (MU-CAFNR) has hosted annually since 2006. The festival's purpose is to connect MU-CAFNR with the local community and to involve local people in – and educate them about – MU-CAFNR research efforts. The 2008 SFS received about 2000 visitors and offered a variety of recreational activities and educational displays.

Research on festival attendance motivations finds that attendance is driven by a complex set of goals, the most recurrent of which are socialization, escapism, and gregariousness (Backman et al. 1995, Crompton and McKay 1997). However, this topic has not been fully explored (Getz 2008). Recent studies suggest that further

examination is needed to identify motivations associated with the uniqueness of festivals (Nicholson and Pearce 2001, Schofield and Thompson 2007). This research angle is especially relevant to university-based agricultural festivals, which have received little attention from researchers (Barbieri et al. 2009).

The SFS is distinctive because of its university-community bridging purpose, agricultural focus, and edutainment nature. This study aims to identify the motivations behind attendance at the SFS. Recognizing that festivals attract visitors of different characteristics, this study developed a motivation-based segmentation of attendees and identified different socio-economic, lifestyle, and tourism characteristics associated with those segments.

2.0 METHODS

The sample for this study was randomly selected attendees of the 2008 SFS. The researcher/interviewer explained the study purpose to each participant and asked for an email address for future on-line survey participation. Three hundred twenty-six valid email addresses were obtained. Only 26 people declined to participate. The online survey was launched 4 days after the festival and remained open for 27 days. Three electronic reminders were sent to nonrespondents. The survey asked about SFS attendance motivations, festival behavior, lifestyle information, and socio-demographics. A total of 251 surveys were completed (77-percent response rate). Of these, 231 cases were included for analysis after we excluded respondents who were associated with the SFS event (e.g., volunteers).

The survey included attendance motivations selected from the events literature or constructed to reflect the SFS's purposes and goals (for example, "learn about agriculture and related activities" or "I like to attend festivals"). Respondents ranked each motivation using a five-point Likert scale rank anchored in 1 (not important) and 5 (extremely important). A principal factor analysis with varimax rotation was performed on

the rankings of 12 attendance motivations. Eigenvalues greater than 1 and loadings greater than 0.50 were used to select principal factors. Then, a K-means cluster analysis was performed over the motivational regression scores in order to segment participants. ANOVA and chi-square tests were used to analyze differences between identified clusters. On another section of the survey, respondents used a five-point Likert scale anchored in 1 (not important) and 5 (extremely important) to rate the importance of 14 culture-, nature-, and agriculture-related attractions and activities on their decisions about pleasure travel destinations.

3.0 RESULTS AND DISCUSSION

Respondents were preponderantly female (67.4 percent) and between 26 and 45 years old (68.2 percent). More than a third (36.3 percent) of respondents had an advanced education degree and almost three-quarters (73.5 percent) had at least a 4-year college degree. The majority was employed full-time (70.1 percent) and had a household income of at least \$50,000 (74.5 percent). The data suggest that SFS visitors are in the early stage of their family life cycle; a high proportion of visitors lived with children younger than 7 years (58.3 percent) or between 7 and 12 (33.0 percent). The majority (70.5 percent) lived in an urbanized area (population $\geq 50,000$). Consistent with the location of the festival (Columbia, MO) and the strong university presence in this town, a high proportion of respondents (65.7 percent) were affiliated in some way with MU.

Results confirm that a complex set of motivations drove visitors to attend the festival (Table 1). The most important motivations for attending the SFS were related to the recreational aspect of festivals: “the variety of entertainment and activities offered” (mean=3.96), “enjoy a day on a farm” (mean=3.84), and “the educational activities for children” (mean=3.83). The least important reason was to learn about MU research efforts (mean=2.83). In the analysis, attendance motivations were reduced to fewer dimensions to facilitate their application in marketing strategies (e.g., advertising, positioning) and planning activities. The varimax-rotated factor analysis resulted in two factors accounting for 74.1 percent of the variance in the data. Cronbach’s

alpha coefficients were high ($\alpha \geq 0.80$), indicating overall and within-factor internal consistency. The factors were labeled based on the motivations that loaded on them: *Theme Identity* (F1) and *Fun and Entertainment* (F2). The motivation related to “educational activities for children” (mean=3.83) did not load on any factor and was dropped from further analysis.

