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ROLE OF DESIGN EDUCATION IN IMPARTING VALUES OF SUSTAINABILITY AS SOCIAL RESPONSIBILITY OF DESIGNERS

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ABSTRACT

Professional design has become a forceful, persuasive and omnipresent reality of contemporary world by influencing patterns of human consumption and aspirations. This influence is not limited to the clients or the consumers, but impacts the society and environment at large—local as well as global levels. A professional designer plays a pivotal role in creating the ‘world by design’, and, hence, shares the social responsibility of the larger consequences of the process/act of design. Therefore, it becomes important to examine the values imparted to design students, the future design professionals.

Design education programmes generally claim to impart values of sustainability as social responsibility of designers.

Does this intent get manifested in their course curriculums and actualised in the pedagogies? The paper addresses this question by examining the role of design education programmes and the challenges in imparting the values of sustainability as social responsibility of designers.

Key Words: Design Education, Curriculum and Pedagogy, Sustainable Design Values, Socially Responsible Design.

1. INTRODUCTION

In this paper, I examine the role of design education in imparting values of sustainability as a critical part of socially responsible design. The key areas of examination are: curriculum and pedagogies. This paper is divided into three sections. The first section provides a background to the growing need for imparting these values. In the second section, I examine the course curriculum and the pedagogy of design education programmes, by using quantitative and qualitative methods, to find out the actualisation process and challenges of imparting these values. The third section is the concluding part of the paper that discusses the findings. The primary field study and research used for this article was undertaken in India as a part of my doctoral research. Although the research base is location-specific, it brings forth insights valuable for multiple locations and parallel contexts.

2. BACKGROUND

In all possibilities, life on planet Earth will continue in some form or the other even if humans annihilate themselves. Global climate change and global warming have become key terms of reference and concern in discussions on sustainability of life on this planet, especially that of humans. United Nations Framework Convention on Climate Change (UNFCCC) acknowledged the factuality of climate change and significant human contribution to it. In 2016, the Paris Agreement on climate change and the 17 Sustainable Development Goals (SDGs) of the 2030 Agenda for Sustainable Development entered into force that not only points to the gravity of the situation but further emphasises the significance of sustainability in the human actions and development ('The Sustainable Development Agenda', n.d.). The Guardian reports that, according to an official expert group that presented the recommendation to the International Geological Congress in 2016, "Humanity's impact on the Earth is now so profound that a new geological epoch – the Anthropocene – needs to be declared" (Carrington, 2016).

More than ever before, in the past few decades, design has become an all-pervading reality of the human civilisation—shaping, serving and changing the world around us. A significant part of professional design today is involved in influencing the patterns of human consumption and aspirations, what Victor Papanek, way back in the 1970s, had described in his book *Design for the Real World*, "persuading people to buy things they don't need, with money they don't have, in order to impress others who don't care" (p. ix). The creators of such products, services and systems, share the responsibility of resulting environmental and social consequences of the acts of their design as a whole. In this context, it becomes significant to examine the roles and responsibilities of designers beyond the client and the consumer, towards the environment and society at large.

"The worldly actions that we have taken en masse to sustain ourselves in the short term have increasingly been at the expense of maintaining the long-term sustenance of ourselves and the world around us. The greater our numbers and our technological capacity to misappropriate planet Earth's resources become, the faster we defuture ourselves" (Fry, 2009, p. 110). Many researchers, from diverse disciplines, including designers and design thinkers, have raised concerns regarding the larger social and environmental impact of design. Though the sole responsibility of the current environmental status cannot be attributed to designers and their design actions, design, per se, has been a significant contributor to anthropogenic outcome, as expressed by Harold Nelson and Erik Stolterman (2003), in describing design as 'an act of world creation' and a designer as 'world creator' (2003, p. 239).

Donald A. Schön (1983) in his canonical book, *The Reflective Practitioner: how Professionals Think in Action*, describes the process of making positive contribution through a practitioner's 'conversation' with the situation and 'reflection-in-action' that influences, perspective, intentions, choice of explanations and arguments regarding the practice. Design students in their role of world creators, through a reflective process, should be able to perceive their practice as being beyond merely a source of livelihood. They should be prepared to consider the wider implications of their design action and its remotest consequences, on the environment and the society, in addition to the call of their direct normative professional behaviour or duties enforced by law. Design education has a significant role to play in this preparedness.

