



## OPEN ACCESS

EDITED AND REVIEWED BY  
Hongyi Sun,  
City University of Hong Kong,  
Hong Kong SAR, China

\*CORRESPONDENCE  
Boštjan Antončič  
✉ bostjan.antoncic@ef.uni-lj.si

RECEIVED 30 March 2023  
ACCEPTED 24 April 2023  
PUBLISHED 11 May 2023

CITATION  
Antončič B and Auer Antončič J (2023)  
Editorial: Psychological determinants of  
entrepreneurial intentions and behaviors;  
contributions of Robert D. Hisrich to the field of  
entrepreneurship. *Front. Psychol.* 14:1196889.  
doi: 10.3389/fpsyg.2023.1196889

COPYRIGHT  
© 2023 Antončič and Auer Antončič. This is an  
open-access article distributed under the terms  
of the [Creative Commons Attribution License  
\(CC BY\)](#). The use, distribution or reproduction  
in other forums is permitted, provided the  
original author(s) and the copyright owner(s)  
are credited and that the original publication in  
this journal is cited, in accordance with  
accepted academic practice. No use,  
distribution or reproduction is permitted which  
does not comply with these terms.

# Editorial: Psychological determinants of entrepreneurial intentions and behaviors; contributions of Robert D. Hisrich to the field of entrepreneurship

Boštjan Antončič<sup>1\*</sup> and Jasna Auer Antončič<sup>2</sup>

<sup>1</sup>School of Economics and Business, University of Ljubljana, Ljubljana, Slovenia, <sup>2</sup>Faculty of Management, University of Primorska, Koper, Slovenia

## KEYWORDS

psychology, personality, entrepreneurship, entrepreneurial intentions, behaviors

## Editorial on the Research Topic

[Psychological determinants of entrepreneurial intentions and behaviors](#)

## Introduction

Professor Robert D. Hisrich, Ph.D., the co-editor of this Research Topic, passed away in February 2023, so we decided to dedicate this editorial to him and his work and describe articles in this Research Topic (a Research Topic on *Psychological determinants of entrepreneurial intentions and behaviors*) considering extensions of his research.

## Robert D. Hisrich

Robert D. Hisrich, born in 1944, was a wonderful person, the best mentor, the best professor, and one of the greatest scholars of all time in the field of entrepreneurship. We are very grateful to him for helping, teaching, and inspiring us and numerous academics and practitioners globally. He will live in our hearts and memories forever. His works will be read and cited also by future generations.

Professor Hisrich was the Bridgestone Chair of International Marketing & Director of The Global Management Center and International Programs at Kent State University, Kent, Ohio. He also held visiting or honorary professor positions at universities in six different countries outside the United States (e.g., the longest cooperation with the School of Economics and Business at the University of Ljubljana, Slovenia, since 1995). His past positions included, e.g., Garvin Professor of Global Entrepreneurship and Director, Walker Center for Global Entrepreneurship, Thunderbird School of Global Management, Phoenix, Arizona; Malachi Mixon III Chair in Entrepreneurial Studies and Professor and Chair of Strategy Division and Entrepreneurship Division, Weatherhead School of Management, Case Western Reserve University, Cleveland, Ohio; Chair of the Entrepreneurship Division of the Academy of Management; Bovaird Chair of Entrepreneurial Studies and Private

Enterprise and Professor of Marketing, College of Business Administration, University of Tulsa, Tulsa, Oklahoma; Associate Professor of Marketing, Graduate School of Management, Boston College, Chestnut Hill, Massachusetts; Adjunct Professor of Marketing and Technology, Innovation Center, Massachusetts Institute of Technology, Cambridge, Massachusetts; Faculty Associate Small Business Development Center; Director, Small Business Institute; Director, H&B Associates, a marketing and management-consulting firm. He authored or co-authored 37 books and more than 300 articles on entrepreneurship, international business, venture capital, management, and marketing.

