



# Management of sustainability and well-being for individuals and society

**Conference Proceedings** 

**Short Papers** 

Parma (Italy)

13-14 June 2024

Sinergie-SIMA Management Conference Proceedings Management of sustainability and well-being for individuals and society 13-14 June 2024 University of Parma - Italy

ISBN 978-88-94-7136-5-7

The Conference Proceedings are published online on https://www.sijmsima.it

© 2024 FONDAZIONE CUEIM Via Interrato dell'Acqua Morta, 26 37129 Verona - Italy



## Management of sustainability and well-being for individuals and society

13-14 June 2024

## **Conference Proceedings**

Short Papers

edited by

Arabella Mocciaro Li Destri, Marta Ugolini, Angeloantonio Russo and Savino Santovito

#### **Conference chairs**

ANGELOANTONIO RUSSO SAVINO SANTOVITO ARABELLA MOCCIARO LI DESTRI MARTA UGOLINI

#### Scientific committee

**BEATRICE LUCERI** (Coordinator) CLAUDIO BACCARANI DANIELA BAGLIERI ANGELO BONFANTI FRANCESCA CABIDDU SANDRO CASTALDO ELENA CEDROLA MARIA CHIARVESIO FRANCESCO CIAMPI DANIELE DALLI GAETANO M. GOLINELLI MONICA GROSSO CHARLES HOFACKER **GENNARO IASEVOLI** JACQUES MARTIN **UMBERTO MARTINI** CLELIA MAZZONI ANTIGONI PAPADIMITRIOU ALBERTO PASTORE **TONINO PENCARELLI** RICCARDO RESCINITI ELITA SCHILLACI **ALFONSO VARGAS-SÁNCHEZ** DONATA VIANELLI **ROBERTO VONA** 

### **Organizing committee**

FABRIZIO BALDASSARRE RAFFAELE CAMPO DOMENICO MORRONE FABIO MUSSO LARA PENCO PIERFELICE ROSATO ROSAMARTINA SCHENA

### **Editorial staff**

FABIO CASSIA NICOLA COBELLI LAURA CIARMELA ADA ROSSI ADELE FERRAGAMO

**Registration and invoicing** 

ANNALISA ANDRIOLO

LUM University University of Bari "Aldo Moro" University of Palermo - SIMA University of Verona - Sinergie Italian Journal of Management

University of Parma University of Verona University of Messina University of Verona University of Cagliari Bocconi University University of Macerata University of Udine University of Florence University of Pisa Sapienza University of Roma Emlyon Business School, France Florida State University, USA University of Roma LUMSA University of Toulon, France University of Trento University of Campania Luigi Vanvitelli Lehigh University, USA Sapienza University of Roma University of Urbino Carlo Bo University of Sannio University of Catania University of Huelva, Spain University of Trieste University of Naples Federico II

University of Bari "Aldo Moro" University of Bari "Aldo Moro" LUM University University of Urbino University of Genova University of Bari "Aldo Moro" LUM University

University of Verona University of Verona Sinergie Italian Journal of Management Sinergie Italian Journal of Management SIMA

Sinergie Italian Journal of Management

## The Conference Chairs and the Scientific Committee are grateful to the following reviewers who have actively contributed to the peer review process

GIANPAOLO ABATECOLA TINDARA ABBATE **GRAZIANO ABRATE** GAETANO AIELLO SIMONE AIOLFI ANTONELLA ANGELINI NORA ANNESI ELEONORA ANNUNZIATA GINEVRA ASSIA ANTONELLI ALESSIA ANZIVINO BARBARA Aquilani ELISA ARRIGO ANDREA BAFUNDI **GIOVANNA BAGNATO** GABRIELE BAIMA FABRIZIO BALDASSARRE BENEDETTA BALDI MARCO BALZANO MARIASOLE BANNO' AUGUSTO BARGONI DOMENICA BARILE ALESSANDRO BARONCELLI CLARA BASSANO NICOLA BELLINI SILVIA BELLINI VALERIA BELVEDERE LARA BENEVOLO MARCO BERARDI MARA BERGAMASCHI **CRISTINA BETTINELLI** FRANCESCO BIFULCO ANIELE BINCI SILVIA BIRAGHI SILVIA BLASI **ROBERTA BOCCONCELLI** MICHELLE BONERA ANGELO BONFANTI **GUIDO BORTOLUZZI** ANTONIO BOTTI ANTONIA BRANDONISIO FEDERICO BRUNETTI **CLEMENTINA BRUNO** FEDERICA BUFFA NICOLETTA BURATTI ANNA CABIGIOSU FEDERICA CABONI ANTONELLA CAMMAROTA **RAFFAELE CAMPO** ELENA CANDELO **ROSSELLA CANESTRINO** CHIARA CANNAVALE ARTURO CAPASSO

University of Roma Tor Vergata University of Messina University of Piemonte Orientale University of Firenze University of Parma University of Pisa Sant'Anna School of Advanced Studies, Pisa Sant'Anna School of Advanced Studies, Pisa Luiss Guido Carli - Roma University Cattolica del Sacro Cuore University of Tuscia University of Milano Bicocca University of Padova University of Torino University of Torino University of Bari University of Verona Ca' Foscari University of Venice University of Brescia University of Torino University LUM Giuseppe Degennaro University Cattolica del Sacro Cuore University of Salerno Sant'Anna School of Advanced Studies, Pisa University of Parma University Cattolica del Sacro Cuore University of Genova University of Chieti e Pescara University of Bergamo University of Bergamo University of Napoli Federico II University of Roma Tor Vergata University Cattolica del Sacro Cuore University of Padova University of Urbino Carlo Bo University of Brescia University of Verona University of Trieste University of Salerno University LUM Giuseppe Degennaro University of Verona University of Piemonte Orientale University of Trento University of Genova Ca' Foscari University of Venice University of Cagliari University of Sannio University of Bari University of Torino University of Napoli Parthenope University of Napoli Parthenope University of Sannio

FRANCESCO CAPPA **GIUSEPPE CAPPIELLO** ANDREA CAPUTO MARIA GRAZIA CARDINALI SILVIO CARDINALI ANGELA CARIDÀ FRANCESCO CARIGNANI DI NOVOLI CECILIA CASALEGNO FRANCESCO CASARIN ELENA CASPRINI FABIO CASSIA LAURA CASTALDI SANDRO CASTALDO PAOLA CASTELLANI ELENA CEDROLA **RICKY CELENTA** MARA CERQUETTI FABRIZIO CESARONI MARIA CHIARVESIO FRANCESCO CIAMPI MARIA VINCENZA CIASULLO MARIA CRISTINA CINICI NICOLA COBELLI CHIARA COLAMARTINO FRANCESCA COLLEVECCHIO MARIA COLURCIO **ILENIA CONFENTE** FRANCESCA CONTE EMANUELA CONTI **ELISA CONZ** DANIELA CORSARO FILIPPO CORSINI MARIA COSCIA SILVIA COSIMATO ALESSANDRA COZZOLINO KAROLINA CRESPI GOMES FRANCESCO CRISCI MATTEO CRISTOFARO CHIARA CRUDELE ANTONIO CRUPI NICOLA CUCARI VALENTINA CUCINO MARIAPIA CUTUGNO DAVID D'ACUNTO GIOVANNI BATTISTA DAGNINO **DANIELE DALLI** GIORGIA D'ALLURA EDOARDO D'ANDRASSI ALFREDO D'ANGELO EUGENIO D'ANGELO VIVIANA D'ANGELO MARIO D'ARCO **ERNESTO D'AVANZO** CHIARA DE BERNARDI FRANCESCA DE CANIO ALESSANDRA DE CHIARA DOMENICO DE FANO

Luiss Guido Carli - Roma University of Bologna University of Trento University of Parma University Politecnica delle Marche University Magna Graecia di Catanzaro University of Napoli Federico II University of Torino Ca' Foscari University of Venice University of Siena University of Verona University of Campania Luigi Vanvitelli Bocconi University University of Verona University of Macerata University of Salerno University of Macerata University of Messina University of Udine University of Firenze University of Salerno University of Messina University of Verona University LUM Giuseppe Degennaro University Politecnica delle Marche University Magna Graecia di Catanzaro University of Verona University of Salerno University of Urbino Carlo Bo University of Pavia IULM University Sant'Anna School of Advanced Studies, Pisa University of Napoli Parthenope University of Napoli Federico II Sapienza University of Roma University of Padova University of Udine University of Roma Tor Vergata University of Salerno Sant'Anna School of Advanced Studies, Pisa Sapienza University of Roma Sant'Anna School of Advanced Studies, Pisa University of Messina University of Verona University of Rome Lumsa - Palermo Campus University of Pisa University of Catania University of Pegaso University Cattolica del Sacro Cuore University of Pegaso University Cattolica del Sacro Cuore University of Sannio University of Trento IUSS - Scuola Universitaria Superiore Pavia University of Modena e Reggio Emilia University of Napoli L'Orientale University LUM Giuseppe Degennaro

PIETRO DE GIOVANNI VALENTINA DE MARCHI SARA DE MASI ALFREDO DE MASSIS SABINA DE ROSIS IVANO DE TURI GIACOMO DEL CHIAPPA **GIOVANNA DEL GAUDIO** PASQUALE DEL VECCHIO EMANUELA DELBUFALO BICE DELLA PIANA STEFANO DE NICOLAI **CINZIA DESSI** ANGELA DETTORI ELEONORA DI MARIA NADIA DI PAOLA FRANCESCA DI PIETRO DOMENICO DI PRISCO FRÉDÉRIC DIMANCHE MAURO DINI GIULIA DORE SAIDA EL ASSAL **ENG TECK-YONG** MONICA FAIT MARIA FEDELE **ROSANGELA FEOLA ROSARIA FERLITO** MICHELA FLORIS **BARBARA FRANCIONI** STEFANO FRANCO DOMENICO FRASCATI MARTHA MARY FRIEL AMBRA GALEAZZO SILVANA GALLINARO MARCO GALVAGNO **ROSSELLA GAMBETTI** MARIA EMILIA GARBELLI VITTORIO MARIA GARIBBO ANTONELLA GAROFANO BARBARA GAUDENZI FRANCESCO GHEZZI SONIA CATERINA GIACCONE CHIARA GIACHINO ELENA GIARETTA BENEDETTA GRANDI ALBERTO GRANDO SIMONE GUERCINI NATALIA MARZIA GUSMEROTTI RADA GUTULEAC BIRGIT HAGEN LEA IAIA GABRIELE IANIRO FABIO IANNONE MARCO IEVA **ANNA RITA IRIMIAS** FILOMENA IZZO DIALA KABBARA

