

REVITALISING URBAN TISSUE AND COMMUNITIES THROUGH BIOPHILIC PARTICIPATORY DESIGN: NORMANTON PEARTREE AREA, DERBY, UK

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INTRODUCTION

Today the greatest goal for any city worldwide is to become livable. The concept of *livability* not only covers the urban design, but also the structure of elements which could be influential to the city growth and its financial prosperity. According to the dictionary, *livable* means:

1. Worth living; enjoyable.

- 1.1 (of an environment or climate) Fit to live in.¹

A livable city encourages people to participate actively to its development. Hence, in general a livable city is also a sustainable one. We consider a livable city as the city of the future. We find out that such a city contains a few identifiable neighbourhoods with each one of them having its own character. As a matter of fact, a livable neighbourhood is compact, sustainable, diverse, green, healthy and accessible. The most important dynamic of a livable city is the community. When making a city, we always consider community needs and necessities, and also potential hazards. Thus, a livable city is more often a resilient city as well. However new approaches to city form in urban design are often limited to preserve its existent urban morphology or '*urban tissue*' without any radical transformation of it.² However, there is often lack of citizens' energetic participation during proposed changes. We often distinguish newest urban tissue or growth of cities from their purely geometrical extension of the roads, containing unstoppable car traffic and less pedestrian path lines or dangerous bicycle routes with no protection from speeding vehicles. Many theorists believe that urban morphology or the study of change in the physical form and shape of human settlements focuses mainly on pre-determined regular (man-made '*ideal grids*') or irregular ('*deformed grids*'- based on pedestrian movement and influenced by topography) patterns.³

However some urban designers – mainly academics – define urban design as "*the processes of making better places for people than would otherwise be produced.*"⁴ However, since 2011 the author of this paper has been involved in research with other members of the International Society of Biourbanism, thus, professes ideas of design of cities which are rigorously supporting well-being of citizens and public health in general. Being based on theories and practices of professionals who believe that "A city is not a tree,"⁵ the author has reinforced her research with live projects and case studies in which, her students at all levels develop concepts to support growth of local vulnerable communities, such the area described further. She believes that cities are similar to live organisms which grow in a natural way, thus, complexity is a dominant element in her teaching and practical applications of complexity theories,⁶ and models based upon harmonious Fractal Growth, and also Constructal Law of Physics.⁷ The author affirms that:

Urban space is often related to information theory, as its use is in agreement with information context, which initiates from surfaces rising from the ground; this information can be perceived as logic signal and also be accepted by human beings, navigating through it, by means of pedestrian and often preferential pathlines (urban navigation indicators). Successful spaces should offer perceptible hints from local structural emergences; standing and seating signals,

for example, may determine the most advantageous pedestrian paths and nodal points associated with them. Hence, human life in cities emerges during connectivity via geometrical continuity of grids and fractals, via path connectivity among highly active nodes, via exchange/movement of people and, finally via exchange of information (networks).⁸

ARCHITECTURAL DESIGN EDUCATION AT THE COLLEGE OF ENGINEERING AND TECHNOLOGY AT THE UNIVERSITY OF DERBY, UK

The University of Derby is a modern UK university located in the East Midlands, England and is rated Gold in the Teaching Excellence Framework (TEF). In the official web pages of the University of Derby we find that there is a close relationship between Derby City and the University for many years:

Is laid back living your thing, or are you an adrenaline junkie always seeking adventure? Are you a culture lover looking to learn new things or do you live for the night? Do your friends see you as a sports fanatic, or are you a frequent gig goer obsessed with music? Whichever of these you identify with, Derby is the place where you can follow your interests as well as explore new passions, all while studying for a top quality degree.⁹

The University of Derby consists of three campuses in Derby, Buxton and Chesterfield; an exciting range of courses at the University of Derby offer to students full-time, part-time or online study. You can explore our campuses and the City via our '*virtual campus*'.¹⁰ The University offers a vast range of foundation, undergraduate, postgraduate or research courses through a choice of subjects in its Colleges: College of Arts, Humanities and Education, College of Business, Law and Social Sciences, College of Engineering and Technology, College of Health and Social Care, College of Life and Natural Sciences, and Hotel, Resort and Spa Management in Buxton. In our College of Engineering and Technology the aspirations are high:

Our aim is to inspire and empower students to do well in their studies. We provide an innovative teaching curriculum with a balanced programme of scientific theory and vocational skills. Our academics are recognised, practicing experts in their areas and are actively contributing to advances in their fields through their research.¹¹

Our architectural design programmes belong to the Department of Mechanical Engineering and the Built Environment. Our programmes include: Architectural Studies FdSc, Architectural Technology and Practice BSc (Hons), Architectural Design Joint Honours, Interior Architecture and Venue Design BA (Hons).