His two most influential books were *Entrepreneurship* (Hisrich et al., 2020), 11 published editions and the 12th in preparation, and *The Woman Entrepreneur* (Hisrich and Brush, 1985). The *Entrepreneurship* books broadened the horizons of entrepreneurship, starting businesses, and managing small and medium-sized enterprises (SMEs) and large corporations of numerous entrepreneurs, businesspeople, students, government officials, and others. It has been read globally in English and other languages. The *Woman Entrepreneur* book highlights the importance of women in entrepreneurship and their characteristics. The famous definition of entrepreneurship states (Hisrich et al., 2005, p. 8; Hisrich et al., 2007, p. 576) the following: “Entrepreneurship is the process of creating something new with value by devoting the necessary time and effort, assuming the accompanying financial, psychic, and social risks, and receiving the resulting rewards”.

His most influential articles—the top 30 publications with 10 or more citations in the Web of Science—are displayed in Table 1. His articles were the most influential in 10 areas (Table 2), among which the top 3 were business, management, and economics, followed by psychology (applied and multidisciplinary). Specifically, the topics covered by his works were intrapreneurship, venture capital, female entrepreneurship, psychological aspects of entrepreneurship, SME internationalization, ethics of entrepreneurs, entrepreneurship in transition economies, new venture creation, and marketing.

## Psychological determinants of entrepreneurial intentions and behaviors

Current researchers in the field of entrepreneurship are standing on the shoulders of giants—the past researchers (Robert D. Hisrich and others), who made prior developments to theories and concepts. For example, Hisrich (1990) presented the features of entrepreneurship and intrapreneurship from a psychological perspective. This Research Topic covers topics in entrepreneurial psychology with a range of original research articles from different research areas and perspectives that examine personality determinants of entrepreneurship and used data from various countries (Australia, China, Malaysia, Saudi Arabia, Slovenia, Spain, South Africa, and the United States of America). Hisrich et al. (2007, p. 575) motivated researchers within entrepreneurial psychology “to develop theory and undertake empirical research focusing on five key topic areas: the personality characteristics

of entrepreneurs, the psychopathology of entrepreneurs, entrepreneurial cognition, entrepreneurship education, and international entrepreneurship”. This Research Topic focused mostly on the personality characteristics of entrepreneurs.

Antončič (2020) proposed directions for future research: “Personality correlates of entrepreneurs need to be researched in cross-cultural comparative studies and in studies that include sociological elements, which may be related to the formation of the personality or behavior of individuals with entrepreneurial intentions and entrepreneurs and intrapreneurs. The personality differences between entrepreneurs and intrapreneurs also need to be investigated in greater detail in future research. Theoretical models need to be, on one hand, more comprehensive (with many different correlates) and, on the other hand, more detailed (with many sub-dimensions and facets in quantitative research, as well as with more in-depth explanations of phenomena in qualitative research).” This Research Topic incorporated these directions well since it includes the following: a cross-cultural study (Soltwisch et al.); studies with sociological elements (Antončič and Auer Antončič; Bai et al.; Guo et al.; Qiu et al.); studies including intrapreneurship elements (Thomran et al.; Soltwisch et al.); studies with more comprehensive theoretical models (Antončič and Auer Antončič; Bergner et al.; Guo et al.; Heinemann et al.; Soltwisch et al.; Volery and Mattes); a case study (Bai et al.); and studies examining social (Bergner et al.; Soltwisch et al.) and serial (Bai et al.) entrepreneurial intentions.

