

Moderating Role of Gender in the Relationship between Humor Styles and Group Cohesiveness

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Abstract

Humor is one of the fundamental elements used in human communication and therefore has an influence on the employees in groups and organizations from the perspective of managers. Despite the results of these observations in communication studies, in practice the impact of humor on the management and strategy of an organization is not widely addressed. Humor is more than just an amusing concept. It can be used as an administrative tool which provides many objectives to be achieved. Stress, which is the indisputable fact of the business world, is often negatively related to the operational performance. The dimension of the stress effect was measured at different levels in many scientific studies. At the same time, stress in the workplace is represented as a variable that affects the operational performance and it is suggested that the hypothesis of using humor on stress management solves problems that cause stress in workplace and creates stronger communication among managers. This study examines the effect of humor styles on the group cohesiveness of managers in terms of their gender. The originality of this study is based on the fact that no field research was previously performed using these variables. However, use of humor is commonly researched as "the use of humor in the workplace"; but the relation between the use of humor by managers and their genders has not been examined. In this context; this study analyzes the effects of humor on manager group cohesiveness as a strategic element of management.

Keywords: Humor Styles, Group Cohesiveness, Gender

Introduction

The effect of humor in workplace has not been investigated for years. Several researchers argued that humor focuses on physical, psychosocial health and well-being (Wisse, Rietzschel, 2014; Martin et al, 2003). In order to improve the effectiveness in organizations, the studies have been carried out about how humor can be used for the employees' benefit and as a tool for management (Wood et al 2011).

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Humor is an indirect and uncertain form of communication related body gestures and facial expressions composing the tacit knowledge common to the people involved (Lang and Lee, 2010). There is a science to humor, which is considered only as an informal approach for communicating impulsiveness, which managers can apply as an effective strategic tool for their organizations (Romero and Cruthirds, 2006). According to Mesmer-Magnus et al. (2012) and Romero and Cruthirds (2006), humor in the workplace has an effect on socialization, bonding, stress, burnout, and employee morale, productivity, creativity, and performance. Therefore humor is a great way of veiled communication while it supports creative and innovative way of thinking which is important for an individual's adaptation in a group (Lang and Lee, 2010) and organization.

Lang and Lee (2010) mentioned three types of humor: liberating humor, controlling humor and stress-relieving humor. Humor can be put into four different types according to Martin et al. (2003)'s differentiation: affiliative humor, aggressive humor, self-enhancing humor and self-defeating humor. Also Holmes and Marra (2002) classified humor in two dimensions: subversive humor and positive humor. Humor has been studied in different disciplines such as psychology, sociology, marketing and management. This diversity of definition reveals different dimensions of the humor. Group cohesiveness is a determinant element of the team performance (Beal et al., 2003; Evans and Dion, 1991). Using humor among the members of an organization can affect the company's performance. This study examines how humor styles (liberating humor, controlling humor and stress-relieving humor) affect group cohesiveness as well as the moderating role of gender on this relationship within the managerial perspective.

Hypothesis Development

Managers usually don't consider the employees' human interaction dimension which is an effective way of managing work groups (Terrion, Ashforth, 2015). Globalization increases the cutthroat competition among the organizations as an external environment for the companies as well as the cutthroat competition between the group members of the organization as an internal environment factor. This causes the organizational environment to be stressful and unpleasant. Humor as an often-ignored behavior can provide less stressful and unpleasant climate if used by the management.

In the literature review, humor was observed to be studied in a number of disciplines such as psychology, sociology, marketing, communication and management sciences. Humor has been proposed to be an important additional filter through which individuals may view and cognitively process issues of contestation and importance (Martin, 2007). Humor has also an impact on work groups and organizations (Romero and Cruthirds, 2006). Besides, the managerial benefits of humor are ignored within the groups and organizations. On the other hand it facilitates the communication within groups, relaxes the mood of the business environment despite the belief that business is serious. Proceeding from this point of view researchers from several different disciplines studied humor and provided different definitions. Woodburry-Farina and Antongiorgi (2014), defined humor as an amusing social interaction that occurs best between two or more people. Humor refers the ability to elicit or produce laughter and cause enjoyment (Lieberman et al, 2009). Individuals in all ages, races, ethnicities, genders, and socioeconomic statuses typically respond positively to various types of humor, but humor also tends to be cultural and regional and is therefore prone to misinterpretation. Many people are attracted to those who have a sense of humor or the ability to make others smile. Humor can also reduce stress, build relationships, alleviate group conflict or tension, demonstrate intelligence, and help attract potential partners