Theme Identity (F1) is associated with several attributes that shape this festival’s distinctiveness, including appreciation of MU outreach efforts and learning about agriculture. This factor explained 42.8 percent of the variance for these data and had an eigenvalue greater than 3 (Cronbach’s $\alpha = 0.82$). The second factor, *Fun and Entertainment* (F2), is related to the recreational nature of festivals, including the variety of recreation and entertainment activities offered at SFS. It explained 22.8 percent of variance and had an eigenvalue close to 2 (Cronbach’s $\alpha = 0.80$). A composite mean was calculated for each motivational factor (Factor Mean Score [FMS]) by averaging the means of the variables loaded in each factor. Overall, the motivations related to the recreational aspect of the SFS have a larger influence on attendance (FMS-2=3.63) than do the motivations related to the SFS purpose (FMS-1=3.22).

K-means cluster analysis was performed over the factor scores and resulted in two clusters (Table 2). Cluster 1 was named *Entertainment Seeker* (n=120; 52 percent) because people in this category had a relatively high cluster center in the *Fun and Entertainment* factor (.32) and a negative center in the *Theme Identity* factor (-.68). Cluster 2 was named *Institutional Loyal* (n=108; 48 percent) because people in this category had a high final cluster center in the *Theme Identity* factor (.75) and a negative center in the *Fun and Entertainment* factor (-.34). Using the FMS previously calculated, we found that the motivations related to the Theme Identity factor were significantly more important ($p < .001$) for the *Institutional Loyal* (mean=3.81) than for the *Entertainment Seeker* (mean=2.66). Conversely, the motivations related to the Fun and Entertainment factor were significantly more important ($p = .003$) for the *Entertainment Seeker* (mean=3.79) than for the *Institutional Loyal* (mean=3.47).

Table 1.—Rotated factor matrix of the motivations driving SFS attendance

Factors and Items (n=230)	Mean ^a	Factor Loadings	Explained Variance (%)	Eigenvalue
Theme Identity (F1) ($\alpha=.82$) ^b			42.82	3.43
Support MU outreach efforts	3.18	.855		
Learn about MU research efforts	2.83	.829		
Learn about agriculture and related activities	3.23	.776		
The uniqueness of the South Farm Showcase	3.59	.710		
Factor Mean Score 1 (FMS – 1)	(3.22)			
Fun and Entertainment (F2) ($\alpha=.80$)			22.77	1.82
Enjoy a day on a farm	3.84	.825		
Variety of entertainment and activities offered	3.96	.813		
It is something different to do	3.60	.787		
I like to attend festivals	3.13	.692		
Factor Mean Score 2 (FMS – 2)	(3.63)			
Total Variance Explained			74.01	

^a Measured on a 5-point Likert scale where 1="not important"; 3="important"; and 5="extremely important"

^b Cronbach's alpha reliability coefficients for domains. Overall reliability: $\alpha=.805$.

Table 2.—Final cluster center and factor mean scores of the motivations driving SFS attendance

	Entertainment Seekers (n=120; 52%)	Institutional Loyals (n=108; 48%)	Sig.
Final Clusters Center			
Theme Identity	-.67972	.75176	$F=240.936, p<.001$
Fun & Entertainment	.31699	-.34259	$F=27.765, p<.001$
Factor Mean Scores			
Theme Identity (FMS-1)	2.66	3.81	$F=240.936, p<.001$
Fun & Entertainment (FMS-2)	3.79	3.47	$F=27.765, p=.003$

Statistical tests revealed significant differences in the socio-economic profiles, event behaviors, and recreational and tourism preferences of people in the different clusters. The proportion of respondents affiliated with MU or involved in agriculture was not significantly different among the *Entertainment Seekers* (67.2 percent and 33.3 percent, respectively) and the *Institutional Loyals* (63.9 percent and 33.4 percent, respectively). Overall, the *Entertainment Seekers* were younger and in earlier family-life stages than *Institutional Loyals* (Table 3). Measured on a 6-point ordinal scale¹, the *Entertainment Seekers* were on average less than 36 years old, while the *Institutional Loyals* were on average more than 36 years old ($F=6.43, p=.012$). The *Entertainment Seeker* group had a larger proportion of respondents

living with children younger than 6 years old ($\chi^2=11.65, p<.001$) and a smaller proportion of retirees from another profession ($\chi^2=5.83, p=.015$). No differences were found in the gender and household annual incomes of the respondents in the two groups.