The module about which we refer to in this paper is Project Research and Urban Design at Level 6 of BA (Hons) Interior Architecture and Venue Design, which is accredited by the Chartered Society of Designers. Our students gain valuable experience on industry placements, like Sara Butkiewicz, for example, who went to Los Angeles for hers, and she worked in Beverly Hills and Bel Air. Sara's project for this module experience (in Project Research and Urban Design) has been included in this paper as Case Study 1 (See further below). We've got a fantastic employment record with many graduates finding jobs both abroad and in the UK - such as with national or local architectural and interior design practices or local authorities. The course is presented to perspective students as follows:

During this course you'll be constantly challenged to conceptualise, investigate and develop the design of three dimensional spaces, understanding the ways that architectural and interior design histories and theories and the existing physical and cultural context can inform design processes, programmes and proposals. You'll be encouraged to develop an ethos of producing socially, culturally and environmentally responsive design proposals, drawing upon the best practice and expertise within the Department.

The course covers a wide range of venue designs that offer exciting areas of study, ranging from interior architectural design of bars, restaurants and multipurpose venue spaces to the design of hotels, resorts and residential developments. You'll look at planning and design of live performance spaces, social and community places, exhibition spaces, galleries, brand retail and museums to name a few.¹²

DERBY BECOMING A CITY

Derby has got a very long history, developing from a small Roman fort to an engineering and manufacturing giant.¹³ The Romans established their first fort at about 2,000 years ago; they named their settlement *Derventium*. The Vikings, later settlers named it *Djúra-by*, 'Village of the Deer'. During the Saxon period and after the Vikings, Derby thrived becoming important for trade and craft with both a mint and a market.¹⁴ Its population grew steadily during the medieval period, with a prominent wool and leather industry alongside an array of other craftsmen. Derby's central location and accessibility via road and river were vital to its further growth. Later new industries appeared, including cloth making, brewing and clock making. Derby grew rapidly in the industrial era with the opening of the world's first water powered Silk Mill in 1717 by John Lombe and George Sorocold.

Derby's engineering heritage begins during the nineteenth century with the North Midland Railway establishing itself in the heart of the town in 1840. We find that:

Following several mergers, the newly-formed Midland Railway was headquartered in Derby four years later, placing it at the centre of the British rail industry. The Midland Railway measured their railway empire from Derby and mileposts across the network record the distance from Derby station. The first of these can still be seen at the end of Derby station main platform and is marked D 0, meaning 0 miles from Derby.¹⁵

Derby still remains a major rail manufacturing, design and development centre to this day. In 1907, Rolls-Royce opened a car and aircraft factory in Derby, invigorating Derby further. The town was awarded city status in 1977 by Queen Elizabeth II.

DERBY AND ITS SUBURBS - THE NORMANTON PEARTREE MULTIFACETED SUBURBAN AREA SEEKING ITS OWN IDENTITY WITHIN THE INNER CITY

From January 2016, the author was invited and started attending meetings of a partnership action group, chaired by Derby City Council and with the active participation of representatives from several council services and organisations such as Derby Homes, social services, private landlord associations, etc. Because of her expertise in planning and her experience as an educator, the author has contributed to initial discussions and ideas related to the regeneration of rundown neighbourhoods, tackling issues of poverty and social exclusion and discrimination in Normanton Peartree area (suburban area of the city of Derby). In that particular area, Derby City Council is currently planning a series of interventions focusing to problems of housing, training/education and employment of youths, and public health. The area is characterised by migrant movements and flows since several decades; most families have been living in dreadful conditions in housing mainly offered by private landlords. This had a negative result mainly towards the elderly and the very young who have been constantly disadvantaged. In most households, most members of a family do not even speak English and most of the youths have got limited education, because of continuous expulsions from schools. The youths can often speak and translate in English for the older members of their family, but it is likely that poverty draws them out of education very early. Thus, they may be easily steered towards criminal actions starting from the petty ones and finishing with serious illegal activities often leading to imprisonment.