organizations (Romero and Cruthirds, 2006). According to these outcomes of the previous studies, humor can be defined as one of the main elements of a company's sustainability. Being a social cement to help build a relational similarity, humor in the workplace maintains compatible relationships (Trice and Beyer 1993; Terrion and Ashforth 2002) and also stands as a permeable membrane used by work groups to get over stress, use control, and handle crucial contradictions (Hatch 1997). According to the identification of Lang and Lee (2010); the types of humor are explained as: liberating humor, which facilitates the freeing of old mindsets and the seeing of things in a new light; stress-relieving humor, which helps to improve potential and reduce stress in the workplace; and, finally, controlling humor, which acts as veiled commands or reprimands, exerting subtle control over the behavior of others (Lang and Lee, 2010). All these types of humor can provide synergy among the employees as a positive effect. Reducing stress, creating positive approaches and motivating employees to achieve their job necessities could provide more communication among employees which can lead to group cohesiveness.

Group cohesiveness is an important study of group dynamics (Wongpakaran, et al., 2013). According to Mullen and Copper (1994) group cohesiveness is the most important small group behavior, whereas it is defined as the group spirit by Staw in 1975 and as the commitment to the group by Piper et al. in 1983. Nevertheless, these definitions consist of some common points like gathering the group members together (Man and Lam 2003). Any improvement in work group cohesiveness increases a company's performance (Evans and Dion 1991; Gully, Devine and Whitney 1995). There are several definitions on group cohesiveness in literature. In 1994 group cohesiveness is described as "one of the most interesting, and most elusive, constructs in the study of small group behavior" by Mullen et al. (1994). The characteristic of cohesiveness is important in understanding the behaviors of group members which has the number and strength of mutual positive attitudes (Greatbatch and Clark. 2003). In their review, Greatbatch and Clark. (2003) conclude that cohesiveness is multidimensional and is influenced by factors such as the degree of cooperation between group members, group acceptance of the individual member, and the existence of external threats to the group or group rewards. (Whitney and Smith, 1993)

From this point of view managers should generate cohesiveness as an internal strategy for their organization's well-being. In nature the factors improving group cohesiveness are perceived as external (threats and competition between other groups) or internal (initiation of a new member, turnover in the group) (Greatbatch and Clark. 2003). MorreThe reduction of the external factors like threats and competition enhances the group cohesiveness through this positive reinforcement. According to Francis (1994), humor reduces external threats by creating positive feelings among group members and this positive approach bonds the members of the group. There is a positive effect of humor styles on the socialization of individuals since humor makes interactions less tense (Morreall 1991). External threats force individuals to use aggressive humor on their competitors (Henman 2001). Internal drives force the senior members or managers who are responsible from the group virtue, to use much more mild aggressive humor in order to assure that the new members obey the rules of the group and behave according to its norms (Podsakoff, MacKenzie, and Ahearne, 1997). The decrease in the level of humor starts when the group members' behaviors are adopted. Actually, individuals pay attention to the group members' behaviors towards other members. When one of them is ridiculed, the other members' behaviors are influenced due to group norms (Janes and Olsen 2000; Romero and Cruthirds, 2006). Thus hypotheses are evaluated as;

H1: Liberating humor is positively associated with group cohesiveness.

H2: Controlling humor is positively associated with group cohesiveness.

H3: Stress-relieving humor is positively associated with group cohesiveness.

Therefore, this study proposes that using liberating, controlling and self relieving humor promotes group cohesiveness and gender has a moderating effect on this relationship. In previous studies, any relation couldn't be found between cohesiveness and gender. Dyck and Holtzman (2013) have found differences between using humor and its effect on social support to men and women. The findings specifically show that higher levels of humor in males related to higher levels of social support while higher levels of humor in females related to lower social support. Thus, due to this theoretical approach;

H4: Humor will be positively related to group cohesiveness more strongly for women compared to men.