Luiss Guido Carli - Roma University of Padova University of Firenze Dalmine - Ex Enel Sant'Anna School of Advanced Studies, Pisa University LUM Giuseppe Degennaro University of Sassari University of Napoli Federico II University of Salento University Europea Di Roma University of Salerno University of Pavia University of Cagliari University of Cagliari University of Padova University of Napoli Federico II University of Milano Bicocca Luiss Guido Carli - Roma Toronto Metropolitan University University of Urbino Carlo Bo University of Trento University of Bari Henley Business School University University of Salento University of Cassino and Southern Lazio, Italy University of Salerno University of Catania University of Cagliari University of Urbino Carlo Bo Luiss Guido Carli - Roma University LUM Giuseppe Degennaro IULM University University of Padova University of Torino University of Catania University Cattolica del Sacro Cuore University of Milano Bicocca Sant'Anna School of Advanced Studies, Pisa University of Campania Luigi Vanvitelli University of Verona Sant'Anna School of Advanced Studies, Pisa University of Catania University of Torino University of Verona University of Parma Bocconi University University of Firenze Sant'Anna School of Advanced Studies, Pisa University of Torino University of Pavia University of Chieti e Pescara University of Molise Sant'Anna School of Advanced Studies, Pisa University of Parma Corvinus University of Budapest, Ungheria University of Campania Luigi Vanvitelli University of Pavia

NORIFUMI KAWAI ELVIRA TIZIANA LA ROCCA MAURIZIO LA ROCCA HU LALA SABRINA LATUSI FRANCESCO LAVIOLA **CRISTINA LEONE** LUNA LEONI GABRIELLA LEVANTI DAVIDE LIBERATO LO CONTE LETIZIA LO PRESTI PIERPAOLO MAGLIOCCA GIOVANNA MAGNANI MATS MAGNUSSON **RICCARDO MAIOLINI** ANTONIO MAJOCCHI FILIPPO MARCHESANI GIANLUCA MARCHI NANCY ELONA MARKU MICHELA MARI MARCELLO MARIANI ALBA MARINO VITTORIA MARINO VERONICA MAROZZO ELISA MARTINELLI UMBERTO MARTINI ALICE MARTINY MICHELA CESARINA MASON MARTINA MATTIOLI CHIARA MAURI LEONARDO MAZZONI MARCO FRANCESCO MAZZÙ DOMENICO MECCA **OLIMPIA MEGLIO** MONIA MELIA ANNA MENOZZI ANTONIO MESSENI PETRUZZELLI LAURA MICHELINI MARGHERITA MIETTO MATILDE MILANESI MARGHERITA MILOTTA ANNA MINÀ MICHELE MODINA LUDOVICA MOI MARIA GABRIELA MONTANARI DOMENICO MORRONE **ALESSIA MUNNIA** GRAZIA MURTARELLI FABIO MUSSO GIULIA NEVI MELITA NICOTRA SANDRA NOTARO MIRKO OLIVIERI BEATRICE ORLANDO MARIO OSSORIO LINDA OSTI ALESSANDRO PAGANO

University of Bergamo University of Messina University of Calabria University Cattolica del Sacro Cuore University of Parma Sapienza University of Roma University of Palermo University of Roma Tor Vergata University of Palermo Sapienza University of Roma University Telematica Unitelma Sapienza University of Foggia University of Pavia KTH Royal Institute of Technology in Stockholm John Cabot University University of Pavia University of Chieti e Pescara University of Modena e Reggio Emilia University of Cagliari University of Roma Tor Vergata University of Bologna University of Messina University of Sannio University of Messina University of Modena e Reggio Emilia University of Trento Sant'Anna School of Advanced Studies, Pisa University of Udine University of Chieti e Pescara University LIUC University of Padova Luiss Guido Carli - Roma Sant'Anna School of Advanced Studies, Pisa University of Sannio University Magna Graecia di Catanzaro University of Piemonte Orientale Politecnico di Bari University LUMSA of Roma University LIUC University of Firenze University of Pavia University of Rome Lumsa - Palermo Campus University of Molise University of Cagliari University of Vienna University LUM Jean Monnet University of Catania IULM University University of Urbino Carlo Bo Sapienza University of Roma University of Catania University of Trento **IULM Universitv** University of Ferrara University of Campania Luigi Vanvitelli University of Bolzano University of Urbino Carlo Bo

MARCO UGO PAIOLA CHIARA PALAGONIA MARIA PALAZZO ADELE PARMENTOLA CECILIA PASQUINELLI MARIACARMELA PASSARELLI PIERLUIGI PASSARO **GIUSEPPE PEDELIENTO** TONINO PENCARELLI LARA PENCO **REBECCA PERA** MIRKO PERANO FRANCESCO ANTONIO PEROTTI ANDREA PICCALUGA PASOUALE MASSIMO PICONE MARCO PIRONTI **GIUSEPPE PIRRONE ROBERTA PISANI** VINCENZO PISANO **ALESSIA PISONI GABRIELE PIZZI** SARA POGGESI SIMONE POLEDRINI LORENZO PRATAVIERA ANGELO PRESENZA LUDOVICA PRINCIPATO **GIORGIA PROFUMO** TOMMASO PUCCI FRANCESCA PUCCIARELLI SEBASTIAN PUSCEDDU ANDREA QUINTILIANI SILVIA RANFAGNI ANGELA RELLA SABRINA RESTANTE SABINA RIBOLDAZZI MARIO RISSO ANGELO RIVIEZZO FRANCESCO RIZZI CRISTIAN RIZZO **RUBINA ROMANELLO** MARCO ROMANO **STEFANIA ROMENTI** STEFANO ROMITO **EMANUela RONDI** PIERFELICE ROSATO CHIARA ROSSATO MARCO VALERIO ROSSI ANDREA RUNFOLA FRANCESCO RUSSO **IVAN RUSSO** TIZIANA RUSSO SPENA FEDERICA SACCO EL ASSAL SAIDA KAROLINA SALLAKU **GIADA SALVIETTI** ANDREA SANGERMANO FRANCESCA SANGUINETI

University of Padova LUMSA University University of Salerno University of Napoli Parthenope University of Napoli Parthenope University of Calabria University of Bari University of Bergano University of Urbino Carlo Bo University of Genova University of Torino Reald University College University of Torino Sant'Anna School of Advanced Studies, Pisa University of Palermo University of Torino University of Pavia Bocconi University University of Catania University of Insubria University of Bologna Sede Di Rimini University of Roma Tor Vergata University of Perugia LUMSA University University of Molise University of Roma Tre University of Genova University of Siena University of Turin Sapienza University of Roma University Telematica Pegaso University of Firenze University LUM Giuseppe Degennaro Sapienza University of Roma University of Milano Bicocca Unicusano University of Sannio University of Perugia University of Torino University of Udine University of Catania Iulm University University of Milano University of Bolzano University of Salento University of Verona University of RomaTre University of Perugia University of Catania University of Verona University of Napoli Federico II University of Pavia LUM University LUM University University of Parma University of Bergamo University of Pavia

ERICA SANTINI SAVINO SANTOVITO MARIALUISA SAVIANO **ROSA MARTINA SCHENA** FRANCESCO SCHIAVONE **ROBERTO SCHIESARI** CARMELA ELITA SCHILLACI MAURO SCIARELLI PAOLA SCORRANO PETER ŠEDÍK SILVIA RITA SEDITA FRANCESCA SERRAVALLE FABIOLA SFODERA PAOLA SIGNORI **RAFFAELE SILVESTRI** FRANCESCA SIMEONI MARIO SORRENTINO SONIA MARIACARMELA STRANO LENKA SVAJDOVA ANNUNZIATA TARULLI FRANCESCO TESTA MARCO TREGUA ORONZO TRIO **REBECCA TRIVELLI** ANNA MARIA TUAN ANNALISA TUNISINI GIANLUCA VAGNANI NICOLA VARRONE ŠÁRKA VELČOVSKÁ DONATA TANIA VERGURA MASSIMILIANO VESCI MILENA VIASSONE VANIA VIGOLO FRANCESCO VITELLARO FILIPPO VITOLLA AGOSTINO VOLLERO ROBERTO VONA SIMONE VONA CLODIA VURRO ALESSANDRA ZAMPARINI LORENZO ZANNI CRISTINA ZERBINI CRISTINA ZILIANI ANTONELLA ZUCCHELLA

University of Trento University of Bari University of Salerno University of LUM University of Napoli Parthenope University of Torino University of Catania University of Napoli Federico II University of Salento Slovak University of Agriculture in Nitra University of Padova University of Torino Sapienza University of Roma University of Verona University of Bari University of Verona University of Campania Luigi Vanvitelli University of Messina VŠB-Technical University of Ostrava University of LUM Sant'Anna School of Advanced Studies, Pisa University of Napoli Federico II University of Salento University of Chieti e Pescara University of Bologna University Cattolica del Sacro Cuore Sapienza University of Roma University Magna Graecia di Catanzaro VŠB-Technical University of Ostrava University of Parma University of Salerno University of Torino University of Verona University of Genova University of LUM University of Salerno University of Napoli Federico II University of Chieti e Pescara University of Milano University della Svizzera Italiana University of Siena University of Parma University of Parma University of Pavia

To the reader,

this volume contains the long papers of the Sinergie-SIMA 2024 Management Conference, hosted by the University of Parma on June 13<sup>th</sup> and 14<sup>th</sup> 2024.

Theory and practice in the field of management have been challenged by the emergence of sustainability and well-being as major global policy priorities. Both sustainability and well-being are complex, value-laden, and strongly interconnected; however, they tend to exist in separate realms.

Sustainability literature has recorded an evolution in the way the concept of sustainable development is understood, leading to the articulation of sustainable development as human "wellbeing" and "flourishing", rather than "needs". Nevertheless, some scholars have pointed out a lack of clarity in the conceptualization, which causes some ambiguity in terms of definition (Ronen & Kerret, 2020). Kjell (2011) observed that human needs and well-being are poorly understood, characterized, and developed by sustainability research. Along the same vein, Helne & Hirvilammi (2015) observed that the overarching goal of sustainable development (i.e., well-being) has often been narrowly interpreted, mainly in economic terms, while connections between the natural environment and human flourishing have been overlooked. More recently, O'Mahony (2022) remarked that the literature conceptualizing human well-being continues to exist largely outside sustainable development. Hence, placing well-being more clearly within the sustainability framework could be highly beneficial to sustainability.