3. RESEARCH METHODS AND DATA ANALYSIS

In this section, I have examined the role of design education programmes and the challenges of imparting the values of sustainability as a critical part of socially responsible design. This section is divided in two parts. The first part deals with the research method used. The second part puts forth the analysis of findings relevant to this paper from the data collected through the research methods.

3.1. Research Methods

This paper employs quantitative and qualitative research methods to examine the course curriculum and the pedagogy of design education programmes, to find out the actualisation process and challenges of imparting values of sustainability as social responsibility of designers. In doing so, data was collected from 298 respondents (shown in table 3.1) through an online survey questionnaire and 20 expert interviews were conducted. All the respondents were involved with design education—as educators and/or as students—and represent a cross-section of over 100 design education programmes/institutions/departments from different parts of India. Of these respondents, 85%

were involved with professional design practice, which adds to the relevance of their responses. To further enrich the analysis, relevant institutional documents of five design education institutions from India, identified as top five institutions by the survey respondents, were examined. Though the study is India-centric, the relevance of its outcome holds valid in parallel contexts and other locations.

Categories of online survey respondents involved with design education in India	Respondent Count	Percentage
as current or past design educator (full-time faculty member or part-time visiting faculty member)	55	19%
As current or past design student	116	39%
both as design student in the past and, subsequently, as design educator – current or past, full-time or part-time	127	42%
Total	298	

[Table 3.1] Categories of Survey Respondents and Their Count

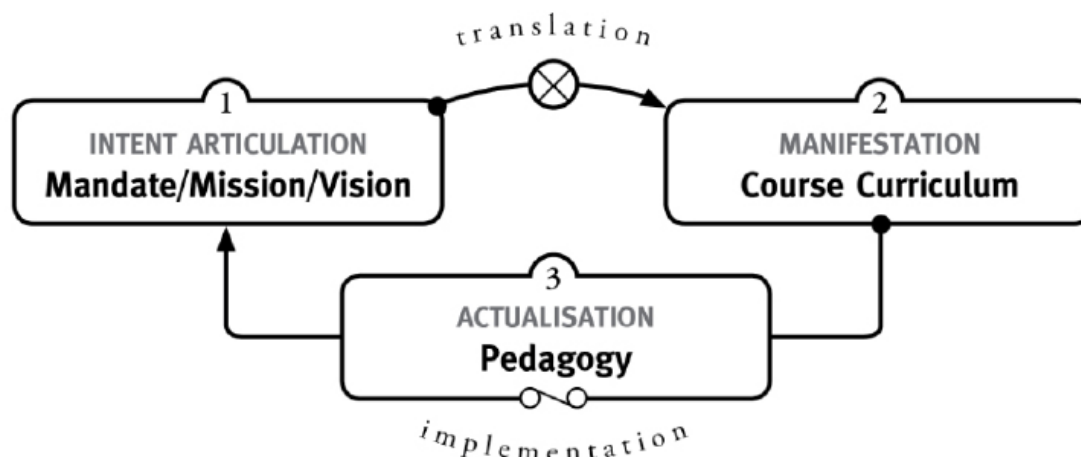
3.2. Data Analysis

A significantly large number of respondents are of the view that design has contributed to the growth of consumerism and related industrial expansion in India. Of the respondents, 67% saw design as a major contributor, and another 27% saw design as a minor contributor. Furthermore, regarding the response about the outcome and impact of design interventions, 86% of respondents indicated that design interventions also have unintended outcomes, beyond what is primarily intended by designers. Though design interventions may be primarily focused on the end-users/clients, there are larger social and environmental implications of such interventions.

Sustainability is critical for the future of the human society, thus foundational to social responsibility of designers. The survey respondents highlighted this significance in their responses. An overwhelming majority, 94%, of the respondents were of the opinion that application of socially responsible design values in design practice can contribute to a more sustainable future. Also, most of the respondents, 92%, were of the view that it is possible to integrate these values as an integral part of a design practice. With the growing significance of professional design and its implications on a sustainable future, it becomes imperative to examine whether or not design education programmes focus on sensitising students about the larger social and environmental issues related to design praxis.

In context of the need for imparting values of socially responsible design, through design education programmes in India, 89% of the respondents saw this need as critical and foundational, and were of the opinion that it would influence the larger social impact of design outcome of the design students. However, 15% of the respondents were of the view that these values are not imparted by the design courses. Another 14% saw that these values are imparted, whereas a significant 65% were of the view that these values are imparted only to some extent. These responses indicate that while imparting of socially responsible design values is not completely absent, since these values are seen to be imparted 'only to some extent', there is scope of improvement.