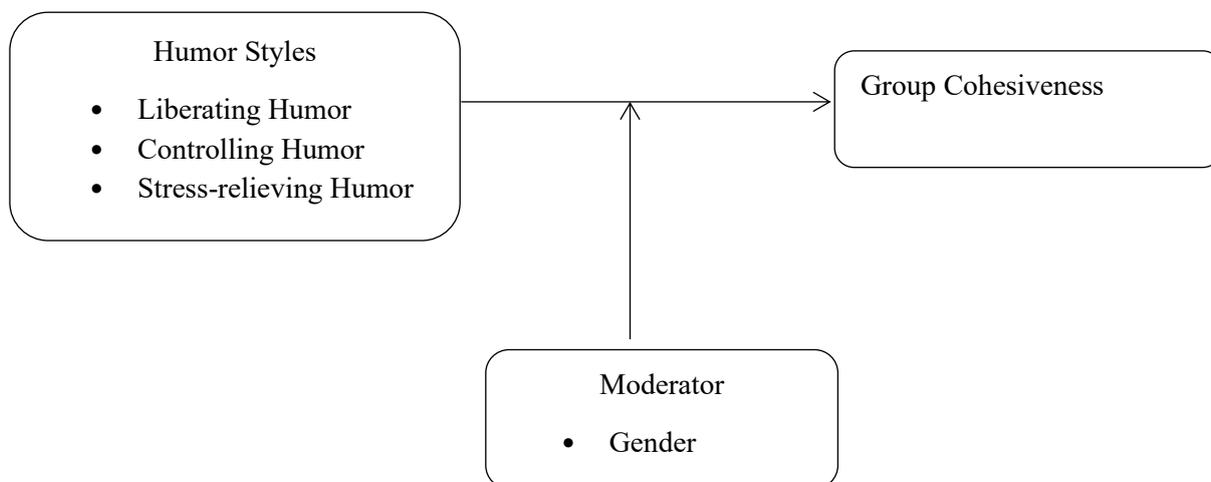


Fig. 1. Conceptual Model

The originality of the study stems from the fact that it is the first study conducted on a group of managers with the field research. However, the future studies might continue the issue by measuring the relationship of other types of humor and/or humor itself with three variables, applying this study on some other work groups different than managers, or comparing the relations between managers of different countries and finally addition of ethnicity and/or age to measure the moderating relation with gender.

Research Method

Measures and Sampling

To test the above hypotheses, multi-item scales adopted or developed from prior studies for the measurement of the variables are used. All variables were measured using 5-point Likert scales ranging from 'strongly disagree' (1) to 'strongly agree' (5). For liberating humor, controlling humor and self-relieving humor variables, 24 items have been adopted from the study of Lang and Lee (2013). Afterwards, group cohesiveness was operationalized using items adapted from Wongpakaran et al. (2013).

After adopting the new questionnaire items in English, three academics from US-based universities, each having managerial experience of more than 10 years, evaluated the content and significance of the items to establish face validity. They did not note any difficulty in understanding the items or scales. The questionnaire items were then translated into Turkish by a bilingual researcher. After the Turkish translation of the questionnaire items, a second

bilingual person retranslated them into English. The two translators then jointly reconciled all differences.

A draft questionnaire is developed and is revised in discussions with three academics from Turkey, who have knowledge of business and management and organizational behavior, as controllers. The suitability of the Turkish version of the questionnaire is tested with five senior managers, randomly selected from companies located in Istanbul, who evaluated the content of the items. Respondents did not have any difficulty in understanding the items and scales. From a list of 500 eligible companies, characterized by production/service sector those which have at least 30 employees and have been in business for more than five years are selected. During the data collection, first, the companies' general managers are contacted by telephone and we explained the aim of the study to them. Of the 150 companies contacted, 110 agreed to participate in the survey study. Also, staff members from top-level positions in their respective areas (e.g., department managers, senior staff) and different departments in the organization who can provide information are surveyed. Furthermore, respondents are asked who have worked for the company for at least five years and have a college degree to ensure their understanding of the questionnaire items.