Concurrently, the literature on well-being is almost entirely dissociated from the contributions of nature or the relationships with ecological and planetary systems (Roberts et al., 2015), and the importance of social dimensions is an emergent conclusion. Therefore, the rationale of contextual systems inherent to sustainability research (incorporating views of times, society, and biosphere) could significantly enrich well-being research, fostering a more holistic perspective on well-being and an increased awareness of the limits of individual well-being pursuits (Kjell, 2011).

In brief, though well-being has major implications for sustainable development and vice versa, the body of literature that effectively integrates sustainability and well-being remains in an embryonic stage.

The above considerations aim to act as catalysts for an interdisciplinary debate within the field of management. Enriching the conception of flourishing well-being in sustainability and the contribution of nature to well-being can produce impactful scientific research, as O'Mahony (2022) points out. Equally important is the analysis of the links between sustainability and well-being, encompassing synergies and trade-offs at the organizational level, in value chains, and in interactions with stakeholders across various industries.

The Sinergie-SIMA 2024 Management Conference welcomed contributions based on different theories, methodological approaches, and units of analysis with the potential to empower a transformation for flourishing individuals, society, and the natural world alike. More precisely, the Conference was a great occasion to discuss the research efforts of our research community within tracks related to the:

- Conference theme (Management of sustainability and well-being for individuals and society),
- SIMA thematic groups (Entrepreneurship, Innovation & Technology Management, Intelligenza manageriale nel management, International Business, Marketing, Purpose-driven Businesses, Retailing & Service Management, Small & Family Business, Strategic Communication, Strategy & Governance, Supply Chain Management, Logistics & Operations, Sustainability, and Tourism & Culture Management),
- special tracks (Examining the social and environmental relevance of sustainable digital business models: Impact on business practices and consumers, Growing resilient Italian SMEs, and Perspectives on grand challenges in international business and implications for companies),
- Management Case Studies.

The Conference call for papers gave the opportunity to submit either short and long papers. Overall, the editorial staff received 277 submissions of which 215 short papers and 62 long papers.

For the *short and long papers*, the evaluation followed the peer review process, with a double-blind review performed by, respectively, one or two referees - university lecturers and experts about the topic - selected among SIMA and the community of Sinergie members.

In detail, the referees applied the following criteria to evaluate the submissions:

- clarity of the research aims,
- accuracy of the methodological approach,
- contribution in terms of originality/innovativeness,
- theoretical and practical contribution,
- clarity of communication,
- significance of the bibliographical basis.

The *peer review* process resulted in full acceptance or rejection of the submissions. In the case of disagreement among reviewers' evaluations, the decision was taken by the Chairs of the SIMA thematic groups or conference track. Each work was then sent back to the Authors together with the referees' reports. The suggestions received by the referees were used by the Authors during the presentation of their research works at the Conference.

The evaluation process ended with the acceptance of 211 short papers and 58 long papers. This volume proposes the papers whose Authors have authorized their publication.

All the long papers published in this volume were presented and discussed during the Conference and published online on the web portal of Sinergie-SIMA Management Conference (https://www.sijmsima.it/).

While thanking all the Authors, Chairs, and participants, we hope that this volume will contribute to advance knowledge about the management of sustainability and well-being for individuals and society.

The Conference Chairs

Guido Cristini, Beatrice Luceri, Arabella Mocciaro Li Destri, and Marta Ugolini

## **SUMMARY**

## Track 1 - Entrepreneurship

<i>Empowering Student Innovators: Framing Entrepreneurship Education in Europe</i> CHIARA BARTOLI, FEDERICA BRUNETTA, CHRISTIAN LECHNER	PAG.	3
Entrepreneurial Education as a transition driver from informal to formal entrepreneurship		
<i>in complexity context: the AWE program</i> . Fabio Greco, Francesco Carignani, Francesco Bifulco	دد	11
Fostering Entrepreneurial Thinking: Analysing the Drivers and Impact of Entrepreneurship Education DARIO PEIRONE, JUDY YUEH LING SONG	l 	17
Students' entrepreneurial intentions among personal and contextual factors: a pilot study exploring the role of emotions.		
ROSSELLA BARATTA, PIERMATTEO ARDOLINO, DIEGO BELLINI, SERENA CUBICO, FRANCESCA SIMEONI	"	23
Social Entrepreneurship and Sustainability. How can challenge-based learning impact students' entrepreneurial skills and challenge providers' problems? ALESSANDRA SCROCCARO	"	31
		51
<i>Humane entrepreneurship and the circular economy: an empirical investigation</i> . MASSIMILIANO VESCI, ROBERTA DE ANGELIS	"	33
Is Passion a Driver of Sustainable Entrepreneurship? An Autobiographic		
Analysis of Fashion Entrepreneurs Cecilia Pasquinelli, Serena Rovai, Matilde Milanesi, Simone Guercini	دد	39
Social Innovation: a literature review mapping intellectual structure of the field. LORENA GONZALEZ, ELENA CASPRINI	دد	45
Inter-organizational knowledge transfer in Open Innovation Ecosystems: the case of Eni's territorial initiative GIORGIO DI FIORE	"	51
<i>Empowering Digital Entrepreneurship: Regulatory Governance in Platform Ecosystems</i> Muhanad Hasan Agha, Vladimir Korovkin, Svetlana Mironyuk	دد	57
<i>The Governance of Entrepreneurial Ecosystems: Ecosystem Manager or Ecosystem Act?</i> GABRIELE IANIRO, MICHELE MODINA	دد	59
<i>A comprehensive exploration of the knowns and unknowns of Private Equity Secondary Markets</i> MICHELE LERTORA, CRISTINA DE SILVA, MARGHERITA MIETTO, ANNA GERVASONI	"	63
Unveiling The Pitfalls Of Entrepreneurial Team Diversity: Insight From A Post-Mortem		
Analysis of Failed Start-Ups Adele Parmentola, Michele Costagliola Di Fiore	دد	69
<i>Agility to Handle Dynamics of Business Transformation</i> Giuseppe Pirrone, Margherita Milotta, Birgit Hagen, Martin Cloutier	۰.	75
<i>Venture-Builders' Program Design and the creation of Scaleups</i> PAOLA BELINGHERI, CHRISTIAN LECHNER	"	83
<i>Entrepreneurial Ecosystems: exploring the Italian Tech Scaleups scenario</i> SERENA VALENTE, ALESSIA PISONI	"	89
Innovazione e imprenditorialità femminile nelle PMI: un'analisi fuzzy dei driver della performance Ludovica Antenozio, Daniela Di Berardino	دد	97

## Track 2 - Innovation & Technology Management

<i>Beyond Words: Leveraging Language for Strategic Decision-Making in Innovation</i> . Maria Rucsandra Stan, Francesca Di Pietro, Francesca Capo	PAG.	105
<i>Combining innovation and business networks for resource mobilization in the meat sector: a case study</i> ALESSANDRO PAGANO, ELISA CARLONI	,	111
<i>The role of purpose in digital companies: a study on Exponential Organizations</i> Francesco Derchi, Nicoletta Buratti, Francesco Vitellaro		115
<b>Data Value Chain and Data Ecosystem through digital and traditional tools</b> Loris Santarelli, Federica Ceci, Marianna Sgammotta		123
<i>Web 3.0: il punto di vista dei manager sulle opportunità e le sfide del Metaverso e degli NFT</i> Chiara Bartoli, Francesco Fasano, Francesco Cappa, Paolo Boccardelli		129
<i>Fostering high-impact innovation: empirical evidence in Europe</i> Valeria Schifilliti, Elvira Tiziana La Rocca, Maurizio La Rocca	"	135
<i>Innovation in 14.0 and firms performance in Italy</i> Francesco Capone, Niccolò Innocenti, Leonardo Mazzoni, Luciana Lazzeretti	"	141
<i>The "5Vs" of Big Data and the Propensity to Generate Patents with Big Data Technologies in SMEs</i> Enrico Marcazzan, Saverio Barabuffi, Giulio Ferrigno, Andrea Piccaluga	"	147
<i>How WEIRD is Social Innovation?</i> Jordana Rech Graciano Dos Santos, Ian Mccarthy	"	153
Open Innovation search strategies and Innovation performance: differential moderating effects of Big Data Characteristics	.د	1.61
GIULIO FERRIGNO, SAVERIO BARABUFFI, ENRICO MARCAZZAN, ANDREA PICCALUGA		161
<i>The role of digital platforms in the university exchange of knowledge: the case of Knowledge Share</i> Mariapia Cutugno, Tindara Abbate, Fabrizio Cesaroni		167
<i>The measure of digital maturity</i> Dario Russo, Piero Demetrio Falorsi, Federico Cardone	"	171
Track 3 - International Business		
<i>Exploring the impact of cybersecurity on digital export: evidence from food industry</i> GIOVANNA TERRIZZI, ALBA MARINO, MARIA CRISTINA CINICI, DANIELA BAGLIERI		181
Industry 4.0, Sustainability, and Internationalization: A Systematic Literature Review Martina Tomasetig	۰۰	189
<i>The advantage of stateness abroad: an analysis of the social networks of state-owned enterprises</i> GABRIELE GALLI, ROBERTO URBANI		197
<i>La strategia 'grab and go': intuizioni teoriche preliminari e possibili implicazioni</i> Martina Castronovo, Anna Mina', Paquale Massimo Picone	دد	205
<i>L'imprenditorialità femminile migrante nei business familiari</i> Giulio Palmas, Michela Floris		211
<i>When algorithms help cross-cultural management educators: a proposed supportive tool</i> Bice Della Piana, Francesco Di Vincenzo, Chiara Signore, Mario Trerotola	"	217
<i>Decoding the future: entrepreneurial visions on AI's role in international strategic decisions</i> BARBARA FRANCIONI, ALICE AIUDI, YULIIA KYRDODA, SIMONA AMERIO	"	225