The key personality correlates of entrepreneurship were summarized in past research (e.g., Antončič, 2020): the Big Five personality factors, entrepreneurial self-efficacy, need for independence, risk-taking propensity, internal locus of control, and need for achievement. Most of these elements are included in this Research Topic, with the addition of other personality and non-personality correlates of entrepreneurship: (1) Volery and Mattes: the Big Five personality, education, necessity entrepreneurs, and self-employment survival/exit; (2) Antončič and Auer Antončič: all psychology correlates from Antončič (2020), sociological elements (family business background, local business support background), and start-up intentions and actions; (3) Heinemann et al.: epistemic curiosity, openness to experience, entrepreneurial alertness, and entrepreneurship (intention and orientation); (4) Hamzah and Othman: internal locus of control, external locus of control, and entrepreneurial competency; (5) Qiu et al.: faultline configurations and the entrepreneurial team performance; (6) Thomran et al.: autonomy, risk-taking, proactiveness, innovativeness, competitive aggression, cost advantage, and differentiation advantage; (7) Guo et al.: improvisation, entrepreneurial self-efficacy, policy support for entrepreneurship, and entrepreneurial intention; (8) López-Núñez et al.: self-efficacy, emotional intelligence, the Big Five personality, and entrepreneurial intention; (9) Soltwisch et al.: decision styles, cultural orientation, entrepreneurial intention, and social entrepreneurial intention; (10) Bergner et al.: personality, cognition, entrepreneurial exposition, and social entrepreneurial intention; (11) Bai et al.: entrepreneurial expectations, identification and evaluation of opportunities, entrepreneurial failure learning, entrepreneurial cognitive schema, behavioral addiction tendency, emotional perception and motivation, entrepreneurial experience, environmental

TABLE 1 Top 30 publications in the Web of Science (sorted by the number of citations).

Rank	Title	References	Journal	Citations
1	Intrapreneurship: Construct refinement and cross-cultural validation	<a href="#">Antončić and Hisrich, 2001</a>	Journal of Business Venturing	581
2	Toward a model of venture capital-investment decision-making	<a href="#">Fried and Hisrich, 1994</a>	Financial Management	324
3	Israeli women entrepreneurs: An examination of factors affecting performance	<a href="#">Lerner et al., 1997</a>	Journal of Business Venturing	211
4	Entrepreneurship Intrapreneurship	<a href="#">Hisrich, 1990</a>	American Psychologist	200
5	Entrepreneurship research and practice - A call to action for psychology	<a href="#">Hisrich et al., 2007</a>	American Psychologist	174
6	Human capital and SME internationalization: A structural equation modeling study	<a href="#">Ruzzier et al., 2007b</a>	Canadian Journal of Administrative Sciences -Revue Canadienne des sciences de l administration	154
7	The female entrepreneur - A career development perspective	<a href="#">Bowen and Hisrich, 1986</a>	Academy of Management Review	153
8	The venture capitalist - A relationship investor	<a href="#">Fried and Hisrich, 1995</a>	California Management Review	131
9	Strategy and the board of directors in venture capital-backed firms	<a href="#">Fried et al., 1998</a>	Journal of Business Venturing	129
10	How venture capital firms differ	<a href="#">Elango et al., 1995</a>	Journal of Business Venturing	119
11	Intuition in venture capital decisions - An exploratory-study using a new technique	<a href="#">Hisrich and Jankowicz, 1990</a>	Journal of Business Venturing	104
12	Entrepreneurs' creativity and firm innovation: The moderating role of entrepreneurial self-efficacy	<a href="#">Ahlin et al., 2014a</a>	Small Business Economics	93
13	Ethics and entrepreneurs - An international comparative study	<a href="#">Bucar et al., 2003</a>	Journal of Business Venturing	85
14	Product innovation and firm performance in transition economies: A multi-stage estimation approach	<a href="#">Ramadani et al., 2019a</a>	Technological Forecasting and Social Change	66
15	Entrepreneurship in the Soviet-union and post-socialist Russia	<a href="#">Ageev et al., 1995</a>	Small Business Economics	48
16	Perceived risk in store selection	<a href="#">Hisrich et al., 1972</a>	Journal of Marketing Research	42
17	Intrapreneurship strategy for internal markets-Corporate, non-profit and government institution cases	<a href="#">Nielsen et al., 1985</a>	Strategic Management Journal	41
18	The Russian entrepreneur	<a href="#">Hisrich and Grachev, 1993</a>	Journal of Business Venturing	40
19	Beekeeping as a family artisan entrepreneurship business	<a href="#">Ramadani et al., 2019b</a>	International Journal of Entrepreneurial Behavior and Research	30
20	Risk-taking propensity and entrepreneurship: The role of power distance	<a href="#">Auer Antončić et al., 2018</a>	Journal of Enterprising Culture	25
21	The internationalization of SMEs: Developing and testing a multi-dimensional measure on Slovenian firms	<a href="#">Ruzzier et al., 2007a</a>	Entrepreneurship and Regional Development	25
22	Technological innovativeness and firm performance in Slovenia and Romania	<a href="#">Antončić et al., 2007</a>	Post-Communist Economies	24
23	Selecting superior segmentation correlate	<a href="#">Hisrich and Peters, 1974</a>	Journal of Marketing	24
24	Entrepreneurial stressors as predictors of entrepreneurial burnout	<a href="#">Wei et al., 2015</a>	Psychological Reports	19
25	Exploring the moderating effects of absorptive capacity on the relationship between social networks and innovation	<a href="#">Ahlin et al., 2014b</a>	Journal of East-European Management Studies	18
26	Manufacturing entrepreneurs - An empirical-study of the correlates of employment growth in the Tulsa MSA and rural East Texas	<a href="#">Box et al., 1994</a>	Journal of Business Venturing	17