Of the 110 companies that agreed to participate, 97 completed the questionnaires. However, although the companies are asked for at least two respondents who were the most knowledgeable about the organization's operations, 11 companies responded with only one survey, resulting in 97 companies. Thus, the analyzable sample consisted of 97 companies with 183 surveys. The mean of variables, company size, and ages of the eliminated surveys are compared with the surveys used for the analysis and found no statistical differences among them.

In the sample, the self-reporting respondents were senior employees/staffs (44%), senior engineers (31%), functional/department managers (13%), technical leaders (7%), product/project managers (3%), general managers (1%), and company owners (1%). The respondent departments were finance (35%), engineering and design (24%), marketing (20%), manufacturing (15%), and human resources (6%).

Analysis and results

Measure validity and reliability

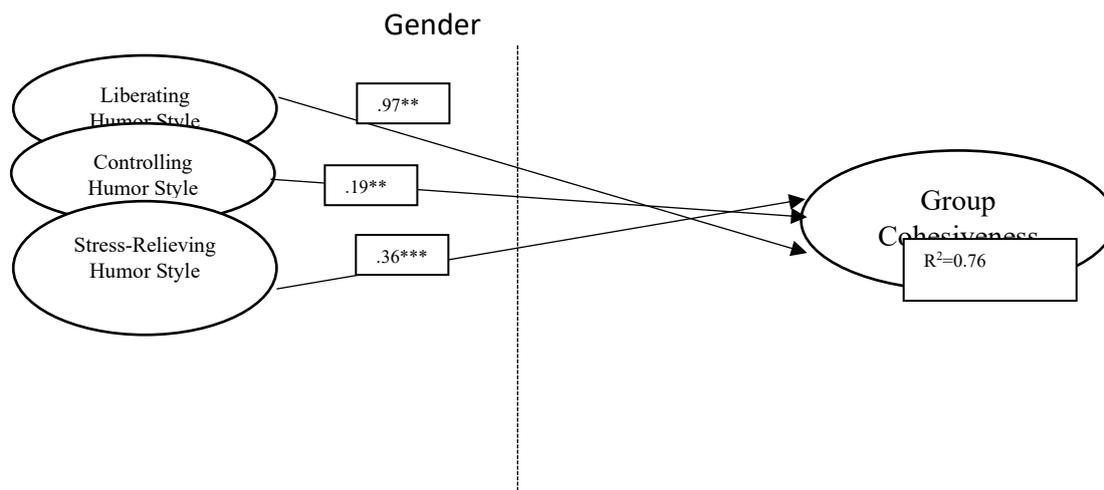
The reliability and validity of the variables are evaluated using confirmatory factor analysis (CFA) (Anderson and Gerbing, 1988; Fornell and Larcker, 1981). By using AMOS 22.0, all variables (involving 31 questionnaire items) are investigated in a CFA model using all the surveys (N=183). After data collection, the reliability and validity of measures are evaluated by employing a purification process (Anderson and Gerbing, 1988). First, an exploratory factor analysis including 31 measured items of two variables is carried out, using a principle component with a varimax rotation and an Eigenvalue of 1 as the cutoff point. It is found that the Kaiser–Meyer–Olkin (KMO) measure of sampling adequacy was 0.88, and the Bartlett test of sphericity was significant at $p < .01$, indicating the suitability of these data for factor analytic procedures. The result of the factor analysis suggests a four factor solution: liberating humor style, controlling humor style, stress-relieving humor style and group cohesiveness as seen in the original study. Results reveal that Cronbach's Alphas for reliability are above the acceptable levels of .70 (Hair et al., 2006; Pallant, 2007).

After exploratory factor analysis, the reliability and validity of our variables are evaluated using confirmatory factor analysis (CFA) (Fornell and Larcker, 1981). To assess unidimensionality, measures were divided into two subsets of theoretically related variables:

(1) the three humor style measures (i.e. liberating, controlling and stress-relieving) and (2) group cohesiveness as recommended by Lang and Lee (2013) and Wongpakaran et al. (2013). After eliminating the problematic items through a step-by-step procedure, results indicated that two models fit adequately for the humor style variables ($\chi^2 = 431.60$, CFI = .91, RMSEA = .09) and group cohesiveness variable ($\chi^2 = 426,89$, CFI = .90, RMSEA = .08). Also, all reliability estimates, including coefficient alphas, average variance extracted (AVE) for each construct, and AMOS-based composite reliabilities, are well beyond or close to the threshold levels suggested by Fornell and Larcker (1981). The reliabilities of multiple-item reflective measures are reported in Table 1, along with construct correlations and descriptive statistics for the scales. All reliability estimates are well beyond or close to the threshold levels suggested.