We found very few significant differences in festival behaviors between clusters. A larger proportion of the *Entertainment Seeker* cluster (90.3 percent) attended the SFS accompanied by their children compared to the *Institutional Loyal* cluster (78.1 percent; $\chi^2=5.90, p=.015$); these results are consistent with the early family-life cycle stage of the first group as already reported (Table 4). An important finding for festival programming purposes is that *Institutional Loyals* spent on average

Table 3.—Comparison of socio-economic demographics between the Entertainment Seekers and the Institutional Loyals

	Entertainment Seekers (52%)	Institutional Loyals (48%)	All (100%)	Sig.
Gender				
Female	68.9	67.9	68.4	<i>Not Sig.</i>
Male	31.1	32.1	31.6%	
Age				
Age (mean) ^a	2.85	3.21	3.02	$F=6.43, p=.012$
Socio-Economic Indicators				
Education level (mean) ^b	5.18	4.73	4.97	$F=5.43, p=.021$
Annual household income (mean) ^c	4.53	4.23	4.40	<i>Not Sig.</i>
Family Life-cycle Indicators				
Small kids living at home (<6 yrs)	69.0%	46.0%	58.3%	$\chi^2=11.65, p<.001$
Kids living at home (<12 yrs)	29.3%	37.0%	32.9%	<i>Not Sig.</i>
Full-time employees	75.8%	63.0%	69.7%	$\chi^2=4.46, p=.025$
Retired from a previous job/profession	2.5%	10.2%	6.1%	$\chi^2=5.83, p=.015$
Residence Location ^d				
Distance from a 50,000-pop. city	1.58	2.05	1.80	$F=6.17, p=.014$

^a Measured on a 6-point ordinal scale, where 1="25 years or less"; 2="26-35 years"; 3="36-45 years"; 4="46-55 years"; 5="56-65 years"; and 6="66 years or older".

^b Measured on a 7-point ordinal scale, where 1="Less than high school"; 2="High school graduate"; 3="Some college"; 4="Two-year college degree"; 5="Four-year college degree"; 6="Masters degree"; and 7="Doctorate or professional".

^c Measured on an 8-point ordinal scale, where 1="Less than \$25,000"; 2="\$25,000-\$34,999"; 3="\$35,000-\$49,999"; 4="\$50,000-\$74,999"; 5="\$75,000-\$99,999"; 6="\$100,000-\$149,999"; 7="\$150,000-\$199,999"; and 8="\$200,000 or more".

^d Measured on a 6-point ordinal scale, where 1="I live in a 50,000-pop. city"; 2="Less than 5 miles"; 3="5-9 miles"; 4="10-29 miles"; 5="30-59 miles"; and 6="60 miles or more".

significantly more (\$21.00) at the festival than their counterparts (\$6.59; $p=.036$). No differences emerged in other event behavior indicators, including previous attendance, distance traveled to and hours stayed at the SFS, and party size.

The survey also asked respondents about their general leisure activities and interests. Overall, the *Entertainment Seekers* participated in a wider variety of leisure activities than their counterparts, maybe because of their younger relative ages and earlier family life-stage (Table 5). A larger proportion of the *Entertainment Seeker* cluster watched at least 1 hour of TV at home per day (52.5 percent) and had attended at least two festivals (91.6 percent) compared to the *Institutional Loyal* cluster (38.0 percent and 83.2 percent, respectively; $p<.05$). Although live entertainment attendance was very low in both groups, the *Institutional Loyals* attended live sporting events more frequently than their counterparts. This

participation may be associated with supporting MU teams at local sporting events. Both groups had taken approximately three pleasure trips at least 50 miles away from home in the last 12 months. Perhaps because of their broader set of leisure interests, a larger proportion of *Entertainment Seekers* (79.6 percent) than *Institutional Loyals* (62.5 percent; $p=.004$) had taken out-of-state pleasure trips over the previous 12 months.