(Continued)

TABLE 1 (Continued)

Rank	Title	References	Journal	Citations
27	Entrepreneurial openness: Concept development and measure validation	Slavec et al., 2017	European Management Journal	13
28	The mediating role of corporate entrepreneurship for external environment effects on performance	Kearney et al., 2013	Journal of Business Economics and Management	13
29	New business formation through the enterprise development center - A model for new venture creation	Hisrich, 1988	IEEE Transactions on Engineering Management	11
30	Executive advertisers views on comparison advertising	Hisrich, 1983	Sloan Management Review	10

Source: Web of Science (2023).

TABLE 2 Impact—top 10 categories.

Rank	Category	Citations (impacted publications)	% of 2,130 citations
1	Business	1,096	51.5%
2	Management	894	42.0%
3	Economics	268	12.6%
4	Psychology applied	91	4.3%
5	Business finance	84	3.9%
6	Educational research	59	2.8%
7	Environmental studies	59	2.8%
8	Green sustainable science technology	57	2.7%
9	Environmental sciences	56	2.6%
10	Psychology multidisciplinary	54	2.5%

Source: Web of Science (2023).

conditions, financial conditions, demographic factors, and serial entrepreneurial intention.

## Conclusion

Articles in this Research Topic—the Research Topic on *Psychological determinants of entrepreneurial intentions and behaviors*—have expanded the prior knowledge base about several

## References

Ageev, A. I., Gratchev, M. V., and Hisrich, R. D. (1995). Entrepreneurship in the Soviet Union and post-socialist Russia. *Small Bus. Econ.* 7, 365–376. doi: 10.1007/BF01302737

Ahlin, B., Drnovsek, M., and Hisrich, R. D. (2014a). Entrepreneurs' creativity and firm innovation: The moderating role of entrepreneurial self-efficacy. *Small Bus. Econ.* 43, 101–117. doi: 10.1007/s11187-013-9531-7

psychological determinants of entrepreneurship and provided recommendations for research and practice.

## Author contributions

BA and JA contributed to the conception and design of the article, wrote the first draft of the manuscript, and wrote all sections. Both authors contributed to the manuscript's revision and read and approved the submitted version.

## Acknowledgments

We are very grateful to our friend, mentor, and academic colleague Professor Robert D. Hisrich, Ph.D. (1944–2023).

## Conflict of interest

The authors declare that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

## Publisher's note

All claims expressed in this article are solely those of the authors and do not necessarily represent those of their affiliated organizations, or those of the publisher, the editors and the reviewers. Any product that may be evaluated in this article, or claim that may be made by its manufacturer, is not guaranteed or endorsed by the publisher.