Table 1: Descriptive scales and construct correlations, and reliability estimates

Variables	Mean	Standard Deviation	1	2	3	4	5
1. Humor Style	4.53	0.73	0.789				
2. D. of Liberating	3.22	0.81	0.469*	0.654			
3. D. of Controlling	3.38	0.91	0.348*	0.527*	0.780		
4. D. of Stress-Relieving	3.82	0.58	0.313*	0.276*	0.125	0.812	
5. D. of Group Cohesiveness	3.57	0.76	0.363*	0.416*	0.211*	0.567*	0.954
Cronbach Alfa			0.93	0.88	0.84	0.91	0.84
Composite Reliability(CR)			0.81	0.82	0.78	0.82	0.93
Average Variance Extracted (AVE)			0.50	0.53	0.51	0.67	0.62
<i>*p<0.05, **p<0.01</i>							



$\chi^2 (46)=123.48$, $\chi^2 /df = 2.58$, CFI=.91 IFI= .92, RMSEA=.08

* $p < 0.1$ ** $p < 0.05$, *** $p < 0.01$ Path coefficients are standardized

Fig. 2. Path-model Results

Hypothesis Testing

To test the hypotheses, a structural equation modeling (SEM) analysis is carried out using AMOS 22.0. SEM requires sample sizes greater than 200 with five to ten cases per observed variable (Kline, 2005; Hair et al., 2006). Subsequent analyses resulted in a final dataset of 183 cases still exceeding the minimum requirements for SEM. During the analysis, the parameters representing the covariances across humor style contents and group cohesiveness variables were allowed to be free, consistent with the management literature. It has been found that the covariances among the humor styles variables were all significant. This indicates that liberating, controlling and stress-relieving humor styles occur simultaneously and affect each other. Fig. 2 demonstrates the relationships among humor styles, group cohesiveness and gender. It shows that the conceptual model adequately fits the data. The incremental fit index and comparative fit index are beyond 9. The ratio ($\chi^2 /d.f.$), the chi-square per degree of freedom, is 2.58, which is less than 5, suggesting a reasonable fit. The RMSEA is .08.

Regarding the role of humor style contents in group cohesiveness, it is found that liberating humor ($\beta = .97$, $p < .01$), controlling humor ($\beta = .19$, $p < .05$) and stress-relieving humor ($\beta = .36$, $p < .01$) are positively associated with group cohesiveness, thus supporting H1, H2 and H3. Furthermore, the results in Fig. 2 show that humor styles content variables explain 76% of variance ($R^2 = .76$) in group cohesiveness.

Testing the Moderating Effect

To test the moderating role of gender between humor styles and group cohesiveness (hypothesis H4), a moderated hierarchical regression analysis was used (Irwin and McClelland, 2001). To reduce multicollinearity and make the interpretation of coefficients in multiple regressions more meaningful, all interaction terms were centered at their mean, as suggested by Aiken and West (1991).

	DV: Group Cohesiveness	
	Model 1	Model 2
Main Effects		
Liberating Humor Style	0.55***	0.58**
Controlling Humor Style	0.21**	0.32
Stress-Relieving Humor Style	0.39***	1.37***
Gender	0.22	0.47
Interactions		
Liberating HumorxGender		0.23**
Controlling HumorxGender		0.41**
Stress-RelievingxGender		0.97***
R ²	.076	.621
Adjusted R ²	.085	.512
F value	.017**	.310***
Notes: *p < 0.1; **p < 0.05; ***p < 0.01. Regression coefficients are standardized		