Both clusters were most interested in visiting attractions or activities related to nature and natural resources, including zoos, gardens, or aquariums (mean=3.77), state or national parks (mean=3.62), and natural landscapes and resources (mean=3.43) (Table 6). Overall, cultural attractions were significantly more influential ($p<.05$) in *Institutional Loyals'* choice of a pleasure travel destination than in *Entertainment Seekers'* decisions. These results were applicable to both live (e.g., customs and ways of living) and built (e.g., historic attractions, sites, or

Table 4.—Comparison of event behavior indicators between the Entertainment Seekers and the Institutional Loyals

	Entertainment Seeker (52%)	Institutional Loyal (48%)	All (100%)	Sig.
Previous Attendance				
First timers	72.5%	68.5%	70.6%	<i>not sig.</i>
Repeat visitors	27.5%	31.5%	29.4%	
Distance Traveled				
Less than 30 miles	95.0%	88.8%	92.0%	<i>not sig.</i>
30 - 59 miles	4.2%	6.5%	5.3%	
60 miles or more	0.8%	4.7%	2.7%	
Hours Stayed				
1 hour or less	1.7%	0.0%	0.9%	<i>not sig.</i>
2 - 3 hours	45.8%	44.4%	45.2%	
3 or more hours	52.5%	55.6%	53.9%	
Party Size				
Mean (in number of people)	3.72	3.52	3.63	<i>not sig.</i>
Party Composition				
Accompanied by their children	90.3%	78.1%	84.7%	$\chi^2=5.90, p=.015$
Accompanied by spouse	60.2%	50.0%	55.5%	<i>not sig.</i>
Accompanied by friends	13.3%	18.8%	15.8%	<i>not sig.</i>
Amount Spent				
Mean (in dollars)	6.59	21.04	13.29	$F=4.47, p=.036$

Table 5.—Comparison of leisure and tourism indicators between the Entertainment Seekers and the Institutional Loyals^a

	Entertainment Seekers (52%)	Institutional Loyals (48%)	All (100%)	Sig.
Home-Based Entertainment (Hrs/day)				
<i>Watching TV</i>				
Less than 1 hour	47.5%	62.0%	54.4%	$\chi^2=4.83, p=.019$
1 hour or more	52.5%	38.0%	45.6%	
<i>Watching Movies</i>				
Less than 1 hour	86.2%	87.6%	86.9%	<i>not sig.</i>
1 hour or more	13.8%	12.4%	13.1%	
Attendance at Live-Entertainment Events ^a				
Live sporting events (mean)	2.19	2.56	2.37	$F=5.95, p=.016$
Live performance (mean)	2.05	2.13	2.09	<i>not sig.</i>
Number of Festivals Attended				
Only South Farm Showcase	8.4%	16.8%	12.4%	$\chi^2=3.68, p=.043$
Two or more festivals	91.6%	83.2%	87.6%	
Tourism Indicators				
Number of pleasure trips (last 12 months)	3.60	3.61	3.61	<i>not sig.</i>
Took out-of-state trips (last 12 months)	79.6%	62.5%	71.4%	$\chi^2=7.80, p=.004$

^a Measured on a 5-point Likert scale, where 1="very rarely"; 3="occasionally"; and 5="very often".