## Track 4 - Management Case Studies

A Public Service Logic perspective applied to health and social welfare services provided to the elderly:		
<i>the case of the VIII Municipality of Rome</i> Magda Touti, Fabiola Sfodera, Luca Dezi	PAG.	233
Interpreting long-lasting corporate crises according to stakeholders' perspective:		
evidence from the ILVA experience Silvia Cosimato	"	239
<i>Knowledge sharing and learning through face-to-face and digital tools</i> Loris Santarelli, Francesca Masciarelli	"	245
<i>How do stakeholders perceive the impacts of Nature-based solutions? An Italian case study for coastal restoration and climate change adaptation</i> Giorgia Condomitti, Maria Rosa De Giacomo, Sara Tessitore, Marco Frey	"	251
		231
Una ipotesi di formalizzazione markoviana della dinamica delle unità operative nei cambiamenti organizzativi di ENEL S.p.A. Mario Brunetti, Gianluca Vagnani	"	259
		239
Empowering women workforce in steel production: A case study on implementing Diversity, Equity and Inclusion (DEI) initiatives		
Laura Tolettini, Eleonora Di Maria, Emilia Filippi, Letizia Lo Preiato, Mariaasole Bannò	"	265
<i>La trasformazione organizzativa di Autostrade per l'Italia: verso la strategic agility nell'era delle policri</i> Paolo Boccardelli, Roberto Tomasi, Chiara Bartoli, Maria Lorenza Gerardi	isi 	273
Track 5 - Management of sustainability and well-being for individuals and society		
Happiness and emotions at work in organizational relationships. The role of affectivity and empathy for meta-organizational and nonhierarchical solutions in the resilient firm LUCIANO PILOTTI	"	283
The shortage of skilled personnel in the transition from Industry 4.0 to Industry 5.0: Impacts and challenges in the machine tool industry		200
ELEONORA BIGLIA, MONICA CUGNO, REBECCA CASTAGNOLI		289
<i>Additive manufacturing: tecnologie umane e sostenibili per il benessere degli individui e della società</i> Giuseppe Bongiorno, Mariacarmela Passarelli, Michela Sanguedolce, Luigino Filice, Alfio Cariola	"	297
		297
<i>Well-being in the transition from Industry 4.0 to Industry 5.0</i> Michela Piccarozzi, Federica Caboni, Roberto Bruni	"	303
<i>Employee well-being in the era of hybrid work: In search of sustainability for organizational members</i> Alfonsa Butera, Alessandra Mazzei, Silvia Ravazzani	"	311
Navigating Transformative Service Research for individual and social well-being: A comprehensive review		
MARIA DELLA LUCIA, ERICA SANTINI, MUHAMMAD JUNAID SHAHID HASNI	"	317
Le App di food sharing tra benefici individuali e ambientali: ascolto delle conversazioni online degli utenti su Too Good To Go.		
Silvia Bellini, Cristina Zerbini, Donata Tania Vergura, Beatrice Ceccoli	"	325
<i>Well-being as a key for sustainable and long-term oriented management</i> Dario Natale Palmucci, Gabriele Santoro	"	331
The role of the enterprise in the pursuit of the well-being for citizens and society. The contribution of the Italian Schools of Enterprise Economics and Management SILVIA BRUZZI	"	225
SILVIA DKUZZI		335

<i>The strength of Nutriscore in improving sustainable eating habits and well-being: bad and good news</i> Ornella Bonafede, Carmela D'Agostino, Andrea Bazzani, Giuseppe Turchetti, Leopoldo Trieste	PAG.	341
<i>Does organic food consumption impact subjective well-being? A mediation-moderation approach</i> Celso Augusto De Matos, Marlon Dalmoro, Marcia Dutra De Barcellos	دد	347
An improved framework for social sustainability: a bottom-up approach to boost social innovation and sustain employability		
Giusy Sica, Alessandra Micozzi, Maria Antonella Ferri, Maria Palazzo	"	353
<i>Knowledge, self-perception and eco-sustainable behaviours. Inspiring actions in green learning</i> Adriana Apuzzo, Rita Klapper, Marialuisa Saviano, Mario Testa	**	361
Understanding the link among cultural participation, resilience, and well-being.		
<i>A systematic literature review.</i> Giorgia Masili, Daniele Binci	"	369
		507
Shaping tomorrow's sustainable enterprises: profiling the hard and soft skills of sustainable managers GIULIA NEVI, GIULIA GOGIALI, GIANPAOLO BASILE, LUCA DEZI, CARMELA GUITTO	۰۵	375
Track 6 - Marketing		
<i>Virtual influencers in tourism marketing: insight or oversight? The case of "Open to Meraviglia"</i> RADA GUTULEAC, GABRIELE BAIMA, CRISTIAN RIZZO	"	383
Mitigating the Negative Effects of Human-like Virtual Medical Agents on Patients' Emotions.		
Results From A Preliminarily Experimental Study Andrea Sestino, Alfredo D'Angelo, Russell W. Belk	.د	389
Scaling Consumer Neuroscience Technologies for Individual and Societal Well-Being. A Bibliometric		
<i>Analysis of Precursors</i> . Andrea Bazzani, Giorgio Manfroni, Ugo Faraguna, Giuseppe Turchetti	"	393
Unveiling the Dynamics of GPT Technology Adoption: Assessing Trust in Technology and Self-Efficacy's Influence on Consumer Behavior FRANCESCA CELIO, FRANCESCO RICOTTA	.د	403
Investigating Consumer Perceptions of Brand Personality and Reactions in the Automotive Industry by ChatGPT		
ALESSANDRO SIGNORINI, ALESSANDRO FERI, ANGELO BACCELLONI, ELISA PUVIA	"	409
Understanding the potentialities of metaverse for marketers. Insights from Italy Michele Simoni, Annarita Sorrentino, Luca Venturini, Myriam Caratu	"	419
"The influence of individual values on purchase intention of fair-trade products:		
<i>An analysis on Italian consumers"</i> Nohaila Kartti, Giuseppe Franzese, Chiara Cannavale	"	425
The story that only circular products can tell: Empowering consumers through background information		
Shripathy Swaminathan, Vinicio Di Iorio, Francesco Testa	"	431
<b>Reshaping customers' lifelong journey in the health and wellness contexts</b> Laura Grazzini, Sabina De Rosis, Raffaele Frustaci, Valentina Sbrolli, Gaetano Aiello	"	445
A Well Mind, A Wise Choice: A Systematic Review of Wellness and its Influence on Food Decision-Making		
SIMONA DEL CORE, ALESSIO DI LEO, FABIOLA SFODERA, NICCOLÒ PICCIONI	"	451
<i>Taste-Makers Narratives: Analyzing the Effect of Food Influencers on Home Cooks</i> Francesco Smaldone, Giada Mainolfi	۰۵	457

<i>Building a Better Future: The University Activism for Societal Wellbeing</i> Antonella Cammarota, Francesca Avallone, Vittoria Marino, Riccardo Resciniti	PAG.	463
<i>L'integrazione del Metaverso negli eventi: impatto sugli SDG's e prospettive future</i> Francesca Igini, Arturo Cafaro, Mario Calabrese	"	469
<i>The impact of sustainability and country-of-origin on consumers' willingness-to-pay for a brand:</i> <i>A conceptual framework</i> CHIARA SCRIMIERI, ADAMANTIOS DIAMANTOPOULOS, MICHELA MATARAZZO, ALBERTO PASTORE	"	477
<i>Conceptualizing perceptions of institutionally derived maneuverable space for value (co)creation.</i> JIMMIE RÖNDELL, PETER EKMAN	"	483
Narrating the past. Exploring the antecedents of the use of heritage marketing tools by centenarian Italian companies	"	489
ANGELO RIVIEZZO, GIUSY MIGNONE, ANTONIO LUCADAMO, MARIA ROSARIA NAPOLITANO <i>Examining Healthy Food Consumption Among People Over 60 years</i> VINCENZO GISSI, ELISABETTA SAVELLI	"	489
<b>The new dimension of brand in 'metaverse': a structured literature review</b> Karolina Sallaku, Domenico Morrone, Annunziata Tarulli		493 503
<b>Delving into sustainability and Made in Italy fashion brands: Perspectives from Generation Z</b> FEDERICA CECCOTTI, SARA BOCCALINI, MICHELA PATRIZI, MARIA VERNUCCIO, ALBERTO PASTORE	"	509
<i>Drinking with eyes: how colors elicit consumers' taste expectations of coffee</i> Daniele Porcheddu, Raffaele Campo, Pierfelice Rosato, Fabrizio Piu	"	517
Aging and social influence: An empirical investigation of the effect of age on consumers' susceptibility to word of mouth Alessandro M. Peluso, Antea Gambicorti, Giovanni Pino, Mihaela Giannelli	"	523
<i>The rise of Phygital Reality: insights from Structural Topic Modelling</i> Daniele Virgillito, Francesco Russo, Alessia Munnia, Marco Romano	"	529
<i>Exploring the Metaverse from the consumer perspective: insight from a systematic literature review.</i> Marco Ferretti, Maria Antonella Ferri, Giuseppe La Ragione, Maria Palazzo, Francesco Parola, Marcello Risitano		535
<b>Fifty Shades of Black Friday</b> Francesca Negri, Alessandro Iuffmann Ghezzi	"	541
Track 7 - Purpose-driven Businesses		
<i>Entrepreneurial Ecosystem and Proximity: a framework for Social Ecosystem Development</i> Ricky Celenta, Valentina Cucino, Rosangela Feola, Chiara Crudele	"	549
<i>Purpose-driven Clusters in the Era of Sustainability</i> Michele Simoni, Maria Cristina Pietronudo, Eva Panetti	**	555
<i>The Power of Interactions. Exploring Stakeholder Adoption of pro-social practices from purpose-driven companies</i> Martina Tafuro, Andrea Piccaluga		561
<b>B-Corp: un esame delle aziende alimentari Italiane attraverso la Teoria dei Segnali</b> Nora Annesi, Valentina Cucino	"	567
Individuals' Goal Alignment in Humane Entrepreneurial Oriented Organisations: A Preliminary Study CHIARA MARINELLI, GRAZIA GARLATTI COSTA, SALVATORE DORE		573