Using a moderating variable for gender (males=0, females=1) and a centered humor styles variable (Lang and Lee 2013) the interaction term of gender*liberating humor was significantly related to group cohesiveness ($\beta = 0.23$, $p < 0.05$), gender*controlling humor was significantly related to group cohesiveness ($\beta = 0.41$, $p < 0.05$) and gender*stress-relieving humor was significantly related to group cohesiveness ($\beta = 0.97$, $p < 0.01$). It is found that the direction of the relationship between liberating humor and group cohesiveness among females ($\beta = 0.15$, $p \leq 0.00$) are stronger when compared with males ($\beta = 0.03$, $p \leq 0.00$), the relationship between stress-relieving humor and group cohesiveness among males ($\beta = 0.48$, $p \leq 0.00$) are stronger when compared with females ($\beta = 0.12$, $p \leq 0.00$) and the relationship between controlling humor and group cohesiveness among females ($\beta = 0.76$, $p \leq 0.00$) are stronger when compared with males ($\beta = 0.14$, $p \leq 0.00$).

Discussion an Implications

Although humor has been defined as a variable that could affect employees' satisfaction and performance (Patterson et.al, 2005), humor also has strategic importance for the managerial level of the organizations for the group cohesiveness. A goal of this study was to create an instrument by using humor styles that would allow existence for the group cohesiveness. When a manager uses humor with different style as creative and novel point of view (liberating humor style), reducing stress (stress-relieving) and exerting control over the behaviors of others (controlling humor) he/she can bring together the employees by using wittily communicated messages. The literature also supports the finding that this type of communication process is an internal strategy for well-being (Henman 2001).

Female managers, based on the result, who use more liberating and controlling humor style can create group's overall social integration, as well as an individual's perceived attraction to the group, satisfaction with other members of the group, and view of social interaction among the group members. Besides, male managers having stress-relieving humor style are more likely to form ties to create a network and the collective mind as group cohesiveness. These findings propose that women more likely use emotional intelligence, which leads to their use of creative skills and controlling behaviors on humor. Men mostly tend to behave by their intelligence quotient by our observation. Such a behavior can be more effective on stress-relieving humor impact on the group cohesiveness.

This study has limitations that need to be addressed in future research. First researchers should take this type of study on larger implication area. Global corporations could reveal different findings of moderating role of gender. On the other hand, due to the nature of the sample, generalizability is an other limitation. The study was conducted in a specific national context, Turkish firms. These findings cannot be generalized to all off the cultural variety of the global companies having different cultural context. Finally, culture and environmental uncertainty could be another control variable on the relationship of humor styles and group cohesiveness.

Conclusion

The moderating role of gender in the relationship between humor styles and group cohesiveness is investigated in the study. The results showed that liberating humor, controlling humor and stress-relieving humor are positively associated with group cohesiveness. It is found that the direction of the relationship between liberating humor and group cohesiveness among females are stronger when compared with males and the relationship between controlling humor and group cohesiveness among females are stronger when compared with males. Different from these two results, the relationship between stress-relieving humor and group cohesiveness among males are stronger when compared with females.

References

- Aiken, L. S., West, S. G., Reno, R. R. (1991). Multiple regression: Testing and interpreting interactions. Sage.
- Anderson, J.C., Gerbing, D.W. (1988). Structural equation modeling in practice: a review and recommended two-step approach. *Psychological Bulletin* 103, 411–423. <http://dx.doi.org/10.1037/0033-2909.103.3.411>
- Armstrong, J. S., Overton, T. S. (1977)., Estimating nonresponse bias in mail surveys, *Journal of Marketing Research* , 14(3), pp. 396-402.
- Beal, D. J., Cohen, R. R., Burke, M. J., McLendon, C. L. (2003). Cohesion and performance in groups: a meta-analytic clarification of construct relations. *Journal of Applied Psychology*, 88(6), 989. <http://dx.doi.org/10.1037/0021-9010.88.6.989>
- Berger, A. A. (1993). *An anatomy of humor*. Transaction Publishers.
- Dyck, K. T., Holtzman, S. (2013). Understanding humor styles and well-being: The importance of social relationships and gender. *Personality and Individual Differences*, 55(1), 53-58. <http://dx.doi.org/10.1016/j.paid.2013.01.023>
- Evans, C. R., Dion, K. L. (1991). Group cohesion and performance: A meta-analysis. *Small Group Research*, 22(2), 175-186. <http://dx.doi.org/10.1177/1046496491222002>