Table 6.—Entertainment Seekers' and the Institutional Loyals' preferred attractions and activities when choosing a pleasure travel destination^a

Types of Attractions and Activities	Entertainment Seekers (52%)	Institutional Loyals (48%)	All (100%)	Sig.
Nature Based Attractions				
Zoos, gardens, or aquariums	3.74	3.80	3.77	<i>Not Sig.</i>
State or National Parks	3.55	3.70	3.62	<i>Not Sig.</i>
Natural landscapes and resources	3.39	3.47	3.43	<i>Not Sig.</i>
Water-based entertainment (e.g., boating)	3.08	3.40	3.23	$F=4.97, p=.027$
Cultural Attractions				
Historic attractions, sites, or places	3.15	3.44	3.29	$F=5.24, p=.023$
Fairs, festivals, or events	3.06	3.07	3.06	<i>Not Sig.</i>
Museums	2.76	3.01	2.88	<i>Not Sig.</i>
Local arts and crafts	2.55	2.98	2.75	$F=10.70, p<.001$
Customs and ways of living	2.55	2.93	2.73	$F=7.35, p=.007$
Libraries, bookstores, or literary events	2.45	2.84	2.64	$F=6.11, p=.014$
Live performances	2.31	2.73	2.51	$F=8.59, p=.004$
Architecture or buildings	2.24	2.72	2.47	$F=14.49, p<.001$
Agriculture-related Attractions				
Agricultural attractions or events	2.50	3.02	2.75	$F=14.93, p<.001$
Local products or foods	2.38	2.95	2.65	$F=14.32, p<.001$

^a Measured on a 5-point Likert scale, where 1="not important"; 3="important"; and 5="extremely important".

places) expressions of culture and heritage. Agriculture-based attractions (e.g., agricultural festivals, local foods) were also significantly more important in the choice of pleasure travel destinations for the *Institutional Loyals* than for the *Entertainment Seekers* ($p<.001$).

4.0 CONCLUSIONS

As suggested in the literature, this study confirmed that festivals attract people with different motivations, including seeking entertainment and supporting a specific institution because of strong institutional identity. Specifically, this study found that diverse motivations drove attendance at a university-based agricultural festival. The nine motivations tested in this study resulted in two motivational factors: *Theme Identity (F1)* which was associated with several distinctive attributes of the SFS; and *Fun and Entertainment (F2)*, which was associated with the types and variety of recreation and entertainment activities offered at the festival. These motivations factors, in turn, pertained to two types of attendees: *Entertainment Seekers*, who were driven by recreational and entertainment opportunities,

and *Institutional Loyals*, who were more driven by unique factors about the SFS and its setting.

It is important for marketers and event planners to identify different attendance motivations and different segments of event attendees so that they can tailor future festival offerings to their visitors' needs and expectations and provide satisfying experiences (Fodness 1994, Lee et al. 2004). This study suggests that SFS organizers need to highlight fun/entertainment and agricultural themes in their promotions and advertising to draw both *Entertainment Seekers* and *Institutional Loyals*. A variety of recreational activities needs to be offered and advertised to attract families with small children while the MU theme needs to be strengthened when targeting a middle-aged clientele.

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6.0 CITATIONS

- Backman, K.; Backman, S.; Uysal, M.; Sunshine, K. 1995. **Event tourism: An examination of motivations and activities.** Festival Management and Event Tourism. 3(1): 15-24.
- Barbieri, C.; Cernusca, M.; Gold, M.; Aguilar, F.X. 2009. **Attendance Motivations behind the Missouri Chestnut Roast festival.** Oral presentation at the 11th North American Agroforestry Conference. Columbia, MO (May 31 - June 3, 2009).
- Crompton, J.; McKay, S. 1997. **Motives of visitors attending festival events.** Annals of Tourism Research. 24(2): 425-439.
- Fodness, D. 1994. **Measuring tourism motivation.** Annals of Tourism Research. 21(3): 555-581.
- Getz, D. 2008. **Event tourism: Definition, evolution, and research.** Tourism Management. 29: 403-428.
- Lee, C.; Lee, Y.; Wicks, B. 2004. **Segmentation of festival motivation by nationality and satisfaction.** Tourism Management. 25(1): 61-70.
- Nicholson, R.; Pearce, D. 2001. **Why do people attend events: A comparative analysis of visitor motivations at four south island events.** Journal of Travel Research. 39(4): 449-460.
- Schofield, P.; Thompson, K. 2007. **Visitor Motivation, Satisfaction and Behavioural Intention: The 2005 Naadam Festival, Ulaanbaatar.** International Journal of Tourism Research. 9: 329-344.

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