Sensing Through Impairments

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arcc
building evidence, sharing knowledge

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MOBILITY, MOOD AND PLACE – MAKING THE ENVIRONMENT EASY, ENJOYABLE AND MEANINGFUL FOR OLDER PEOPLE.

THE OLDER SOMEONE IS, THE MORE LIKELY THEY ARE TO HAVE BOTH A VISUAL AND A HEARING IMPAIRMENT.

WHAT PROMOTES ACTIVE AGEING?

PUBLIC KNOWLEDGE ABOUT WHAT IT MEANS TO BE 'AGE FRIENDLY' IS LIMITED AND FOCUSES MAINLY ON THE PHYSICAL NEEDS OF OLDER PEOPLE....

environment · well-being · health

UNPICKING THE LINKS

WORKING WITH STUDENTS TO CO-DESIGN WITH OLDER PEOPLE

GETTING "END USERS" INVOLVED FROM THE VERY OUTSET

SHARING MEMORIES

INFORMAL WALK INTERVIEWS WERE THE MOST SUCCESSFUL AND WERE USEFUL TO CAPTURE IMMEDIATE RESPONSES TO A PLACE.

PEOPLE'S RELATIONSHIP WITH PLACE IS TRANSACTIONAL.

EEG HEADSET

MEASURING
- FRUSTRATION
- EXCITEMENT
- ENGAGEMENT

98 PARTICIPANTS

WALKING ALONE FOR 20 MINUTES

ANALYSING BETA WAVE PATTERNS

FLAVOUR Sense Nation

DEHYDRATED WATERMELON

CHRISTIAAN ZANDSTRA

ACCESSIBILITY AS HERITAGE

PART OF THE "ARCHITECTURE FOR ALL" WORKGROUP

A WORLDWIDE EMANCIPATION OF DISABLED PEOPLE

THIS DEVELOPMENT NEEDS TO BE EXPRESSED IN OUR BUILT ENVIRONMENT

ARTENA, ITALY

SMOOTHER PATHS IN MATERA TO BE VERSATILE!

INTERVENTIONS CAN BE SUBTLE OR SOMETIMES QUITE PROFOUND...

WHEELCHAIR LIFTS IN BERLIN

TACTILE MAPS IN MILAN

2016 WINNER

OR EVEN RADICAL...

THE LOUVRE

ARCHITECTURE AND LANDSCAPE ARCHITECTURE STUDENTS FROM UK UNIVERSITIES

HUGE DIVERSITY IN HUMAN FUNCTIONING. YET BUILDINGS ARE ALWAYS STANDARDISED

SEMINDER · ACCESS CITY

ACCESSIBILITY DESIGN AWARDS

BERLIN CREATED AN ACCESSIBILITY DATA BASE 2013 WINNER

A GREAT WAY TO PROMOTE NEW ACCESSIBLE DESIGN IDEAS!

JEAN HEWITT

CENTRE FOR ACCESSIBLE ENVIRONMENTS

MAKING SENSE OF PUBLIC SPACES

HEARING LOSS – A HIDDEN DISABILITY THAT CAN OFTEN BE OVERLOOKED....

OVER 11 MILLION SUFFER HEARING LOSS

1 IN 10 OF US HAVE TINNITUS

8 IN 10 PEOPLE WITH HEARING LOSS EXPERIENCE ALSO EAR (AUDITORY) PROBLEMS

ALSO... TINNITUS BALANCE PROBLEMS HEIGHTENED HEARING

WHAT ARE THE ISSUES?

- HEARING VEHICLES APPROACHING (including electric)
- CAN BE MORE SUSCEPTIBLE TO TRIPS AND FALLS DUE TO SENSORY OVERLOAD
- BACKGROUND NOISE CAN'T BE EASILY CONTROLLED.

DO WE PLACE PEOPLE WITH HEARING DIFFERENCES AT THE HEART OF THE PROCESS?

BUILDING FRONTAGES THAT CAN OFFER SUPPORT

CLEAR DEMARCATION OF KERB EDGES

SOLUTIONS

CLEAR SIGNAGE

UNDERSTANDABLE ENVIRONMENTS

CHOICES

GOOD STREET LIGHTING FOR LIP READING

CONTROLLED CROSSINGS

NONE OF THE SOLUTIONS ABOVE HAVE NEGATIVE EFFECTS ON OTHERS

ICAE JOURNAL

INCLUDES AN ARTICLE ON SENSORY DESIGN

feelinggood FOUNDATION

RICHARD MAZUCH

IBI

THINK
- DESIGN RESEARCH & INNOVATION
- DESIGNING TOOLS
- RESEARCH
- THINK TANKS
- CHALLENGES

"HELLO HOLLY, WELCOME BACK!" A NEW DEMENTIA THRESHOLD

25% OF PEOPLE WHO 'WANDER' EXPERIENCE SERIOUS OR FATAL INJURY.

40% OF PEOPLE WITH DEMENTIA GET LOST AT SOME POINT

USUALLY DURING THE NIGHT...

THIS IS HOLLY

POOR EYESIGHT

TROUBLE WALKING

CREATING A SENSE OF ARRIVAL

TECHNOLOGY TO ACTIVATE DOORS

STABLE DOORS

MEASURE BLOOD PRESSURE

MEASURE HEART RATE

WE LOOKED INTO WEARABLE TECHNOLOGY

HOW CAN WE DESIGN FOR DARKNESS?