- Fornell C, Larcker D. (1981). Evaluating structural equation models with unobservable variable and measurement error. *J Mark Res*; 18: 39–50. <http://dx.doi.org/10.2307/3151312>
- Francis, L. E. (1994). Laughter, the best mediation: Humor as emotion management in interaction. *Symbolic Interaction*, 17(2), 147-163. <http://dx.doi.org/10.1525/si.1994.17.2.147>
- Gully, S. M., Devine, D. J., Whitney, D. J. (1995). A meta-analysis of cohesion and performance: Effects of levels of analysis and task interdependence. *Small Group Research*, 26(4), 497-520. <http://dx.doi.org/10.1177/1046496495264003>
- Greatbatch D., Clark. T. (2003). Displaying Group Cohesiveness: Humour and Laughter in the Public Lectures of Management Gurus. *Human Relations*. 56(12), 1515–1544 <http://dx.doi.org/10.1177/00187267035612004>
- Hatch, M. J. (1997). Irony and the social construction of contradiction in the humor of a management team. *Organization Science*, 8(3), 275-288. <http://dx.doi.org/10.1287/orsc.8.3.275>
- Hair, J., Black, W., Babin, B., Anderson, R., & Tatham, R. (2006). *Multivariate data analysis* (6th ed.). Uppersaddle River, N.J.: Pearson Prentice Hall.
- Henman, L. D. (2001). Humor as a coping mechanism: Lessons from POWs. *International Journal of Humor Research*. Volume 14, Issue 1, Pages 83–94, <http://dx.doi.org/10.1515/humr.14.1.83>,
- Holmes, J., Marra, M. (2002). Having a laugh at work: How humour contributes to workplace culture. *Journal of Pragmatics*, 34(12), 1683-1710. [http://dx.doi.org/10.1016/S0378-2166\(02\)00032-2](http://dx.doi.org/10.1016/S0378-2166(02)00032-2)
- Irwin, J.R. and McClelland, G. H. (2001), “Misleading Heuristics and Moderated Multiple Regression Models,” *Journal of Marketing Research*, 38 (1), 100–109.
- Janes, L. M., Olson, J. M. (2000). Jeer pressure: The behavioral effects of observing ridicule of others. *Personality and Social Psychology Bulletin*, 26(4), 474-485. <http://dx.doi.org/10.1177/0146167200266006>
- Kline, R. B. (2005). *Principles and practice of structural equation modeling* (2nd ed.). New York: Guilford Press.
- Lang, J. C., Lee, C. H. (2010). Workplace humor and organizational creativity. *The International Journal of Human Resource Management*, 21(1), 46-60. <http://dx.doi.org/10.1080/09585190903466855>
- Lieberman, E. A., Neuendorf, K. A., Denny, J., Skalski, P. D., Wang, J. (2009). The language of laughter: A quantitative/qualitative fusion examining television narrative and humor. *Journal of Broadcasting & Electronic Media*, 53(4), 497-514. <http://dx.doi.org/10.1080/08838150903336141>
- Man, D. C., Lam, S. S. (2003). The effects of job complexity and autonomy on cohesiveness in collectivistic and individualistic work groups: A cross-cultural analysis. *Journal of Organizational Behavior*, 24(8), 979-1001. <http://dx.doi.org/10.1002/job.227>
- Martin, R. A. (2007). *The psychology of humor: An integrative approach*. Amsterdam: Elsevier.
- Martin, R. A. (2008). Humor and health. In V. Raskin (Ed.), *Berlin: Mouton de Gruyter*, 479-522.
- Martin, R. A., Puhlik-Doris, P., Larsen, G., Gray, J., & Weir, K. (2003). Individual differences in uses of humor and their relation to psychological well-being: Development of the Humor Styles Questionnaire. *Journal of research in personality*, 37(1), 48-75. [http://dx.doi.org/10.1016/S0092-6566\(02\)00534-2](http://dx.doi.org/10.1016/S0092-6566(02)00534-2)