<i>Open Social Innovation per affrontare le sfide globali: il caso Isinnova</i> VALENTINA CUCINO, ROSANGELA FEOLA, GIULIO FERRIGNO	PAG.	581
Track 8 - Retailing & Service Management		
The effect of entrepreneurial and customer orientations on shopper loyalty: an explorative study		
<i>on small independent retailers</i> Alice Mantovani, Lara Penco, Sandro Castaldo	دد	589
Ensuring customer satisfaction and loyalty of online health and well-being: a comparison study across types of services		
GIADA SALVIETTI, SILVIA RANFAGNI, DANIO BERTI	دد	597
Digital Transformation in the Italian Restaurant Industry: Navigating the Challenges and Opportunities of Food Delivery Services ALBERTO SUSCO, DAVIDE CANAVESIO, MONICA CUGNO	es	605
<i>Exploring Metaverse Adoption in High-Involvement Purchases: Insights from field research</i> BEATRICE LUCERI, SIMONE AIOLFI, GIOVANNI ROMANO	دد	611
<i>Word of mouth vs. word of machine: a preliminary analysis</i> GRAZIANO ABRATE, VALERIA FARALLA	دد	619
<b>Promoting (un)conscious purchasing behaviors and choices in favor of sustainability</b> SILVIA BELLINI, CHIARA BACCHILEGA, DAVIDE PELLEGRINI, SIMONE AIOLFI	دد	623
<i>The Family Caregiver Experience in Palliative Care Pathways: Development and Validation</i> <i>of a Multidimensional Approach</i> MARZIA CETTINA SEVERINO, COSTANZA GALLI, SABINA DE ROSIS	دد	629
Balancing Act: The Impact of Product-Oriented Sustainability Information on Consumer Responses VALENTINA MAZZOLI, LAURA GRAZZINI, AULONA ULQINAKU	۰.	635
Catalysing Sustainability: Retailers as Driving Platforms in the Food Industry's Transition ALBERTO MASSACCI, ELENA CASPRINI, LORENZO ZANNI	دد	641
<i>The right kiosk across different generations! A quantitative study in the retailing food sector</i> LUCA CORINALDESI, GENNARO IASEVOLI, CHIARA OTTOLENGHI	دد	649
<b>Retail Internationalization and Innovation: systematic literature review</b> MICHELE BADOLATO	دد	655
Track 9 - Small & Family Business		
<b>Dynamics of Change:</b> A Comparative Analysis of Commitment in Family vs. Non-Family Businesses ROBERTA PINNA, MICHELA FLORIS, FABIO CORONA, GIANFRANCO CICOTTO, CINZIA DESSI	دد	673
Exploring the dynamics of external knowledge acquisition in family businesses: factors, constraints, and success indicators		
GERARDO BOSCO, ALESSIA SCIARRONE, RAFFAELE D'AMORE, DAVIDE LIBERATO LO CONTE, MARIO CALABRESE	دد	679
<i>Tradition in Transition: Exploring Organizational Dynamics and Strategies in Small Hotels</i> Marco Corsino, Davide Bagnaresi, Francesco Maria Barbini	دد	685
Whispers of Ambition: Unpacking Emotions in Entrepreneurial Orientation of Women-Led Family Businesses MICHELA FLORIS, ANGELA DETTORI, RICHA GOEL, TILOTTAMA SINGH	"	691

<i>The impact of board gender diversity on family firms' value: the mediating role of environmental innovation</i> Francesco Gangi, Maria Coscia, Lucia Michela Daniele, Nicola Varrone	PAG.	699
<i>The digital transformation process of SMEs to compete in the current business environment: evidence from an Italian case</i> GINEVRA TESTA, ANDREA CIACCI, LARA PENCO	دد	707
Track 10 - Strategic Communication		
<i>Millennials and Bookfluencers: a cross cultural analysis</i> Linda Gabbianelli	"	715
<i>The impact of communicating food safety on communication goals: an exploratory study in</i> <i>Agri-food firms from the entrepreneurial perspective</i> Emanuela Conti, Daniele Giampaoli, Francesca Cesaroni, Tonino Pencarelli	"	721
<i>Leveraging Italianness abroad: A corpus-assisted discourse approach to restaurant branding</i> Walter Spezzano, Stefano De Cantis, John D. Buschman	"	727
Testing controversial advertising effects on brand associations: first insights from an affective priming pilot experiment	"	722
FRANCESCA SAMMARTINO, FRANCESCA CONTE, SIANO ALFONSO Strategic Agility in Error Management: Bridging Theory and Practice in Strategic Communication MARCO BALZANO	"	733 741
Track 11 - Strategy & Governance		,
<i>Do executive actions reflect their personality traits?: A review of organizational misconduct</i> PIERLUIGI GIARDINO, ANDREA CAPUTO	.د	749
<i>Governing Micro-Municipalities: A Literature Review</i> Matteo Cristofaro, Nicola Cucari, Antonella Monda, Davide Liberato Lo Conte, Anastassia Zannoni, Leul Girma, Pinalba Schilleci, Francesco Laviola, Simona Mare	"	757
<i>Uno strumento di Governance ESG integrata per una strategia aziendale sostenibile</i> Ilenia Ceglia, Massimo Battaglia, Nora Annesi, Francesco Mercuri	"	765
<i>Does female corporate leadership improve environmental performance? A systematic literature review</i> Maria Rosa De Giacomo, Marco Frey		771
<i>The Geography of Innovation: The Phenomenon of Urban Clustering in the Fashion Industry</i> ALESSIO TRAVASI, FABIO MUSSO		777
<i>Strategic analysis of IRCCSs' sustainability management</i> Paola Olimpia Achard, Chiara Bellini, Leonardo Ioannucci	"	783
<i>The role of HR analytics to Enable Strategic HR management in SMEs</i> Christian Di Prima, Alberto Ferraris	"	791
<i>Trick or Treat: Firm's strategic response to temporary shock in the real estate business</i> ALBERTO MASSACCI	"	795
Track 12 - Supply Chain Management, Logistics & Operations		
Who Should Pay for the Returns Product? The Effect of Transparency on Consumers' Decision-making across the Reverse Supply Chain. BENEDETTA BALDI, NADJA VORONTSOVA, IVAN RUSSO, THOMAS J. GOLDSBY	<b>g</b> 	805
		000

<i>Modern slavery in mining supply chains: the role of social enterprises and the institutional context</i> Francesco Ghezzi, Fabio Iannone, Francesco Rizzi, Eleonora Annunziata, Marco Frey	PAG.	811
<i>Triadic literature in sustainable supply chain management: paving the way</i> CHIARA SGUIZZARDI, IVAN RUSSO, ILENIA CONFENTE	دد	817
<i>Logistics services providers in humanitarian logistics. A bibliometric and systematic literature review</i> . FRANCESCA CELIO, ALESSANDRA COZZOLINO	دد	823
<i>Eco-packaging innovations in paper and cardboard. Preliminary insights from cognitive mapping on international projects</i> ALESSANDRA COZZOLINO, PIETRO DE GIOVANNI	٠٠	831
<i>Strategic reshoring: redefining competitiveness in global markets</i> Simone Luongo, Valentina Della Corte, Enrico Di Taranto	"	837
Unpacking the "truce" in Sales and Operations Planning routine. An ethnographic study DAVIDE BONFIO, ANDREA FURLAN	"	843
Which governance strategy is best for specialized investments? Insights from the weaker partner's perspective EMANUELA DELBUFALO	"	849
EMANUELA DELBUFALO <b>Decarbonizing Last-Mile Delivery: a study on crowdsourced delivery incentives</b> SILVIA BLASI, SARA TONIOLO	دد	849
		855
Managing critical raw materials in energy transitioning supply chains: a Resource Dependence theoretical perspective on supply chain management capabilities VITTORIO MARIA GARIBBO, FRANCESCO GHEZZI, ELEONORA ANNUNZIATA, FRANCESCO RIZZI, MARCO FREY	"	861
Track 13 - Sustainability		
<i>The rebound effect of responsible consumption: an explorative research on sharing economy consumers</i> VERONICA CAPONE, CECILIA GRIECO	<b>S</b> 	869
<i>Greenwashing Temptation: A Critical Examination of the Legal Approach against Greenwashing</i> Lucia Gatti, Federica Buffa, Umberto Martini	دد	875
<i>Harnessing collective bargaining for fostering sustainability and competitiveness: fact or fiction?</i> CHIARA DE BERNARDI, NICCOLÒ MARIA TODARO, MARIA ROSA DE GIACOMO, MARCO FREY	"	881
Understanding Corporate Social Responsibility Scepticism: Implications and Insights from		
<i>the Literature</i> Rongtitya Rith, Riccardo Spinelli	"	887
<i>Il ruolo degli intermediari nella Simbiosi Industriale: il caso Regusto</i> Chiara Palagonia, Gaelle Cotterlaz-Rannard, Caroline Mattelin-Pierrard, Laura Michelini	"	893
<i>L'industria del calcio tra sostenibilità finanziaria e nuove dimensioni tecnologiche</i> Annabella Conturso, Roberto De Renzi, Pietro Taragoni, Mario Ramaglia	"	899
Rivelare il potenziale nascosto della natura: il ruolo del management nelle public policy		
<i>per la biodiversità</i> Jacopo Cricchio, Valentina Cucino, Andrea Piccaluga, Alberto Di Minin		907
<i>A explorative analysis on the impact of ESG and ESG 's controversies on corporate performance</i> Salvatore Esposito De Falco, Antonio Renzi, Estelina Dalipi, Gianluca Vagnani, Francesca Ramaglia	"	913
<i>Aligning with the Sustainability Promise in ESG investing: A case study on employees' ESG readiness</i> Helena Liewendahl, Kristina Heinonen, Teresia Stigzelius, Catharina Ehrnrooth	٠٠	921

Food Waste and Out-of-Home Consumption Patterns: Unravelling the Actual Consumption Behavior of Food Taken Away and Consumed at Home LUDOVICA PRINCIPATO, CAMILLA COMIS, LUCA SECONDI, MENGTING YU, CLARA CICATIELLO	PAG.	929
The role of Paradox mindset on the intention to implement Industrial Symbiosis: linking Paradox Theory and Theory of Planned Behavior		
ALICE ALOSI, CARINA KELLER, ELEONORA ANNUNZIATA, FRANCESCO RIZZI, KARIN KREUTZER, MARCO FREY	"	935
<i>Managing the business and biodiversity relationship: a Systematic Review</i> Sara Tessitore, Francesco Testa, Niccolò Maria Todaro, Duccio Tosi, Vinicio Di Iorio	**	941
<i>The role of biodiversity for business and social innovation</i> Mauro Capestro, Stefano Denicolai	.د	949
How do Dynamic capabilities, Ecosystems and Green innovations contribute to the creation of a Net Zero Path? Insights from Italian wine sector.		
RITA MURA, FRANCESCA VICENTINI, LUCIANO FRATOCCHI, LUDOVICO MARIA BOTTI, Maria Vincenza Chiriacò	"	957
Linking innovation and sustainability through equity-based crowdfunding campaigns. A focus on cultural and creative industries CRISTINA CATERINA AMITRANO, CIRO TROISE	دد	963
Product vs sales platform sustainability: who wins the online challenge?		
<i>An exploratory analysis of Italian consumers</i> Annunziata Tarulli, Domenico Morrone, Daniele Rutigliano, Karolina Sallaku, Raffaele Silvestri	"	969
Driving corporate social responsibility: examining the impact of diversity and inclusion across multiple levels CHIARA LEGGERINI, MARIASOLE BANNÒ	**	975
From Dominance to Responsibility. The integration of Corporate Social Responsibility in Chaebol's Corporate Governance CINZIA DESSI	"	981
Sustainability Alignment in Cross-Border Collaborations: Dynamics, Challenges and Limits Davide Liberato Lo Conte, Saqib Shamim, Giuseppe Sancetta	"	987
Sustainable and innovative practices in foodstuffs domain: the impact on consumer's perceptions and dispositions		
VERONICA MAROZZO, ALESSANDRA COSTA, TINDARA ABBATE, AUGUSTO D'AMICO	**	995
<i>Evolution of Sustainable Reporting: Impacts and Prospects of CSRD Regulation</i> DAVIDE LIBERATO LO CONTE, RAFFAELE D'AMORE, GERARDO BOSCO, ALESSIA SCIARRONE, MARIO CALABRESE	دد	1003
Greening the culinary scene: environmental management initiatives in restaurant sustainability SIMONE LUONGO, VALENTINA DELLA CORTE, FABIANA SEPE, GIOVANNA DEL GAUDIO		1011
<b>Perceived authenticity of green influencers: An experiment on components and determinants</b> STEFANO ROMITO, GAIA GIAMBASTIANI, CLODIA VURRO	"	1017
<i>roblematizing on the three main pillars of sustainability from a paradox theory perspective</i> ALICE ALOSI, VINICIO DI IORIO	**	1023
Track 14 - Tourism & Culture Management		