The collaboration with Derby Homes/Derby City Council originated after few meetings had taken place between Dr Graham Cairns (AMPS), the author/expert in New Urbanism and academic at the University

of Derby and the Derby councillor for Urban Renewal (in autumn 2015). After those initial meetings the author was invited to participate in the discussions between AMPS and other professional organisations and publishers in London in a meeting taking place on Friday, 25th September 2015; this Partner-Coordination Meeting with the title *Housing Critical Futures* was organised at Design Council/Cabe Offices and aiming at arrangements and organisation of a series of conferences hosted by Universities internationally. The meeting also clarified points about how each University and/or City Council and other organisations could be cooperating in the events during that series of conferences. After that specific meeting in London, Dr Cairns and the author discussed and made a decision about the title of the conference: *Cities, Communities and Homes: Is the Urban Future Livable?* Dr Cairns and the author were to be the main co-organisers, representing AMPS and the University of Derby respectively for that conference. In the call for the conference at Derby, it was made clear that:

The complexity of our cities is well documented. The economies they are based on are multiple. Some are growing exponentially, others are shrinking. Some pride themselves on architectural heritage, others are seeking to build and rebrand. Some are old, some are new. Inevitably their urban fabrics vary. The communities that live in these places reflect these conditions. Some are long-standing, others are new and in-formation. Sometimes they are active, on occasion homogenous. More generally they are diverse. These communities need, and want, a say in their futures. Some are well connect and affluent, others suffer deprivation and social exclusion. A constant in the mist of this complexity is their need to be housed – whether by themselves, the market, or governments. This conference seeks to explore how the three issues of city development, sense of community and housing need, all combine to make lives in our cities livable – or not.¹⁶

The author proposed a team to be formed by her and students in Year 3 who were to pursue studies in the Module Project Research and Urban Design in spring 2017; the students were presented with findings from the author's initial research (from January 2016 and until January 2017) and data provided by other members of the Normanton Peartree Action group. Further investigation, analysis of data and preparation of ideas and scheme projects for the regeneration of neighbourhoods in Normanton area took place until May 2017. All these ideas were presented to some members of the action group during a special presentation; additional feedback was given to students to be able to prepare an exhibition of their work for the Conference on 22-23 June 2017. The 'Cities, Communities and Homes: Is the Urban Future Livable?' Conference brought together scholars from New Zealand, Australia, the UK, Spain, the United States, Portugal and many more places across the world. They shared best practices on a range of related themes including housing design, urban planning, role of landscape design in creating healthy communities, community engagement in regeneration debates, environmental and social sustainability and more. And the most important thing was that all students had the opportunity to attend and get feedback from such a great community of scholars.

THE MODULE TITLE AND BRIEF

The assignment brief title presented to students for the module Project Research and Urban Design in spring 2017 was: "*Derby City Centre Urban Identity and links with suburban neighbourhoods under urban renewal.*" The learning outcomes are:

1. Critically analyse aspects of theoretical and contextual research relevant to your project proposal and evidence it in your concept development.
2. Research, critically evaluate and select appropriate technologies, materials, media, techniques, methods, and tools in accordance with design proposal.
3. Produce a distinctive portfolio of work, which involves primary and secondary research material, demonstrating independent thought and engagement with innovation.

The individual assignment was mainly to follow the guidelines below:

This part of the assignment requires students to research and evaluate current and future trends in innovative developments in urban design and use designs and technology of human scale oriented proposals, concepts and/or functional solutions. The end result of research and evaluation of findings could be a proposal of design. Your work would consider current literature and frameworks supporting collective wellbeing; you may also wish to evaluate the impact of emerging legislative and other frameworks, such as participative projects and their applications or current planning legislation. You should create individual design solutions for a specific environment by proposing and evaluating your solution inside a set of contemporary urban regeneration and new development context in terms of its sustainability; you should explore innovative approaches (and their likely outcomes). Your focus should be to enhance the urban value of all sites/areas offered by the brief by allowing the users and visitors to enjoy an attractive public space at all times.

Fourteen students presented their ideas and most of them exhibited their portfolios and boards during the conference. For this paper the author has selected four schemes/case studies, which also the panel thought that they had proposed useful and affordable solutions, and especially those which could offer the opportunity to Normanton Peartree area citizens to identify easily links between their local communities and Derby City Centre. The identity of the centre should be attractive to the people living in peripheries. Local communities in the suburbs should be the owners of their city's values and also active participants to any changes to landscapes and neighbourhoods. They should be ready to understand that communication between the core area and the suburbs should be kept uninterrupted at all times; people need to socialise and communicate during all their day-to-day activities. Seclusion means boundaries which always create and reinforce so many problems, including those of mental health and criminality at the top.

CASE STUDY 1: Is Derby City a livable city?

