

# Call for Contributions

## **Towards Realizing the 2030 Agenda in the Built Environment:**

### The Role of Design, Construction, and Real Estate in Advancing the Sustainable Development Goals

An edited collection to be published by Palgrave Macmillan

Under consideration for inclusion in  
The Sustainable Development Goals Book Series

#### **Co-edited by:**

Thomas Walker, PhD

Carmela Cucuzzella, PhD

Sherif Goubran, PhD

Rana Geith

## ABOUT THE BOOK

The impacts of buildings on the environment, societies, and economies have been extensively studied across various academic fields, often revealing challenges and opportunities across the entire lifecycle of projects. With the publications of the 2030 Agenda and resulting call for transformative change, scholars are now exploring how building projects can help advance the sustainable development goals (SDGs) and how to move the building industry beyond the traditional environmental risk management approaches. Previous publications have followed thematic or disciplinary approaches and have primarily focused on specific phases of building projects. However, to provide a comprehensive understanding of the contribution of buildings to the achievement of the 2030 Agenda, there is a need to examine the complete life cycle of projects, namely the design, construction, investment, management, and regulatory dimensions of the built environment.

The proposed edited book, *Towards Realizing the 2030 Agenda in the Built Environment: The Role of Design, Construction and Real Estate in Advancing the Sustainable Development Goals*, aims to collect insights from scholars and practitioners from an assortment of fields to uncover the role the construction and real estate sectors play in attaining the SDGs. It follows a lifecycle-based approach to the topic, addressing design, construction, management, investment, and regulatory dimensions of projects in the area. It aims to expand the reader's understanding of the built environment beyond the design and construction phases. This enables the collection to explore the links and transitions between different project phases and uncover new methodologies that aim to tackle systemic sustainable development challenges. This comprehensive coverage also allows the collection to capitalize on the strengths and weaknesses of the building industry, highlight emerging trends, and uncover some critical gaps that need to be addressed to attain the 2030 vision. This interdisciplinary and comprehensive approach also puts into perspective the interconnected nature of the SDGs and highlights the importance of multi-stakeholder collaborations in achieving them.

The book will be organized so as to examine the 17 SDGs. By intersecting the SDGs with the life cycle phases, the collection will offer a matrix for readers to understand the interactions between the building sector and the 2030 Agenda. The collection will feature contributions from both the research and practitioner communities as well as policy actors. It will feature contributions that present and theorize on new approaches in design, investment, and policy, examine new management approaches in construction and investment, and explore the forms of policy changes required to strengthen the role of the built environment in achieving the 2030 Agenda. The contributions will utilize case studies to exemplify the applicability of their proposals in real-life contexts.

## CALL FOR CONTRIBUTIONS

*Towards Realizing the 2030 Agenda in the Built Environment: The Role of Design, Construction and Real Estate in Advancing the Sustainable Development Goals* aims to offer a novel perspective, which will provide a snapshot of current and potential interlinkages between the building sector and the 2030 Agenda, highlighting the key challenges that require the urgent attention of researchers, businesses, and policymakers. These include:

- The gaps in current industry practices
- The limits of current assessment schemes in advancing the 2030 Agenda
- The inconsistencies between policies and regulations, on the one hand, and the SDGs on the other
- The potential of new methodologies, approaches, and techniques in addressing the urgent development challenges of the built environment

The book will serve as a critical reference for built environment scholars, practitioners, and policymakers aiming to embed the SDGs in their respective work. It will also present the readers with a systemic approach for understanding city functioning for accommodating, designing, and following through with alignment to the SDGs. The proposed co-edited book will consist of contributions by **experts** in both the **academic** and **practitioner** communities within the fields of architecture, construction, development studies, and related fields such as economics, management, business, and policy. Due to the global nature of the topic and the book's proposed content, it will have a strong global appeal.

Considering the interconnected and complex nature of the topic, the co-editors encourage contributions that are transdisciplinary in their approach. The submissions will be reviewed with an open mind and with a particular focus on the relevance of the chapter with respect to the advancement of the SDGs in the built environment. The co-editors encourage authors to critically assess the scalar relevance – at the local, regional, national, and supranational levels – of their contributions. All contributions should aim to extract specific drivers and barriers in integrating the SDGs in the life cycle of projects. The book can be used as an academic reference for senior undergraduate, graduate, and post-graduate scholars in architecture, construction, policy, real-estate economics, and sustainable development.