Ahlin, B., Drnovsek, M., and Hisrich, R. D. (2014b). Exploring the moderating effects of absorptive capacity on the relationship between social networks and innovation. *J. East Eur. Manage. Stud.* 19, 213–235. doi: 10.5771/0949-6181-2014-2-213

Antončić, B. (2020). "Entrepreneurship/intrapreneurship, personality correlates of", in *The Wiley encyclopedia of personality and individual differences*, eds. R. C. S., Carducci, A., Nave, D. Di Fabio, H., Saklofske, and C. Stough (Chichester: Wiley Blackwell) 143–147. doi: 10.1002/9781119547174.ch201

- Antončić, B., and Hisrich, R. D. (2001). Intrapreneurship: Construct refinement and cross-cultural validation. *J. Business Ventur.* 16, 495–527. doi: 10.1016/S0883-9026(99)00054-3
- Antončić, B., Prodan, I., Hisrich, R. D., and Scarlat, C. (2007). Technological innovativeness and firm performance in Slovenia and Romania. *Post-Commun. Econ.* 19, 281–298. doi: 10.1080/14631370701503299
- Auer Antončić, J., Antončić, B., Gantar, M., Hisrich, R. D., Marks, L. J., Bachkirov, A. A., et al. (2018). Risk-taking propensity and entrepreneurship: The role of power distance. *J. Enterpr. Cult.* 26, 1–26. doi: 10.1142/S0218495818500012
- Bowen, D. D., and Hisrich, R. D. (1986). The female entrepreneur: A career development perspective. *Acad. Manage. Rev.* 11, 393–407. doi: 10.2307/258468
- Box, T. M., Watts, L. R., and Hisrich, R. D. (1994). Manufacturing entrepreneurs: An empirical study of the correlates of employment growth in the Tulsa MSA and Rural East Texas. *J. Bus. Ventur.* 9, 261–270. doi: 10.1016/0883-9026(94)90033-7
- Bucar, B., Glas, M., and Hisrich, R. D. (2003). Ethics and entrepreneurs: An international comparative study. *J. Business Ventur.* 18, 261–281. doi: 10.1016/S0883-9026(01)00083-0
- Elango, B., Fried, V. H., Hisrich, R. D., and Polonchek, A. (1995). How venture capital firms differ. *J. Business Ventur.* 10, 157–179. doi: 10.1016/0883-9026(94)00019-Q
- Fried, V. H., Bruton, G. D., and Hisrich, R. D. (1998). Strategy and the board of directors in venture capital-backed firms. *J. Business Ventur.* 13, 493–503. doi: 10.1016/S0883-9026(97)00062-1
- Fried, V. H., and Hisrich, R. D. (1994). Toward a model of venture capital investment decision making. *Financ. Manag.* 28–37. doi: 10.2307/3665619
- Fried, V. H., and Hisrich, R. D. (1995). The venture capitalist: A relationship investor. *California Manag. Rev.* 37, 101–113. doi: 10.2307/41165791
- Hisrich, R., Langan-Fox, J., and Grant, S. (2007). Entrepreneurship research and practice: A call to action for psychology. *Am. Psychol.* 62, 575–589. doi: 10.1037/0003-066X.62.6.575
- Hisrich, R. D. (1983). Executive advertisers' views of comparison advertising. *Sloan Manag. Rev.* 25, 39.
- Hisrich, R. D. (1988). New business formation through the enterprise development center: A model for new venture creation. *IEEE Trans. Eng. Manag.* 35, 221–231. doi: 10.1109/17.7444
- Hisrich, R. D. (1990). Entrepreneurship/intrapreneurship. *Am. Psychol.* 45, 209–222. doi: 10.1037/0003-066X.45.2.209
- Hisrich, R. D., and Brush, C. G. (1985). *The Woman Entrepreneur: Characteristics and Prescriptions for Success*. Lexington, MA: Lexington Books.