Sara Butkiewicz-Stepień explored ideas related to what makes a city livable by researching on recent developments in some European cities; she was particularly attracted by Copenhagen. At the very front of her work shown in her folder, Sara declares that this project has offered her the opportunity to discover new ideas for life. She affirms that *"the stimulation of our senses is the key to enjoy the world we live in and appreciate everything it has to offer. The design field is one of the most powerful tools to achieve it. Staying conscious as a designer is necessary to be able to create useful spaces that can make people happier."*

The student acknowledges that working on urban regeneration ideas for Derby has been a great journey; she says that she has tried to show to the people the beauty of this city and encourage them to enjoy what is in offer as well. She claims: *"I believe that Derby is a place with a great potential to become a livable city."* She thought that this should be a valued outcome for the entire Derby society, including all communities and people of all ages. The student wants to attain aim and objectives of the project, as they have been introduced in the module and assignment handbooks. She refers to one main issue raised by primary research carried out by the entire team (tutor and all students-participants): lack of connection between the city centre and its immediate suburbs.

Sara feels strong about this and she believes that it is also important for the following reasons:

- Connecting the suburbs to the city centre should make it easier for people living in the outskirts to commute and enjoy social and cultural life.
- Whereas connecting the city centre to the suburbs should give access to citizens to quiet green areas; it would be an opportunity to discover other surrounding areas of Derby, which finally could add value to its centre itself.
- Communities should be encouraged to take part in Derby social and culture life through nature, technology and/or leisure focused activities.
- Derby should be explored and enjoyed as a fully accessible and pleasant city.

Sara has explored the livability of Derby by focusing on and summarizing main statements which describe a livable city; a livable city should:

- Protect the history, neighbourhoods and the environment;
- Provide accessibility and connections of neighbourhoods;
- Appreciate local products and support and invest in people;
- Be affordable, proactive, and walkable and plan for the future.¹⁷

Evidently, Sara's thoughts were explained better in her proposal about uninterrupted bicycle routes which were supported by easy access to public transport and safe pedestrian areas. She was concerned about the quality of life of the citizens in modern times. Therefore, she considered the notion of livability in her discussion and final scheme proposed. Her research focus was on livable cities by exploring cities which were classified as the most livable cities of 2017 in Mercer's 19th annual *Quality of Living* ranking.¹⁸ According to Mercer's survey, *"despite increased political and financial volatility in Europe, many of its cities offer the world's highest quality of living and remain attractive destinations for expanding business operations and sending expatriates on assignment."*¹⁹ Ilya Bonic, senior partner and president of Mercer's Career business affairs that, *"in uncertain times, organisations that plan to establish themselves and send staff to a new location should ensure they get a complete picture of the city, including its viability as a business location and its attractiveness to key talent."*²⁰

Obviously Sara is aware that Derby has already started marketing itself as a city aiming at high quality of life for its citizens in many occasions. Derby is the city of people who wish to prosper by working in manufacturing and investments sector; yet again people moving in the city may wish to populate suburban areas, which have been abandoned in years of economic crisis and shrinking of the industry. Thus, Derby should now strive to be nominated as a livable city. In Mercer's ranking, cities around the world are considered and challenged against multiple factors, such as the economic and political environment, infrastructure, public transportation, health, ecology, housing and leisure.

The top twenty livable cities in 2017 have put a lot of effort in the development of ecological living, connection of neighborhoods and happy living as a whole. Amongst these top twenty cities, in ninth place we find Copenhagen characterised as the one of the greatest food focused cities. However Sara was impressed and inspired by its urban planning and growth; she used it as her main case study and precedent for both Derby City Centre regeneration and connectivity proposal with bits suburban areas, such as Normanton. According to Sara, Copenhagen shows as active, colourful, creative and sustainable with its main focus in bicycle transportation via accessible and safe routes, therefore, encouraging people to a healthy lifestyle and commuting across the city in a fast, easy and enjoyable way.

People on bicycles, pedestrians and boat travellers have the opportunity to enjoy green spaces, heritage, local products, and innovation in architecture and planning in a relaxed way. The way in which this student saw Derby developing is almost identical to what Copenhagen has achieved; at first, bicycle routes should be re-defined and expanded in all directions. Green infrastructure, such as parks, for example, Markeaton Park or other green areas such as Shaftsbury area in Normanton or in areas along the Derwent riverside should be re-developed. Figure 1.



Figure 1 Exterior view of the Market Hall Square annex. Daylight and Artificial LED lighting at night.