In response to the question regarding the most significant factor in imparting socially responsible design values among design students, 30% of the respondents saw 'institutional mandate oriented towards values of socially responsible design' as the most significant factor; 36% viewed 'syllabus and course components directed towards values of socially responsible design' as the most significant factor; and 31% perceive 'values and inclination of individual design educators towards values of socially responsible design' as the most significant factor. Since the differences in the number of responses vary marginally, it indicates that all the three factors are important. These three factors and their interrelation, as shown in figure 1, are discussed further based on the views of the survey respondents, expert interviews and document analysis. A few institutions were selected for a closer examination of institutional documents. These design institutions were rated as the top five in India by the online survey respondents. This examination of the mandates or mission/vision statements, curriculums, and pedagogies is not intended to compare the institutions but to analyse their overarching focus.



[Figure 1] Interrelation of three significant factor in imparting socially responsible design values

In exploring the first factor, the main query was whether the respondents came across references to values of socially responsible design in mandates or mission/vision documents publically shared by design education programmes/institutions. Of the respondents, 38% either did not come across such documents or were not aware of them. Because of the absence of such articulation in the institutional documents or a lack of their awareness itself can be one of the hindrances in imparting values of socially responsible design. However, 62% claimed that they have come across such publicly shared documents on websites or documents. The very fact that a large percentage of respondents were aware of the reference to values of socially responsible design in these institutional documents indicates the articulation of such institutional interest/commitment. Overall, the responses reveal that commitment to socially responsible design is articulated in institutional manifestos or mission/vision documents of contemporary design education programmes in India.

In analysing the second factor, the curricular focus directed towards values of socially responsible design, the survey respondents expressed a conflict between the need to impart values of socially responsible design and to prepare students as per commercial job market expectations. An analysis of their responses establishes a clear dominance of the percentage of courses focused on imparting skills oriented towards meeting the demands of the industry over the percentage of courses focused on imparting values of socially responsible design. Further study and analysis of curricular objectives/syllabus documents/semester flowcharts/course descriptions of the B.Des and M.Des programmes of the five design education institutions revealed a varying range of emphasis through their courses to impart socially responsible design values. The analyses of course credits indicate that such courses constitute less than 30% and, in some cases, were as low as 7% of the total course credits. Such courses are dominated by programme focus and courses that impart industry/specialisation-specific skill-sets, technical knowhow, presentation techniques, exposure/understanding of the industry, and professional projects and practices, aligned with industry demands for better employability in skill-based design roles.

It can well be argued that without a proper foundation of such skills design students cannot aspire to assume the role of employable design professionals in future. However, an array of skills without conceptual understanding of the wider interconnections and responsibilities of a powerful profession is akin to putting firearms into amateur hands. The interviewed experts held concurring views while responding to the query regarding curricular focus of design education programmes in India. They too highlighted a gap between the intent and actualisation of imparting socially responsible design values and larger public good. Most of them opined that there were few opportunities within the curriculum to address issues related to socially responsible design.

Shared below are views of interviewee A, a design practitioner with 33 years' experience, who has been associated with many design schools as a visiting academic or as a member of their advisory bodies for 23 years. He observes that most of the contemporary design education programmes are employability driven, training students in the "craft of design", i.e., supplying graduates who have strong software skills, are meticulous with getting the forms and the kerning right, can deliver sophisticated-looking, polished output, but who are not thinking individuals. He describes them as "Photoshop¹ donkeys" and explains: "Because they are good [with technical skills], they don't think. And design is essentially a thinking profession" that relies on soft skills—"on sensitivity, team work, being grounded, developing empathy". Such soft skills would be essential to deal with the complex social, cultural and sustainability issues and challenges that designers need to address.