- Hisrich, R. D., Dornoff, R. J., and Kernan, J. B. (1972). Perceived risk in store selection. *J. Market. Res.* 9, 435–439. doi: 10.1177/002224377200900414
- Hisrich, R. D., and Grachev, M. V. (1993). The Russian entrepreneur. *J. Business Ventur.* 8, 487–497. doi: 10.1016/0883-9026(93)90034-3
- Hisrich, R. D., and Jankowicz, A. D. (1990). Intuition in venture capital decisions: An exploratory study using a new technique. *J. Business Ventur.* 5, 49–62. doi: 10.1016/0883-9026(90)90026-P
- Hisrich, R. D., and Peters, M. P. (1974). Selecting the superior segmentation correlate. *J. Market.* 38, 60–63. doi: 10.1177/002224297403800310
- Hisrich, R. D., Peters, M. P., and Shepherd, D. A. (2005). *Entrepreneurship (6th ed.)*. New York: McGraw-Hill/Irwin.
- Hisrich, R. D., Peters, M. P., and Shepherd, D. A. (2020). *Entrepreneurship (11th ed.)*. New York: McGraw-Hill/Irwin.
- Kearney, C., Hisrich, R. D., and Antončić, B. (2013). The mediating role of corporate entrepreneurship for external environment effects on performance. *J. Bus. Econ. Manag.* 14, S328–S357. doi: 10.3846/16111699.2012.720592
- Lerner, M., Brush, C., and Hisrich, R. (1997). Israeli women entrepreneurs: An examination of factors affecting performance. *J. Bus. Ventur.* 12, 315–339. doi: 10.1016/S0883-9026(96)00061-4
- Nielsen, R. P., Peters, M. P., and Hisrich, R. D. (1985). Intrapreneurship strategy for internal markets—corporate, non-profit and government institution cases. *Strategic Manage. J.* 6, 181–189. doi: 10.1002/smj.4250060207
- Ramadani, V., Hisrich, R. D., Abazi-Alili, H., Dana, L. P., Panthi, L., and Abazi-Bexheti, L. (2019a). Product innovation and firm performance in transition economies: A multi-stage estimation approach. *Technol. Forecast. Soc. Change* 140, 271–280. doi: 10.1016/j.techfore.2018.12.010
- Ramadani, V., Hisrich, R. D., Dana, L. P., Palalic, R., and Panthi, L. (2019b). Beekeeping as a family artisan entrepreneurship business. *Int. J. Enterpr. Behav. Res.* 25, 717–730. doi: 10.1108/IJEBR-07-2017-0245
- Ruzzier, M., Antončić, B., and Hisrich, R. D. (2007a). The internationalization of SMEs: Developing and testing a multi-dimensional measure on Slovenian firms. *Enterpr. Reg. Develop.* 19, 161–183. doi: 10.1080/08985620601137646
- Ruzzier, M., Antončić, B., Hisrich, R. D., and Konecnik, M. (2007b). Human capital and SME internationalization: A structural equation modeling study. *Canad. J. Administr. Sci.* 24, 15–29. doi: 10.1002/cjas.3
- Slavec, A., Drnovsek, M., and Hisrich, R. D. (2017). Entrepreneurial openness: Concept development and measure validation. *Eur. Manag. J.* 35, 211–223. doi: 10.1016/j.emj.2016.09.003
- Web of Science (2023). *Citation Report: Hisrich, Robert D. (Author)*. London: Clarivate. Available online at: <https://www-webofscience-com.nukweb.nuk.uni-lj.si/wos/woscc/citation-report/25c4323c-e2e4-489c-847a-5586eedeb581-8781fc99> (accessed March 23, 2023).
- Wei, X., Cang, S., and Hisrich, R. D. (2015). Entrepreneurial stressors as predictors of entrepreneurial burnout. *Psychol. Rep.* 116, 74–88. doi: 10.2466/01.14.PRO.116k13w1