Courtesy: Sara Butkiewicz-Stępień

Sara has considered five areas in Derby: the green (Markeaton Park, contiguous to the University of Derby campuses), the fun (Derby City Centre), the quiet (Riverside), the technology and business (Pride Park), and the multicultural (Normanton). All these areas should be connected with revamped pedestrian and bicycle routes and linked to public transport as an integrated system of connectivity of all neighbourhoods. The identity of Derby as a healthy city should expand across its whole territory and would also welcome visitors, being encouraged in the same way as the locals to bring their own or rent a bicycle at Derby.

Sara believes that making people happier should not be limited to the regeneration of buildings of any kind in Derby; she affirms that being “healthy is [feeling] happy.” Public health should be high up in the policymakers’ agenda; nature should be introduced in all areas as healthy living. Thus, in her project proposals, not only nature entwines traditional with modern architecture in the city centre, but also makes a statement in the peripheries by reinventing spaces and places, such as Shaftsbury area in Normanton, for example.

This student has managed to add value to the Old Market Hall at the centre of Derby by designing an annex to that and reinventing the surrounding urban space. Here, the paths of citizens and visitors meet or cross either indoors or outdoors; the proposed interpretation of public space can easily attract people to enjoy the city; perhaps citizens are now convinced that this concept could easily expand in their suburban areas. Added value to real estate means getting people feeling happier and healthier in any part of a city and in any moment of their life. Figure 2.



Figure 2 Interior views of the Market Hall Square annex. Dining and seating areas. Courtesy: Sara Butkiewicz-Stępień

By referring to her project ideas for Derby City Centre and its transferable features of a livable city to the suburbs, Sara affirms that:

The building concept proposed as my final bachelor's degree project is a result of detailed research, consisting of the precise study of the site itself, Derby city centre, architecture as well as the cultural, social and business aspects. The site is located between the back of the Quad and Market Hall. The idea behind the design of the building itself is the result of 'place-making' concept interpretation. What exactly does this mean? In architectural and urban design it is the respect to the existing surroundings, the ability of the building to 'blend in', but on the other hand to stand out without creating chaos.

Place making is the ability to create an inviting space for its users that is both hybrid and liveable. The proposed building is a result of incorporating the above. The multi-purpose space consists of the winery, wine and deli store and an open plan restaurant and bar on the ground floor. The first floor of the building is an open space, used mostly for temporary art exhibitions, art shows or other public or private venues. The exterior of the building is the extension of the interior space. Thanks to the translucent walls, there is no strict division between the two areas. The greenery wrapping the steel structure and green walls create the image of harmony and cosiness, both inside and outside of the building.

Although the design of the building extremely differs from the structures it is being surrounded with, it fits perfectly with them. Thanks to the translucency, greenery wrapping multiple linear components (almost like grape vines wrapping wooden poles), additional seating and multi-dimensionality, the building becomes a lively place, inviting to be discovered in a number of ways, indoors and outdoors.

CASE STUDY TWO: Does Derby City lack identity?

Will Bywater struggles a bit to find out evidence of a particular identity for Derby. He says that, as it looks, *“Derby lacks identity. The small county town with a city status has a clear issue with its identity. The city plays with several individual identities, such as Joseph Wright’s hometown, its engineering and rail industries, and its relationship to the Peak District. However none of these sections of Derby’s character resonate with the majority of the local population.”*

Will has identified at least three points of interest in need of redevelopment in the city centre: the Assembly Rooms, Middleton House and the Market Hall. He has been mainly attracted by the Market Hall as well. Although currently this building is underused, Will has been fascinated by this building in such a way that he believes it has got *“the potential to bring surrounding communities into the town centre.”* He also affirms that the Cathedral Quarter, which is close to the Market Hall, contains some of the most visually stimulating streets in the city centre. According to him, this would be a great area to develop Derby’s character and identity: *“It should be used to help bring the communities of Derby together.”* He also admires the Market Hall building: *“The Market Hall was once the gathering place of the public due to the trading held in that kind of space.”*

Being inspired by the main lectures’ content, Will read more on people’s place attachment theory; he understood that place attachment is the emotional bond between person and place, which is the main concept in environmental psychology; he found out that there is a considerable amount of research dedicated to defining what makes a place *“meaningful”* enough for place attachment to occur. Since 1991, Schroeder notably discussed the difference between *“meaning”* and *“preference”*, defining meaning as *“the thoughts, feelings, memories and interpretations evoked by a landscape”* and preference as *“the degree of liking for one landscape compared to another.”*²¹

Thus, Will wishes to have communities participating to develop a quite radical idea inside the old Market Hall by proposing its transformation into *“a new and vibrant botanical garden”* with the involvement of the local community. Community members would be encouraged to assist in the design for the landscaping within the botanical gardens, be able to select plants throughout seasons, etc. Along the interiors of the building, some flexible space units could be used as coffee shops or pop up stores. The layout of the proposed Market Hall Botanical Gardens is developed by the meandering shape of the Derwent River, thus, linking the garden with the exterior natural landscape and the community according to the place attachment theory. Figures 3, 4 and 5.