The third factor, pedagogical role of design educators in imparting values of socially responsible design, is analysed in the context of the preparedness for understanding these values and imparting them. A design educator in the

¹Photoshop is a proprietary name of a software package for digital editing and manipulation of photographs and images. Photoshop, launched in the 1990s, has developed into an industry standard and allows complex work with images. The expected proficiency in handling the software and its usage have penetrated so deeply amongst industry professionals, design students and novice amateurs that photoshop is also commonly used as a verb now. The industry is known to have a continuous supply of highly proficient Photoshop buffs who do not seem to know what to do with their skills unless told what to do with the software or where to apply it.

role of a faculty member, project mentor/guide, an expert from the field, facilitator, advisor, motivator or academic evaluator is comparable to, yet quite different from, a teacher in the conventional sense. The difference is further magnified due to the absence of textbooks as source of explicit knowledge and significance of tacit knowledge of the design educator and the space for self-direction provided to them within the design curriculum and pedagogy. A study of pedagogical process of conducting courses, student projects and student evaluation has highlighted the central role of the design educator in the teaching-learning transaction within this field. This central role of design educators resonates with the views of survey respondents. The quantitative analysis of their views has established that appropriate restructuring of courses and syllabus, together with training and orientation of design educators, is necessary for a stronger thrust in imparting values of socially responsible design compared to only addressing one of the two. Such a response, while giving importance to restructuring course curriculum and pedagogical training, points to the critical role of the design educators in imparting the values.

A critical issue that impacts the imparting of socially responsible design values by design educators is their level of understanding of these values and adequacy of preparation in imparting them. A query regarding this was posed to both, design educators and design students. Only 7% of the total respondents were of the opinion that design educators were adequately prepared. The majority of the respondents, 53%, were of the view that only some of them were adequately prepared, while another substantial number, 36% of the respondents, were of the opinion that most of the design educators are not adequately prepared. The opinion of respondents about the adequacy/inadequacy of preparation regarding the understanding of socially responsible values is another impediment to the pedagogic process of imparting values of socially responsible design. It also points to the need to better prepare the design educators in understanding values of socially responsible design and imparting these values. In response to the query regarding the need for 'training of trainers', a significant majority, 79% of the respondents, were of the opinion that there is a great need, 19% point to some need, and none of the respondents think that there is no need for programmes focusing on training the design educators. Without the availability of such programmes and adequate training of the design educators, the onus of carrying these values forward would rest on the interest, inclination and preparedness of the design educators.

4. CONCLUSION

This paper refers to sustainability as critical for the future of the human society, thus foundational to social responsibility of designers and as values to be imparted to design students, the future design professionals. The paper primarily sought to find out the actualisation process and challenges of imparting these values. The analysis of quantitative data gathered from the online survey respondents and qualitative data from expert interviews of respondents involved with design—education and practice—in India, along with analysis of relevant institutional documents, contributed in finding out whether the institutional intent of imparting these values manifest in their course curriculums and actualised in the pedagogies. I examined three key components of design education institutions in India: mandates or mission/vision statements, course curriculums, and pedagogies.

First, the study points out that sustainability is not an isolated value; to be effective, it has to be an integral part of socially responsible design values. A majority of respondents acknowledge the references to socially responsible design in the institutional manifesto or vision/mission documents of the design education programmes. Analyses of mandates, mission/vision statements of design education institutions demonstrate that such documents, some more elaborate than the others, do articulate their commitment towards socially responsible design. However, these documents do not present further directions to actualise their intent and the process of assessing their progress in this direction.

Second, the examination of curriculums highlighted the manifestation of institutional intent of imparting the values of socially responsible design. The analyses of curriculums also showed varying percentage of courses across different programmes with scope of imparting these values. But the percentage of courses that have the scope of imparting such values is small. They are largely dominated by courses that focus on imparting industry specific skills and knowhow that may be only temporarily marketable and have little scope for imparting long-lasting values. The respondents too, expressed the lack of curricular emphasis on imparting the values of socially responsible design. Finally, another critical dimension of insufficient emphasis on socially responsible design emerged from the examination of the pedagogical role of design educators in this context. The curriculum is implemented through the pedagogic process that is highly dependent on the faculty members due to the nature of teaching-learning transactions in design education programmes. Competent faculty members are required even to actualise the scope of imparting socially responsible design values that are present in the small percentage of courses. The respondents were of the opinion that the design educators need to be adequately prepared in their understanding of socially responsible design values and better trained in transferring these values to the students. However, due to lack of adequate programmes to train design educators, the difficulty in imparting these values are magnified. Evidently, there is a gap between the articulated intent, its manifestation in the course curriculums and the pedagogic actualisation of the manifested intent. The examination of the three key components of design education is supported by quantitative and qualitative data. All these bring out that the commitment towards socially responsible design, as articulated in the institutional mandates or mission/vision statements, receives a small manifestation in the course curriculum and a proportionate