## POTENTIAL TOPICS FOR CHAPTERS

### 1. INTRODUCTION

- 1.1. Sustainable development in the built environment: A comprehensive approach

### 2. DESIGN & CONSTRUCTION

- 2.1. Building technologies and materials as tools for advancing sustainable development
- 2.2. Building construction practices and the SDGs
- 2.3. Spatial planning and decent work opportunities
- 2.4. Urban planning practices for poverty alleviation and enhanced quality of life
- 2.5. Indoor environmental quality, health, and equality of users
- 2.6. Construction waste and sustainable consumption and production
- 2.7. Partnerships through strategic planning in the built environment

### 3. INVESTMENT & MANAGEMENT

- 3.1. Cost evaluation of sustainable building technologies and materials
- 3.2. Sustainable construction management and building operation
- 3.3. Sustainable real estate portfolio management
- 3.4. Impact investment in the real estate sector investment
- 3.5. Building management systems (BMS) in the built environment

### 4. REGULATIONS & POLICIES

- 4.1. Building codes for sustainable cities and communities
- 4.2. Built environment laws and regulations for sustainable development
- 4.3. Land tenure and equality
- 4.4. The role and limits of current sustainability standards

- 4.5. Policy proposal for more inclusive built environments
- 4.6. Political influences and lobbying and its consequences on the building sector
- 4.7. Innovations in infrastructure, city-planning, and design
- 4.8. Governance and representation as drivers of a peaceful built environment
5. **TRANSITIONS BETWEEN LIFE CYCLE PHASES**
  - 5.1. Building materials for future sustainable developments and retrofits
  - 5.2. Improving the return on investment for sustainable technologies through good management
  - 5.3. Advancing sustainable development through technologies
  - 5.4. The role of sustainable urban planning in real estate portfolios
  - 5.5. Other approaches that explore the transition between the design, management, and investment phases
6. **LIFE CYCLE-BASED APPROACHES**
  - 6.1. Governance and its role in the design, construction, management, and investment
  - 6.2. Laws, policies, codes, standards and their role in advancing sustainable development
  - 6.3. Building standards and cost evaluation of recycling technologies in buildings
  - 6.4. Other approaches that merge the design, management, investment, and regulatory topics
7. **CONCLUSIONS**
  - 7.1. Intersecting the 17 SDGs with the life cycle of projects: A matrix

## IMPORTANT DATES

- Abstract and CV submission deadline – **January 31<sup>st</sup>, 2022**
- Selection of abstracts and notification to successful contributors – **February 28<sup>th</sup>, 2022**
- Full chapter submission – **June 30<sup>th</sup>, 2022**
- Revised chapter submission – **August 31<sup>st</sup>, 2022**

## GUIDELINES FOR CONTRIBUTORS

Submissions should be written in English using a non-technical writing style. The contributions may include diagrams/illustrations in order to present data, or photographs/figures (all in black & white) to better illustrate the topic of discussion. Submitted chapters should be original and exclusively prepared for the present book. No part of the article should be published elsewhere. Chapters must not exceed 7,000 words (including all references, appendices, biographies, etc.), must use 1.5-line spacing and 12 pt. Times New Roman font, and must use the APA 7th edition reference style.

**Researchers and practitioners are invited to submit abstracts of no more than 500 words, a bibliography for their proposed chapter, and a CV. Abstract submissions are expected by January 31<sup>st</sup>, 2022. Submissions should be sent via email to [2030Agenda\\_builtenv@aucegypt.edu](mailto:2030Agenda_builtenv@aucegypt.edu)**

Authors will be notified about the status of their proposals and will be sent complete chapter guidelines. Full chapters are expected to be submitted by **June 30<sup>th</sup>, 2022**.

**Please note** there are no submission or acceptance fees for the manuscripts.

## ABOUT THE EDITORS

### Thomas Walker<sup>1</sup>

Thomas Walker holds a BSc in Management Information Systems from the Technical University of Darmstadt, Germany, and an MBA and PhD degree in Finance from Washington State University. Prior to his academic career, he worked for several years in the German consulting and industrial sector at such firms as Mercedes Benz, Utility Consultants International, Lahmeyer International, Telenet, and KPMG Peat Marwick. His research interests are in emerging risk management, corporate finance, venture capital, sustainability & climate change, FinTech, corporate governance, securities regulation and litigation, insider trading, and institutional ownership, and he has published over 70 articles, book chapters, and edited books in these areas. He is the lead editor of seven books on sustainable financial systems, sustainable real estate, sustainable aviation, environmental policy, emerging risk management, innovations in social finance, and water risk management. Dr. Walker currently serves as the principal investigator on research grants by the Social Sciences and Humanities Research Council (SSHRC), the Autorité des marchés financiers, and the Global Risk Institute. In 2018, he founded the Emerging Risks Information Center (ERIC, <https://emerging-risks.com>), which conducts targeted research on environmental, technological, and societal risks that affect our world today. In 2021, he became the inaugural director for the Jacques Menard/BMO Center for Capital Markets Research at Concordia University and the Concordia University Research Chair in Emerging Risk Management (Tier 1).