*Figure 3 Interior views of the Market Hall Botanical Garden. Proposed design.
Courtesy: Will Bywater.*



Figure 4 (left) Proposed layout.

Figure 5 (right) Meandering river-shape of the path.

Courtesy: Will Bywater.

Will proposes that the centre of Derby City should get trams re-introduced, by providing more links from the peripheries to the city centre itself. Since there have been advancements in technology since the previous city centre tramway, new transport solutions would be more a sustainable way of accessing the city centre than current transportation of the public by buses or private cars. This would be enhanced by creating more bicycle lanes: *“The introduction of these links to the city would fuse what currently a disconnected city is in relation to its surrounding suburbs and community hubs.”*

Will found that the area between Derby City Centre and Normanton Peartree area consists of predominantly housing and retail centres located on heavy traffic roads. So, Will proposes more efficient tram public transport, so that cars could be avoided. Figures 6 and 7.



Figure 6 (Top) Proposed integrated green infrastructure and tram line (in yellow).

Figure 7 (Bottom) The tram line through Normanton.

Courtesy: Will Bywater.

Then, the concept of the communal garden expands within the residential area of Normanton, as the fragmentation of the back private gardens is eliminated in a very smart way; these spaces will now have the potential to “*bring local communities together in the sharing of whole area than just limited private spaces. This intervention alongside the place attachment theory should increase life quality and will help reduce negative social experiences.*” Figures 8 and 9.

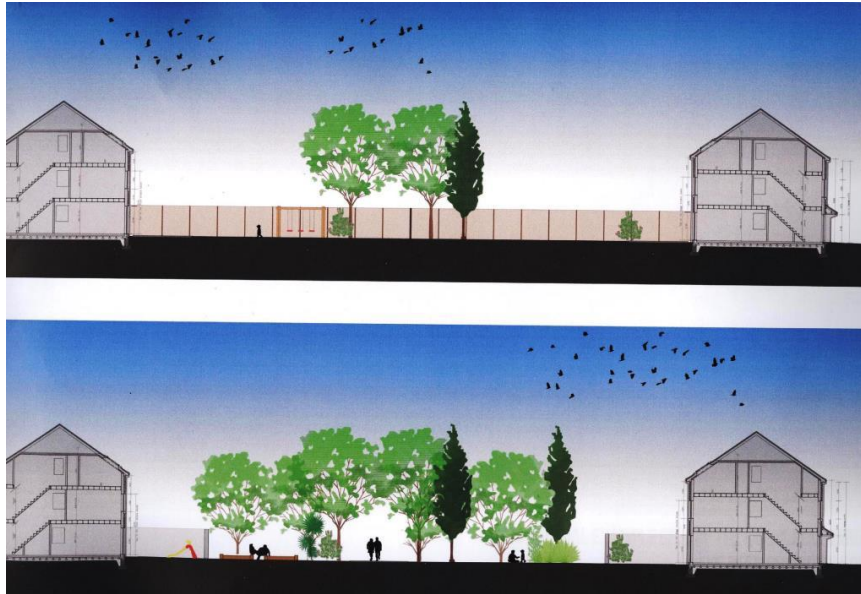


Figure 8 (Top) Enclosed private back gardens.

Figure 9 (Bottom) Proposed semi-private and communal gardens.

Courtesy: Will Bywater.

The proposal introduces more pedestrianised areas within the city centre as well as green infrastructure, which links the residential areas with the centre of the city. The proposed communal back gardens in between housing coincide with this green infrastructure; they are proposed as such space to improve local communities’ well-being and combat crime and other negative issues. Figure 10.



Figure 10 Communal gardens self-maintained by the local community. Courtesy: Will Bywater.

CASE STUDIES THREE AND FOUR: Energising urban space by applying Biophilia

Elena Luca refers to the past of Derby as a vibrant town with its Market Place uniting the local communities on many special occasions; she has recognised the fact that nowadays this is no longer the

case: *“The Market Place has become a dull and unpopulated place, having the Intu Shopping centre become the main and sole destination point within Derby City centre.”* However, Elena has faith to the Masterplan 2030, which focuses on the regeneration of Derby as a whole by considering all suburban areas to be re-connected with the city centre and bringing communities together once more. The aim is to transform Market Place and surrounding areas into dynamic and eventful places and spaces. Elena decided to focus on public movements and flows, enhancing of Biophilic properties and connectivity and add value to Heritage and other assets within Derby.