The evolution of sustainability discourses in online reviews: an investigation of the impact of triplebottom line dimensions on tourists' eWOM and destination satisfaction."DAVID D'ACUNTO, SERENA LONARDI, ILENIA CONFENTE"1031

<i>Generazione Z e percezione delle sostenibilità nella scelta del servizio alberghiero</i> Daniele Grechi, Roberta Minazzi	PAG.	1037
<b>Data-driven Strategic Process in the Hospitality Industry: Studying Hotel consumers'</b> <i>purchase intention through web analytics.</i> GIUSEPPINA LO MASCOLO, GABRIELLA LEVANTI, MARCELLO CHIODI, ARABELLA MOCCIARO LI DESTRI	۰۵	1045
<i>Unveiling Museums' Online Reputation. The Case of the Uffizi Galleries</i> Paola Beccherle, Luciana Lazzeretti, Stefania Oliva	۲۵	1053
<i>Cruise ship size and public perception: An explorative study on X</i> GINEVRA TESTA, GIORGIA PROFUMO	۲۵	1059
<i>The motivations behind religious and spiritual tourism: an empirical investigation on Assisi visitors</i> FRANCESCA RIVETTI, SIMONE SPLENDIANI, MAURO DINI	دد	1067
Industrial tourism in Italy: a spatial analysis of regional patterns of specialization Angelo Riviezzo, Antonella Garofano, Giusy Mignone	دد	1073
Crossing Green Tracks: The Role of Monumental Railways in Promoting Eco-Sustainable Business in Slow Tourism Michele Berutti, Cinzia Dessi, Giuseppe Melis, Daniela Pettinao	دد	1079
Contributing to Cultural Welfare: A Critical Review of Methods for Measuring the Impact of Culture on Sustainability and Well-being Mara Cerquetti, Giulia Lapucci	۰۵	1087
<i>Tourism in Smart City policy: an opportunity for Urban Sustainability</i> Stefania Escobar, Giovanni Esposito, Nathalie Crutzen, Michael Nippa, Linda Osti	دد	1093
<i>Transnational collaborations for a more sustainable tourism: the role of digital transition</i> Alessia Zoppelletto, Serena Lonardi, Umberto Martini	دد	1099
<i>Measuring Destination Carrying Capacity from Residents' Perspectives: A Pilot Study in Garda Trentino</i> OKSANA TOKARCHUK, CAROLA STEFENELLI, UMBERTO MARTINI	۰۵	1105
<i>A sensitizing literature review for future research about overtourism in Milan</i> Andrea Chiarini, Alberto Grando	۰۵	1113
La formazione degli ecosistemi digitali tra strategie deliberate e processi spontanei Sonia Caterina Giaccone, Arisa Shollo	دد	1119
<i>Metaverse in social innovation: developing trends to support marginal areas sustainable growing.</i> GIANPAOLO BASILE, MARIA PALAZZO, MARIA ANTONELLA FERRI, MARIO TANI	۰۵	1125
Harnessing Digital Technologies for Knowledge Management in Luxury Hospitality: the cases of Grand Hotel et de Milan and STRAFhotel&bar. Mariapina Trunfio, Luna Leoni, Cecilia Pasquinelli, Angelo Presenza	دد	1131
Cultural Heritage Management in Museums: The Open Culture Dilemma Maria Della Lucia, Giulia Dore, Rana Muhammad Umar	۰۵	1137
Destination ambassador, authenticity and informal communication. Exploratory research on mountain professionals	n	
UMBERTO MARTINI, FEDERICA BUFFA	دد	1143

Track 15 - Examining the social and environmental relevance of sustainable digital business models Impact on business practices and consumers - Special Track	:	
<i>Good Governance for Smart Villages: A Bibliometric Review</i> Leul Girma Haylemariam, Nicola Cucari, Matteo Cristofaro, Francesco Laviola, Davide Liberato Lo Conte, Antonella Monda, Anastassia Zannoni, Pinalba, Schilleci, Simona Mare	PAG.	1151
<i>The Paradox of Sustainability in Crowdfunding: Lessons from the Food Industry</i> Luigi Nasta, Barbara Sveva Magnanelli, Luca Pirolo		1161
Paradoxical Tensions and Paradoxical Mindset as Predictors of Managers' Behavioral Responses to AI-driven Healthcare Tools: A Preliminarily Study Andrea Sestino, Luís Irgang, Henrik Barth, Magnus Holmen	دد	1167
Development and Sustainability of Online Pharmacy Sales ORAZIO VELLA, SIMONE GUERCINI	.د	1171
Track 16 - Growing resilient Italian SMEs - Special Track		
<i>The resilience of family firms: exploring the role of collaborative response with supply chain partners</i> CLAUDIA PONGELLI, EMANUELA DELBUFALO, ALFREDO DE MASSIS	۰۵	1179
<i>Verso una Misura di Resilienza per le Piccole e Medie Imprese</i> Pietro Taragoni, Salvatore Esposito De Falco, Antonio Renzi, Gianluca Vagnani	دد	1185
La diversità di genere nella forza lavoro come antecedente della resilienza d'impresa: evidenze preliminari da un caso studio Cristina Leone, Pasquale Massimo Picone, Arabella Mocciaro Li Destri		1193
Track 17 - Perspectives on grand challenges in international business and implications for companie Special Track	es	
<i>"Made by": the evolution of the Country-of-Origin Effect to businesses and firms</i> Rosario Faraci, Rosaria Ferlito, Sonia Caterina Giaccone	۰۵	1201
Track 18 - Intelligenza artificiale nel management		
From Data to Action: AI-Enhanced Prediction of Business Crises Integrating Financial and Social Media Insights		
DAVIDE LIBERATO LO CONTE, FRANCESCO RICOTTA, GABRIELE RINNA	"	1209
When does technological innovation overlap social innovation? Conceptualizing an organizational aidriven model SARA DIODATI, LAWRENCE CABRERA, RICCARDO RIALTI, LAMBERTO ZOLLO	دد	1215
<b>Exploring the impact of Artificial Intelligence on Vocational Education and Training (VET)</b> SILVIA COSIMATO, NADIA DI PAOLA, ROBERTO VONA, NUNZIA CAPOBIANCO	۰۵	1221
<i>AI-Powered Marketing Communication: Exploring Strategies in the Luxury Furniture Industry</i> NICCOLÒ PICCIONI, FABIOLA SFODERA, ALBERTO MATTIACCI	دد	1229
<i>Artificial Intelligence in SCM: insights from two illustrative cases</i> Serena Galvani, Roberta Bocconcelli	۰۵	1235
<i>Strategic Foresight and Artificial Intelligence: Evidence of a Paradoxical Relationship</i> Matteo Cristofaro, Mie Augier, Luna Leoni, Pinalba Schilleci		1241
A Systematic Literature Review on AI-empowered Strategic Decision-Making process Alessia Munnia, Marco Romano, Rebecca Casey, James A. Cunningham	۰۵	1247

FRANCESCO MERCURI, DILETTA PILOCA, SABRINA RESTANTE, LUCA QUAGLIERI, PAG.   BERNARDINO QUATTROCIOCCHI PAG.   Managing services in tourism destinations through Artificial Intelligence and Machine learning: The Data for Destination Model   Silvia BAIOCCO, DANILO CROCE, PAOLA MARIA ANNA PANICCIA, ROBERTO BASILI, PAG.	1255
Managing services in tourism destinations through Artificial Intelligence and Machine learning: The Data for Destination Model	1255
The Data for Destination Model	
NI VIA DAIUUUU DANILUUKUUE PAULA MAKIA ANNA PANILUIA. KUBEKTU DANILI	
ANDRIY SHCHERBAKOV, ALESSANDRA ARCESE "	1263
The Future of Digital Technologies: AI-Driven Interfaces for Universal Usability	
GIUSEPPE LANFRANCHI, ANTONIO CRUPI "	1273
Track – General management	
Blockchain Waste Management: A Systematic Literature Review for the Public Administration	
GLORIA DIANA MARINSANTI RWAKIHEMBO, FRANCESCA FAGGIONI, MARCO VALERIO ROSSI "	1281
GLOREN DI MANIMARIANI ANA AND ANA ANA ANA ANA ANA ANA ANA ANA	
Blockchain Waste Management: are Italian managers ready? GLORIA DIANA MARINSANTI RWAKIHEMBO, FRANCESCA FAGGIONI, MARCO VALERIO ROSSI "	1287
Blockchain Waste Management: are Italian managers ready?	1287

## Modern slavery in mining supply chains: the role of social enterprises and the institutional context

## FRANCESCO GHEZZI<sup>1</sup> FABIO IANNONE<sup>2</sup> FRANCESCO RIZZI<sup>3</sup> ELEONORA ANNUNZIATA<sup>4</sup> MARCO FREY<sup>5</sup>

#### Abstract

Our research focuses on evaluating the impact of institutional pressures and agency effects on modern slavery in mining supply chains in Africa. We studied the policies, challenges, practices, and supply chain's actors involved in understanding how interventions can mitigate modern slavery and promote sustainable development. In particular, we explored the role of social enterprises in modern slavery, such as those empowering women in the mining sector to address gender inequality and promote economic empowerment. By adopting a case study approach and through a combination of literature review, desk research, and interviews, we aim to provide insights that can contribute to institutional and agency theories' development and support effective strategies to combat modern slavery in mining supply chains, to achieve the Sustainable Development Goals in Africa.