- Mesmer-Magnus, J., Glew, D. J., & Viswesvaran, C. (2012). A meta-analysis of positive humor in the workplace. *Journal of Managerial Psychology*, 27(2), 155-190. <http://dx.doi.org/10.1108/02683941211199554>
- Morreall, J. (1991). Humor and work. *Humor-International Journal of Humor Research*, 4(3-4), 359-374. <http://dx.doi.org/10.1515/humr.1991.4.3-4.359>
- Mullen, B., Copper, C. (1994). The relation between group cohesiveness and performance: An integration. *Psychological Bulletin*, 115(2), 210-227. <http://dx.doi.org/10.1037/0033-2909.115.2.210>
- Nunnally, J., Bernstein, I. H. (1994). *Psychometric theory*, 3rd (Ed.), McGraw-Hill, New York.
- Pallant, J. (2007). *SPSS Survival Manual*, 3rd Edition, Crows West, New South Wales.
- Patterson, M. G., West, M. A., Shackleton, V. J., Dawson, J. F., Lawthom, R., Maitlis, S., & Wallace, A. M. (2005). Validating the organizational climate measure: links to managerial practices, productivity and innovation. *Journal of organizational behavior*, 26(4), 379-408. <http://dx.doi.org/10.1002/job.312>
- Piper W, Marrache M, Lacroix R, Richardson A, Jones B. (1983). Cohesion as a basic bond in groups. *Hum. Relat.* 36:93–108
- Podsakoff, P. M., MacKenzie, S. B., Ahearne, M. (1997). Moderating Effects of Goal Acceptance on the Relationship between Group Cohesiveness and Productivity. *Journal of Applied Psychology*. 82(6), 974-983. <http://dx.doi.org/10.1037/0021-9010.82.6.374>
- Romero, E. J., Cruthirds, K. W. (2006). The use of humor in the workplace. *The Academy of Management Perspectives*, 20(2), 58-69. <http://dx.doi.org/10.5465/AMP.2006.20591005>
- Staw, B. M. (1975). Attribution of the “causes” of performance: A general alternative interpretation of cross-sectional research on organizations. *Organizational Behavior and Human Performance*, 13(3), 414-432. [http://dx.doi.org/10.1016/0030-5073\(75\)90060-4](http://dx.doi.org/10.1016/0030-5073(75)90060-4)
- Terrion, J. L., Ashforth, B. E. (2002). From ‘I’ to ‘we’: The role of putdown humor and identity in the development of a temporary group. *Human Relations*, 55(1), 55-88. <http://dx.doi.org/10.1177/0018726702055001606>
- Terrion, J. L., Ashforth, B. E., (2015). The Role of Humor in the Relationship between Transactional Leadership Behavior, Perceived Supervisor Support, and Citizenship Behavior. *Journal of Leadership and Organizational Studies*, 23: 39-54. <http://dx.doi.org/10.1177/1548051815613018>
- Trice, H.M., and Beyer, J.M. (1993). *The Cultures of Work Organizations*, Englewood Cliffs, NJ: Prentice Hall.
- Whitney I, Smith PK. (1993). A survey of the nature and extent of bullying in junior/middle and secondary schools. *Educ Res* 35:3–25.
- Wisse, B., Rietzschel, E. (2014). Humor in leader-follower relationships: Humor styles, similarity and relationship quality. *Humor-International journal of humor research*, 27(2), 249–269. <http://dx.doi.org/10.1515/humor-2014-0017>
- Wood, R. E., Beckmann, N., Rossiter, J. R. (2011). Management humor Asset or liability?. *Organizational Psychology Review*, 1(4), 316-338. <http://dx.doi.org/10.1177/2041386611418393>
- Woodbury-Fariña, M. A., Antongiorgi, J. L. (2014). Humor. *Psychiatric Clinics of North America*, 37(4), 561-578. <http://dx.doi.org/10.1016/j.psc.2014.08.006>
- Wongpakaran, T., Wongpakaran, N., Intachote-Sakamoto, R., & Boripuntakul, T. (2013). The Group Cohesiveness Scale (GCS) for Psychiatric Inpatients. *Perspectives in psychiatric care*, 49(1), 58-64. <http://dx.doi.org/10.1111/j.1744-6163.2012.00342.x>
- Ziv, A. (1984), *Personality and Sense of Humor*, New York: Springer.