Elena proposes the creation of various social and interactive opportunities to be introduced within the Market Place area in order to attract not just the local people, but also visitors and, in this case, growth and prosperity would be sustained and secured. This student has been proactive to investigate on ‘hidden’ places such as back alleys and courtyards and get them back to the attention of both residents and passers-by. She showed sensitivity about safety and comfort of the users of abandoned and rundown areas, which exist either in the city centre or in the suburbs, such as Normanton.

This student found out that: *“Derby City possesses a wide variety of historic and full of character buildings which enhance the unique ‘quirky’ style it has been developing for years. Unfortunately, there are a lot of buildings and areas which have been to deteriorate. This aspect began creating hidden pockets which are now unpopulated; they attract anti-social behaviour and contribute towards the recent increase in crime rates.”* Elena finds that Derby centre lacks of green infrastructure and relaxing areas, and especially the Market Place lacks of pleasant and attractive urban design, with no pleasant artificial lighting at nights or outdoors furniture for the people to rest and socialise eventually. She also finds that some areas have pedestrian routes, but often disturbed by noise from traffic. Figure 11.

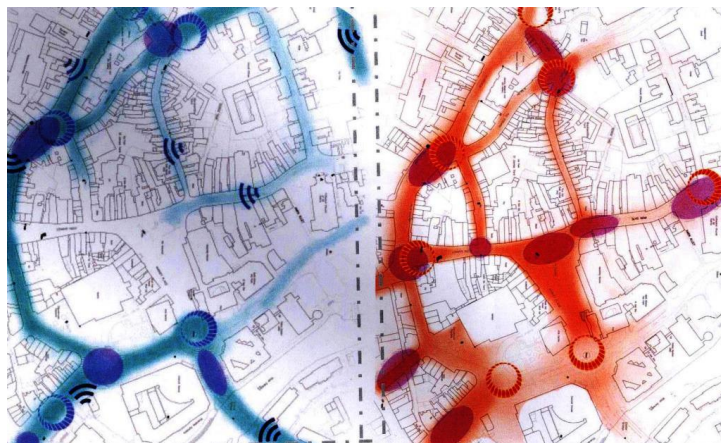


Figure 11 Noisy car traffic (on the left) and pedestrian routes (on the right).
Courtesy: Elena Luca.

Elena’s ‘Vision’ is to promote Derby as *“inviting, interactive, illuminating, colourful, sustainable, exciting, green and connecting.”* She is aware that Derby City centre has started becoming counter-urban in relation to current tendency of people to move out of cities towards the surrounding areas and secluded, exclusive suburbs in general. Urban areas are becoming increasingly unpleasant places to live. People are now working from home with the use of technology; new businesses appear at the edges of cities. People prefer to live on the outskirts of cities; they no longer have to travel to the city centre. At the moment the daily population within Derby centre is decreasing, while in the suburbs there is a steady increase.

This student explored more the fact of emergence of certain urban morphology named as ‘pod’ developments; that is dense blocks of buildings with certain allocated spaces, such as parks and playgrounds. This is the case of buildings defining space rather than buildings in space. In a typical urban setting, the buildings tend to be built directly adjacent to one another, the walls of which act as limitations of the open space. With time, an urban transformation occurred, accommodating new forms of transport and pedestrian access; streets began expanding, introducing selective widening, waiting restrictions, one way roads, etc. for quicker and easier flow. This fact has affected the building patterns,

thus, creating more dense blocks of buildings, the so-called pod developments, which are also obvious in Derby City and suburbs maps.²²

Having attended lectures on Biophilic Design and Biourbanism, Elena was further attracted by the principles and practices of them, the main aim of which is to respect the mind-body systems as indicators of health and well-being. *"Above all, Biophilic design must nurture a love of place."*²³ Elena affirms that environmental generational amnesia could be also a serious issue affecting people living in urban areas which have no or very limited memories of the real natural environment. Thus, Biophilic design is a way of helping the community reconnect with the natural system and reinforce the importance of environmental quality. Elena affirms that: *"Biophilic design follows specific patterns, with each pattern being defined by designers; then, it is considered how this pattern may affect the way a space feels, explaining the human biology in connection to the built environment which then will present different opportunities towards new Biophilic design strategies."* She looked at international precedents of tactical and ephemeral installations, such Melbourne Pavilion, an artificial forest installation for events in open space or other public space community involvements, such as the Backyard Experiment (Australia).