Keywords: modern slavery, supply chain, institutional theory, agency theory, esg, mining, Africa

**Framing of the research.** Africa continues to face numerous Environmental, Social and Governance (ESG) challenges, such as poverty, hunger, lack of access to good health care, lack of development, gender inequality, lack of clean water, and environmental issues (Juju et al., 2020). These challenges not only hinder the overall progress and development of the continent but also affect the quality of life of its inhabitants (Zaman et al, 2023). This objective can be achieved under the United Nations Agenda 2030 Sustainable Development Goals (SDGs), which aim to address social challenges without forgetting the environmental ones (Omisore, 2018).

Modern slavery, particularly in the supply chain, represents one of the challenges faced by Africa. The International Labour Organization (ILO) defines modern slavery as a broad category that encompasses various forms of forced labour, including indentured labour, debt bondage, forced labour, servitude, and human trafficking. The exploitation of labour, especially in industries like mining, agriculture, and manufacturing, perpetuates poverty, inequality, lack of development (Gold et al., 2015), and environmental degradation (Sparks et al., 2021). The supply chain's unethical practices violate human rights and undermine efforts to achieve the SDGs. Hence, it is crucial for businesses and organisations to address modern slavery in their operations to contribute to sustainable development and social justice in Africa (Moussa et al., 2022).

The characteristic of modern slavery that distinguishes it from the ancient concept of slavery is its foundation on the exercise of specific powers over human beings rather than on direct property, which is currently illegal almost everywhere (Crane, 2013). As such, there are various antecedents that create the conditions for power to be exerted over workers, especially in global supply chains (Hilend et al., 2023). Among socioeconomic factors, poverty and lack of social mobility play a critical role, creating a fertile environment for any kind of labour exploitation (Crane, 2013; Hilend et al., 2023). Moreover, when the population does not have the economic and educational resources to invest in their way of life, it raises the risk of the so-called "poverty trap", where extreme poverty levels persist because of this lack of awareness (Penh, 2009). Among the regulatory factors, political instability and weak governance favour firms' likelihood of adopting modern slavery behaviours (Crane, 2013; Hilend et al., 2023).

Supply chain management (SCM) literature has demonstrated the positive relationship between the adoption of ESG practices and the supply chain performance, at least in the long term (Zhu & Sarkis, 2004; Zhu and Sarkis, 2006; Lee et al., 2012; Le et al., 2022; Truant et al., 2024). However, the work of New (2015) highlighted that modern slavery differs

- <sup>1</sup> Sant'Anna School of Advanced Studies, Pisa e-mail: francesco.ghezzi@santannapisa.it
- <sup>2</sup> Sant'Anna School of Advanced Studies, Pisa e-mail: fabio.iannone@santannapisa.it
- <sup>3</sup> University of Perugia e-mail: francesco.rizzi@unipg.it
- <sup>4</sup> Sant'Anna School of Advanced Studies, Pisa e-mail: eleonora.annunziata@santannapisa.it
- <sup>5</sup> Sant'Anna School of Advanced Studies, Pisa e-mail: marco.frey@santannapisa.it

Electronic Conference Proceedings ISBN 978-88-94-7136-5-7 DOI 10.7433/SRECP.SP.2024.01 Sinergie-SIMA 2024 Management Conference Management of sustainability and well-being for individuals and society June 13<sup>th</sup> and 14<sup>th</sup>, 2024 - University of Parma (Italy) from other ESG issues and necessitates specific attention, as the standard anti-modern slavery ESG initiatives can be seen as part of the enabling mechanism that allows this issue to persist: indeed, although policy statements and sustainability disclosure of firms might appear to be fighting against the problem, "the brutal exercise of commercial power, hard negotiation on prices and trading terms generates the conditions in which forced labour emerges" (p.703). However, research on modern slavery within business and management discipline remains highly underdeveloped. Under the framework of SCM, there is inadequate attention to the effects of core SCM practices in giving rise to modern slavery (Caruana et al., 2021). Flynn and Walker (2020, p. 296) acknowledge the suitability of using the institutional theory view to study modern slavery as the institutional context "is imposed on firms from the outside by legislation, non-government organisation (NGO) campaigning, professional standards, stakeholder initiatives, media coverage, and consumer activism." In the same vein, Moussa et al. (2022) provide evidence supporting institutional theory's role in the study of modern slavery. Their research revealed that nations with robust institutions, increased democratic practices, better regulatory standards, greater press freedom, and improved corruption control demonstrate higher accountability and responsiveness to modern slavery threats. Moreover, the occurrence of modern slavery practices in supply chains may be limited or inhibited by the monitoring, governing, and enforcing of regulations related to illegal natural resource extraction (Hilend et al., 2023). However, the most influential contribution to modern slavery in the management literature was provided by Crane (2013), who conceptualised modern slavery as an institutional deflection. As a matter of fact, he offers a comprehensive and perceptive model demonstrating how the ongoing presence of modern slavery poses a theoretical challenge for institutional theory. He elucidates how illegitimate practices can endure over time within the gaps of prevailing regulative, normative, and cultural-cognitive systems. Essentially, his model seeks to elucidate the viability of modern slavery despite its contradiction to the primary institutional dynamics in contemporary societies.

In this context, two theoretical frameworks offer insights into introducing ESG criteria in supply chains to contrast modern slavery. On the one hand, institutional theory's view suggests that such practices should diminish over time due to the impact of prevailing regulative, normative, and mimetic pressures fostering isomorphism (Scott, 2001). Institutional theory in SCM has been widely studied as it may explain how external drivers promote sustainable SCM practices (Sarkis et al., 2011). Normative pressures from consumers have driven the adoption of sustainable SCM practices for downstream firms (Ball & Craig, 2010), inducing buyers to exert normative pressure over upper-tier suppliers to enforce the sustainability of the overall chain. Nonetheless, the continued presence of isolated instances of slavery indicates that within specific contexts, structural inertia resists broader societal changes and environmental shifts (Hannan & Freeman, 1984), revealing that the institutional pressures that delegitimise slavery are somehow diverted by both external and internal contingencies (Crane, 2013). In this regard, agency theory offers indeed valuable insights into supply chain management (Fayezi et al., 2012), shedding light on the relationships between upper and lower-tier supplying firms, as well as between the focal buyer and upper and lower-tier supplying firms (A $\beta$ lander et al., 2016; Wilhelm et al., 2016). By acknowledging the inherent information asymmetry and potential for opportunistic behaviour within these complex networks, agency theory helps design governance mechanisms that incentivise efficient and trustworthy behaviour from agents towards the principal. This ultimately contributes to smoother information flow, reduced transaction costs, and improved overall supply chain performance (Panda and Leepsa, 2017). Indeed, as modern slavery instances typically occur in the upstream, geographically isolated and most labour-intensive stages of the supply chains (Crane, 2013). principal-agent relations are crucial to fight modern slavery since the principal's social responsibility might lead to the resolution of conflicts of interests and the introduction of contractual incentives and information transparency, which have a proven positive influence on the effective adoption of ESG practices of upper-tier suppliers (Wilhelm et al., 2016).

**Purpose of the paper.** Our research focuses on evaluating the impact of institutional pressures and agency effects on modern slavery in the mining sector in Africa. By adopting a multiple case study approach, we studied the policies, practices, and actors involved in the sector to understand how interventions can mitigate modern slavery and promote sustainable development. Particularly, we explore the role of a social enterprise (Doherty et al., 2014), which empowers women in the mining sector to address gender inequality and promote economic empowerment. We conceptualize this organization as a hybrid organization (Pache & Santos, 2012), as "by spanning the boundaries of the private, public and non-profit sectors, they bridge institutional fields [...] and face conflicting institutional logics" (Doherty et al. 2014, p.418). As a matter of fact, this organization occupies a particular position into the mining supply chain, being a connector between mining communities/workers and mining companies. This supply chain positioning leads the organization to span different institutional domains and face potentially conflicting pressures. Thus, we investigate if this actor is legitimated by both sides and if it acts as a principal or an agent in the promotion of ESG practices in the mining supply chain, with a particular reference to anti-modern slavery practices. Finally, we try to uncover, from an institutional point of view, if the presence of a hybrid organization in the mining supply chain facilitates the elimination of modern slavery practices, limiting the institutional deflection phenomenon envisioned by Crane (2013). Through a combination of literature review, desk research, and interviews, we seek to provide insights that can contribute to institutional and agency theory and that can support effective strategies to combat modern slavery and achieve the SDGs in Africa.

**Methodology.** The research employs a case study approach (Yin, 2014), mainly based on several interviews conducted with representatives of the focal social enterprise, working and living in different African countries. The interviews' evidence was complemented by collecting secondary information and integrating it with other interviews from other sources, i.e. mining industry experts who have directly worked in the sampled African countries.

We first conducted two desk research activities, one related to exploring the normative frameworks of the sampled African countries and the other related to the review of ESG challenges in the mining sector. The first desk research was mainly on grey literature, composed of governmental reports and laws, consulting firms' reports, outlooks, sustainability

reports and mining company websites. This search informs the study of the institutional context of the different case studies considered as part of our sample. The second desk research was structured as a literature review of contributions from scientific peer-reviewed journals. We included papers dealing with ESG issues and the mining context published until 31<sup>st</sup> dec 2023. We used keywords such as environmental, social and governance or corporate social responsibility and mining or extractive and challenge or issue. The outcomes of the review led us to map the relevant sustainability challenges under the mining context's three ESG pillars (Environmental, Social and Governance). The ESG dimensions inform the design of the protocol for the interviews conducted with the organization representatives and with the other experts.

After two desk research, we formulated an interview protocol for in-depth semi-structured interviews based on previous results. We then selected 15 experts in the African mining sector to validate the regulatory framework contexts and the ESG challenges detected. We selected the informants based on a shared database of partners and stakeholders of AfricaMaVal, a Horizon Europe project on Sustainable Mining. We then added a snow-balling technique to identify further informants, based on the first sample. The validation step allowed us to identify which were the crucial challenges on the ground, and the country specific ones. Moreover, we identified with a more precise degree causes and effects of the challenges. We went much further in respect to the indirect observation through desk research and this was essential to structure the interview protocol for the following phase.

Considering our focus, the fourth and last phase consisted in interviewing the social enterprise's components in the different sampled countries. The social enterprise selected has been currently pseudonymized because, due to their job, they have been several times subjected to threats and verbal attacks. The interviews protocol was based on the results of the previous three phases, with the specific goal to understand how they perceive and react to different institutional pressures and their role in pursuing the ESG challenges faced by the mining communities/workers, with a particular focus on modern slavery. The interviews are still ongoing, and they are supposed to end in May 2024. In addition, by interviewing the social enterprise's members, we also limited the social desirability bias (Bergen and Labonté, 2020). In fact, some practices of modern slavery can be at the border of illegality and, in any case, damage the company's reputation. Therefore, interview mining companies may face this risk. At the same time and for the same reasons, including possible threats, we decided to exclude miners because of their possible problems in administrating such practices and, also, considering the possible consequences on their jobs.