### Carmela Cucuzzella<sup>2</sup>

Dr. Carmela Cucuzzella, is a Professor in the Design and Computation Arts department and is the holder of the Concordia University Research Chair in Integrated Design and Sustainability for the Built Environment ([www.ideas-be.ca](http://www.ideas-be.ca)). She is the founding co-director of the Next Generation Cities Institute. She is also a member of the inter-university and interdisciplinary team of the Laboratory for the Study of Potential Architecture (LEAP). Her most recent books: (1) *Analyzing Eco-architecture Beyond Performance* offers an overview of the state of the field and constitutes a critical introduction to the study of environmentalism in architecture. Contrary to the technological and performative biases of most eco-design studies, the book helps to understand how meanings are embedded in all types of eco-architecture. (2) *Sustainable Architecture between Measurement and Meaning* takes the reader on a journey that distances itself from the mainstream approaches for sustainable architecture. Her research work is framed within the broad domain of design studies, where she investigates questions of sustainable design for urban living. Her varied background and expertise in environmental and social life cycle analysis, green building rating systems, and design and architecture allows her to adopt a framework revolving around design's interrelated dimensions of the cognitive-instrumental, the moral-practical, and the aesthetic-expressive forms of conception and discourse. She has two main areas of research. In her CoLLaboratoire research, she seeks to understand how the collaborative design and implementation of interactive art-architecture in public urban spaces can contribute to a critique, deeper understanding, and/or embodiment of sustainable urban, professional, community, and even human practices in the long term. In her second area of research, her interests lie predominantly in responsible design practices with a particular interest in understanding the challenges of accommodating sustainability diagnostic or rating tools such as Life Cycle Assessment (LCA) and LEED (Leadership in Energy and Environmental Design) alongside the creative conceptual exploration that takes place during the design process. She addresses the limits of current sustainability assessment tools as a means to gain a complex understanding of social, cultural, and environmental repercussions of design practice.

### Sherif Goubran<sup>3</sup>

---

<sup>1</sup> Concordia University: [thomas.walker@concordia.ca](mailto:thomas.walker@concordia.ca)

<sup>2</sup> Concordia University: [carmela.cucuzzella@concordia.ca](mailto:carmela.cucuzzella@concordia.ca)

<sup>3</sup> The American University in Cairo: [sherifg@aucegypt.edu](mailto:sherifg@aucegypt.edu)

Sherif Goubran is an assistant professor of sustainable architecture in the department of Architecture (School of Sciences and Engineering) at the American University in Cairo, where he joined as an instructor in Fall 2020. Funded by several prestigious grants and awards, including the Vanier Canada Graduate Scholarship, he completed his PhD at the Individualized Program (INDI) at Concordia University in 2021. His PhD research was. Before that, Sherif completed a MASc in building engineering in 2016, focusing on energy efficiency in commercial buildings. He holds a BS in Architecture at the American University in Cairo (AUC-Egypt). Sherif's research focus includes building sustainability and sustainability assessment, sustainability in architectural design, and human approaches in design. Specifically, his work investigates the theory and practice of sustainability in the built environment, combines qualitative and quantitative methodologies, and explores the shift from incremental towards transformational design. He conducts interdisciplinary research within the fields of design, architecture, building engineering, and real estate finance. He is also involved in several sustainability committees and projects on the student and the administrative levels, as well as in the broader community.

**Rana Geith<sup>4</sup>**

Rana Geith is a research and teaching assistant at the Department of Architecture at the American University in Cairo (AUC), where she recently graduated with a Bachelor of Science in Architecture engineering. Her research interests include environmental impact assessments, form and space-making potential for sustainable design, environmental and ecological architecture, and spatial decision making. Her interest in sustainability stems from her belief in the role of architecture and design in tackling the developing complex societal challenges. She gathered work experience in architectural design, site coordination and supervision, marketing, and communication. She also served as the elected President of the Architecture Association (AY 2020-2021) at the department.

---

<sup>4</sup> The American University in Cairo: [ranag@aucegypt.edu](mailto:ranag@aucegypt.edu)