Elena also feels that, similar interventions/tactical/guerrilla urban designs including fun furniture and popular art could also transform Derby by transforming hidden alleyways and abandoned piazzas into safe, inviting and exciting places. Being directly involved, the local community would enjoy team fun and colourful atmosphere. The student proposes fun furniture designs in Derby piazzas, outdoors easy-to-use equipment and pop-up structures around the Market Place to be used regularly in order to shelter various activities, from DIY workshops to playground and even space for public lectures and live bands. Figures 12 and 13.



Figure 12 (Left) Proposed solution for empty internal courtyards.

Figure 13 (Right) Ephemeral pop-up construction example.

Courtesy: Elena Luca.

She also feels that artificial lighting, as an illuminating forest, could create attractive compositions and safe trails all around dark and currently unsafe areas. On special nights, these lighting trees, especially in Normanton, could change colour and intensity to grab more attention and add fun. Figure 14.



Figure 14 Illumination trail across the city and the suburbs.

Courtesy: Elena Luca.

Finally Patricia Nimo proposed ideas *“to instil a sense of pride within the community through a grass roots action plan of colour and play...a people-sensitive approach will be taken to address the needs of those in some particular area. Public spaces can change perceptions and encourage unity in areas that seem to be rundown.”* Patricia affirms that: *“by collaborating with artists, designers, specialists, experts and the general public, this scheme aims to tackle the problems that underdeveloped areas create, such as crime and vandalism, threats to safety and lack of pride. Using public realm interventions of art, sculpture, colour and play, the overall aim is to encourage people to engage with the built and unbuilt environment in which they live.”* Figures 15 and 16.



Figure 15 (Left) Revitalising pedestrian routes- 'The Heart Of Derby'

Figure 16 (Right) Low-cost playful tactical installations.

Courtesy: Patricia Nimo.

Patricia has explored ideas through sketches and colour. She proposes urban design tactics of low cost and sustainable in any given context. She says that *“urban design has the potential and the ability to change people’s perceptions, to give life back, to improve the aesthetic quality of a space and place with minimal cost implications.”* Her proposal for the centre of Derby should be mirrored in similar interventions at Normanton; people will start populating all streets again, not only big shopping centres. By encouraging community participation in the centre of the city, she believes that people from the suburbs will be able to appreciate the history, the past and a playful present. Figures 17 and 18.



Figure 17 (Left) Revitalising empty squares.

Figure 18 (Right) Low-cost colourful playground and relaxing area.

Courtesy: Patricia Nimo.

This student’s vision is that regeneration programmes should target young people in the peripheries to design and play in sustainable and safe community public spaces. Education is a vital part of this process; the community should be able to understand the built environment in which they live. She suggests a bottom-up approach to blur the lines of politics within architecture and urban design; everybody would be able to co-create in order to generate a livable city for all residents. Family oriented activities should be introduced within the city streets and ongoing year round activities should bring residents from the

suburbs into the city centre. And we should encourage youths from the suburbs to engage in community led activities by giving them active paid roles. Temporary installations hacked into open public spaces should be devoted for game for locals and visitors (spontaneous and non-lucrative use). Local businesses could also help people with provision of cheap materials to co-create playful and relaxing places. Tactical design should also keep people healthy and fit in body and mind.

CONCLUSIONS

It is understandable that education should be at the heart of any participatory initiatives as a start. As a first attempt and trial, during the delivery of the module mentioned above, the author and her students had started some contact with some representative from a group of local youths in order to investigate on the needs and urgent necessities of the younger generations living in that suburban area. On this occasion of her teaching activities for this module, she was able to get her students motivated on the real issues in that area. Students and locals should participate actively in the social and urban regeneration of those areas, if we wish to get a real impact with all scheduled future and ongoing interventions and events. Social and educational activities can be eventually organised/coordinated and supervised by academics; innovative methods and tools of e-planning are going to be used for research and proposals in the near future, and follow-up projects year-by-year. Thus, all sides will benefit from learning skills at a variety of levels; activities of urban acupuncture and co-working spaces have been already discussed. These solutions will not only have youths getting specialist skills, but also be able to feel confident to start their own local businesses and/or carry on with further studies. It is envisaged that ongoing efforts in that way could have a better result rather than penalties, exclusion/expulsions, and perhaps in some cases detention.

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