Table 1 presents the different steps of data collection.

DC phase	Phase 1	Phase 2	Phase 3	Phase 4
Method	Grey literature desk research	Literature review	Interviews with mining experts	Interviews
Objective	Explore the normative frameworks of the African countries under study	Map relevant ESG challenges in the mining sector	Validate the regulatory framework contexts and the ESG challenges detected	Explore the role of a social enterprise in contrasting modern slavery practices in mining supply chains
Data collected	Governmental reports and laws, consulting firms' reports, outlooks, sustainability reports and mining company websites	78 scientific papers	15 interviews	On-going

#### Table 1: data collection phases

**Results.** As this research represents an on-going project, complete results still cannot be provided. Nevertheless, we expose some preliminary results. Phase 1 has targeted Democratic Republic of Congo, Gabon, Madagascar, Morocco, Mozambique, Namibia, Senegal, South Africa, Tanzania, and Zimbabwe. At the end of this phase, we obtained a clear pictures of mining policies in those countries. We primarily identified the social, economic, technological and environmental context of each country. Then, we review mining and mineral policies, taking care about gender issues, land-use and mineral rights, taxation and royalties, environmental and water issues, societal and community aspects, including artisanal and small-scale mining, tangible and intangible cultural heritage, and health and safety in mines. Phase 2 led to detect 270 ESG challenges, of which 85 were attributed to the environmental pillar, 117 to the social pillar and 68 to the governance one. The environmental pillar covers 8 dimensions (Air, Biodiversity, Energy, Land, Materials, Noise, Waste, Water). The social pillar has 3 dimensions (Indigenous People, Local Community, Workforce). The governance pillar has instead 5 dimensions (Business Ethics, Corporate Structure, Policies, Stakeholders, Supply Chain). All of the dimensions cover various sub-dimensions which are omitted here.

Combined results of phases 2 and 3 show that there is a great focus on challenges which happen at the local level, on all the three pillars. Environmental, social and governance issues detected jointly indicate that without poverty alleviation sustainability cannot be reached in the mining context: poverty is the cause of poor working conditions (i.e, both social and environmental) which, at the same time, foster a perpetuation of poverty, installing a vicious cycle. Our results show that poverty affects both social, environmental and governance dimensions. As a matter of fact, from the environmental point of view, poor working conditions lead to the use of cheap processing substances, i.e. mercury and cyanide, which are highly polluting for water and soil. From the social perspective, poverty sustains the existence of scarce employment

conditions among the mining workers: this ranges from artisanal miners which daily works without tools and protections, being exposed anytime to toxic substances, to the phenomenon of school dropout with kids following their parents in the working activities, perpetrating the same conditions generations over generations. Finally, regarding the governance pillar, poverty affects public policies implementation. The most serious and widespread issue is corruption which happens at all stages of the mining supply chain and normally regulates institutional relationships. Corruption leads to a difficult enforcement of policies, even where advanced legislative frameworks are present, as in the case of mostly all African countries. Our interviewed experts detected corruption is mainly led by poverty, as government officers see it as a normal and due compensation to compensate very poor salaries. Public policies implementation is also related to lack of public resources, again caused by poverty.

These results sustain our inquiry of modern slavery driven by poverty in the mining sector, its link with institutional factors, and the analysis of the role that the social enterprise under study may play in promoting anti-modern slavery practices. Further results will be available once the fourth phase, the round of interviews with the social enterprise, will be carried out and the impact of institutional pressures and agency effects on modern slavery in the mining sector in Africa will be clear.

**Research limitations.** Our research presents some limitations. First, our desk research has highlighted the poor available scientific outputs on the mining sector in the African context. This led us to the need of interviewing experts, which although carefully selected, expressed their opinions based on their personal experience, which could be biased in several ways. Moreover, in the fourth phase, the presence of safety threats impeded us to reach mining workers.

**Managerial implications.** Our paper presents interesting managerial implications both for interested scholars and practitioners. Addressing modern slavery in the supply chain is crucial for businesses and organizations to uphold human rights, promote social justice, and contribute to sustainable development on the continent.

**Originality of the paper.** The study of modern slavery inside the management literature lacks empirical contribution, thus we believe that our paper is an important step towards the development of modern slavery stances in the supply chain management literature. Moreover, to the best of our results, previous scholars have not yet delved in modern slavery with a combined institutional and agency theories' perspective, using the context of the mining sector in Africa.

#### References

- ABLÄNDER M.S., ROLOFF J., NAYIR D.Z. (2016), "Suppliers as stewards?", Managing social standards in first-and second-tier suppliers", *Journal of Business Ethics*, vol. 139, pp. 661-683.
- BALL A., CRAIG R. (2010), "Using neo-institutionalism to advance social and environmental accounting", *Critical Perspectives on Accounting*, vol. 21, n. 4, pp. 283-293.
- BERGEN N., LABONTÉ R. (2020), "Everything is perfect, and we have no problems": detecting and limiting social desirability bias in qualitative research", *Qualitative health research*, vol. 30, n. 5, pp. 783-792.
- CARUANA R., CRANE A., GOLD S., LEBARON G. (2021), "Modern slavery in business: The sad and sorry state of a non-field", Business & Society, vol. 60, n. 2, pp. 251-287.
- CRANE A. (2013), "Modern slavery as a management practice: Exploring the conditions and capabilities for human exploitation", *Academy of Management Review*, vol. 38, n. 1, pp. 49-69.
- DOHERTY B., HAUGH H., LYON F. (2014), "Social enterprises as hybrid organizations: A review and research agenda", International journal of management reviews, vol. 16, n. 4, pp. 417-436.
- FAYEZI S., O'LOUGHLIN A., ZUTSHI A. (2012), "Agency theory and supply chain management: a structured literature review", Supply chain management: an international journal, vol. 17, n. 5, pp. 556-570.
- FLYNN A., WALKER H. (2020), "Corporate responses to modern slavery risks: An institutional theory perspective", *European Business Review*, vol. 33, n. 2, pp. 295–315.
- GOLD S., TRAUTRIMS A., TRODD Z. (2015), "Modern slavery challenges to supply chain management", Supply Chain Management, vol. 20, n. 5, pp. 485-494.
- HANNAN M.T., FREEMAN J. (1984), "Structural inertia and organizational change", American sociological review, pp. 149-164.
- HILEND R., BELL J.E., GRIFFIS S.E., MACDONALD J.R. (2023), "Illicit activity and scarce natural resources in the supply chain: A literature review, framework, and research agenda", *Journal of Business Logistics*, vol. 44, n. 2, pp. 198-227.
- JUJU D., BAFFOE G., DAM LAM R., KARANJA A., NAIDOO M., AHMED A., GASPARATOS A. (2020), "Sustainability challenges in sub-Saharan Africa in the context of the sustainable development goals (SDGs)", Sustainability Challenges in Sub-Saharan Africa I: Continental Perspectives and Insights from Western and Central Africa, pp. 3-50.
- LE T.T., BEHL A., PEREIRA V. (2022), "Establishing linkages between circular economy practices and sustainable performance: the moderating role of circular economy entrepreneurship", *Management Decision*.
- LEE S.M., KIM S.T., CHOI D. (2012), "Green supply chain management and organizational performance", *Industrial Management & Data Systems*, vol. 112, n. 8, pp. 1148-1180.
- MOUSSA T., ALLAM A., ELMARZOUKY M. (2022), "Global modern slavery and sustainable development goals: Does institutional environment quality matter?", *Business Strategy and the Environment*, vol. 31, n. 5, pp. 2230-2244.
- NEW S.J. (2015), "Modern slavery and the supply chain: the limits of corporate social responsibility?", *Supply Chain Management: An International Journal*, vol. 20, n. 6, pp. 697-707.
- OMISORE A.G. (2018), "Attaining Sustainable Development Goals in sub-Saharan Africa; The need to address environmental challenges", *Environmental development*, vol. 25, pp. 138-145
- PACHE A.C., SANTOS F. (2013), "Inside the hybrid organization: Selective coupling as a response to competing institutional logics", Academy of management journal, vol. 56, n. 4, pp. 972-1001.
- PANDA B., LEEPSA N.M. (2017), "Agency theory: Review of theory and evidence on problems and perspectives", *Indian journal of corporate governance*, vol. 10, n. 1, pp. 74-95.

- PENH B. (2009), "New convergences in poverty reduction, conflict, and state fragility: what business should know", *Journal of business ethics*, vol. 89, pp. 515-528.
- SARKIS J., ZHU Q., LAI K.H. (2011), "An organizational theoretic review of green supply chain management literature", International journal of production economics, vol. 130, n. 1, pp. 1-15.

SCOTT W.R. (2001), Institutions and organizations (2nd ed.), Thousand Oaks, CA: Sage.

- SPARKS J.L.D., BOYD D.S., JACKSON B., IVES C.D., BALES K. (2021), "Growing evidence of the interconnections between modern slavery, environmental degradation, and climate change", *One Earth*, vol. 4, n. 2, pp. 181-191.
- TRUANT E., BORLATTO E., CROCCO E., SAHORE N. (2024), "Environmental, social and governance issues in supply chains. A systematic review for strategic performance", *Journal of cleaner production*, 434.
- WILHELM M.M., BLOME C., BHAKOO V., PAULRAJ A. (2016), "Sustainability in multi-tier supply chains: Understanding the double agency role of the first-tier supplier", *Journal of operations management*, vol. 41, pp. 42-60.

YIN R.K. (2014), Case study research. Design and methods, 5th ed. London, Thousand Oaks: Sage Publications.

- ZAMAN U., ONWE J.C., JENA P.K., ANYANWU O.C., EBEH J.E., FULU O. (2023), "Unraveling the intricate relationship between unemployment, population, and poverty in Sub-Saharan Africa: Does quality of life matter?", Sustainable Development, vol. 31, n. 5, pp. 3930-3945.
- ZHU Q., SARKIS J. (2004), "Relationships between operational practices and performance among early adopters of green supply chain management practices in Chinese manufacturing enterprises", *Journal of operations management*, vol. 22, n. 3, pp. 265-289.
- ZHU Q., SARKIS J. (2006), "An inter-sectoral comparison of green supply chain management in China: drivers and practices", *Journal* of cleaner production, vol. 14, n. 5, pp. 472-486.