LIMINAL SPACE

CANOPIES · TERRACES · BALCONIES · BAY WINDOWS

SIGNALS WHERE YOU ARE AND WHERE YOU ARE GOING...

INTERACTIVE WALKING STICK.

WANDERING ROUTES

DOOR ACTIVATED BY TECH · PRESSURE MAT · LIGHTING ACTIVATED BY WEARABLE TECH

HELLO LOVE. WELCOME BACK! WOULD YOU LIKE A CUP OF TEA?

WELCOMING SOUNDBITE

MARCUS WILSHERE

SPACES ARE BECOMING MULTIFUNCTIONAL THEY NEED TO BE...

RESILIENT

TO PROTECT CITIZEN AND THEIR ENVIRONMENT AND RESPOND TO THEIR CHANGING NEEDS.

INTELLIGENT

TO EMPOWER THE CITIZEN BY INTEGRATING ASSISTIVE TECHNOLOGIES FOR CITIZENS AND CITY MANAGEMENT

HEALTHY

TO PROMOTE THE CITIZENT WELLBEING AND INDEPENDENT LIVING.

THE FINDINGS WILL BE WRITTEN UP INTO A BOOKLET

BETTER CONNECTED BETTER CHARACTER BETTER COMMUNITY BETTER QUALITY

A DAY IN THE LIFE – CARE, TECHNOLOGY AND WELL-BEING IN SOUTHEND

QUEENSWAY

EXPLORING WAYS TO ADD VALUE TO THE AREA

FOR THE COUNCIL · FOR THE MARKET · FOR THE CITIZEN

"Tackling quality of life head on"

HOW CAN A BETTER PLACE CONTRIBUTE TO A BETTER QUALITY OF LIFE FOR A WIDE RANGE OF LOCAL PEOPLE?

QUEENSWAY CHARACTERS

THE SINGLE PARENT · THE NEWCOMERS · THE TEENAGER

MAPPING A TYPICAL DAY...
- WHERE DO THEY GO?
- WHO DO THEY MEET?
- HOW DO THEY GET AROUND?
- WHAT CHALLENGES DO THEY FACE?

THE ELDERLY PERSON · THE LONGSTANDING QUEENSWAY RESIDENT

COUNCIL ESTATE

"BETTER HOUSING BETTER LIVING BETTER PLACE"

HUGE HIGHWAY

POOR REPUTATION

ROAD NOISE

CAN'T OPEN WINDOWS AS EVERYTHING GETS COVERED IN DUST!!

DISCUSSION

TINY PEOPLE IN THE UK HAVE A MENTAL HEALTH ISSUE – HOW CAN CO-DESIGNING HELP?

SO OFTEN WE SEE CO-DESIGN AS A TICK BOX EXERCISE...

THOSE WHO COMMISSION BUILDINGS MUST UNDERSTAND CO-DESIGN IS AN INVESTMENT

THE STUDENTS THAT PARTICIPATED IN THE WALKING INTERVIEWS REALLY APPRECIATED THE CO-DESIGN. GREAT IN EDUCATION BUT MIGHT BE A SHOCK AT THE LACK OF IT IN A REAL JOB.

THE CHANGES NEED TO BE DONE AT POLICY LEVEL

NOT ENOUGH QUESTIONS BEING ASKED

THE ECONOMIC ARGUMENT FOR CO-DESIGN IS NOT KNOWN WELL ENOUGH...

WE KNOW NOT GOING OUTSIDE IS BAD FOR YOU... BUT WE NEED A QUANTIFIABLE WAY OF CREATING EVIDENCE TO JUSTIFY IT.

IF SOMETHING BECOMES VISIBLE THEN THE PROBLEM BECOMES VISIBLE – SO A SOLUTION CAN BE CREATED AND IT BECOMES EASIER TO LEGISLATE

HOW CAN WE TAKE ACCESSIBILITY IN HERITAGE FORWARD?

WE SHOULD SEE ACCESSIBILITY AS A CHALLENGE... THAT'S WHY THOSE AWARDS ARE SO GREAT!

WE NEED TO LOOK AT THE INDIVIDUAL AS THERE IS SUCH A WIDE RANGE OF OPINIONS ON WHAT MAKES A GOOD SOCIAL SPACE.

FUNDAMENTALLY A SPACE FOR POSITIVE SOCIAL INTERACTIONS

BEING ABLE TO CONTROL THE SPACE WILL CREATE MORE EQUAL ENVIRONMENTS

WHAT OPPORTUNITIES ARE THERE...

MORE RESEARCH INTERVIEWS

CARS & TRAFFIC

STREET LIGHTING IS A PRIMARY OPPORTUNITY

IBI

MENTAL HEALTH LEAD AT IBI GROUP

WENDY DE SILVA

CHAIR

ROSS ATKIN

BRIGHTER STREET LIGHTING

MARSHALL RESPONSIVE FURNITURE

AUDIO INFORMATION WHEN USER WALKS PAST

ENABLING TECHNOLOGY: ANY DIGITAL TECH WHICH EMPOWERS DISABLED PEOPLE TO LIVE MORE INDEPENDENTLY.

WHAT I LEARNED FROM SHADOWING DISABLED PEOPLE...

SIGHT LINE 2009

SHADOWED 8 PEOPLE WHO ALL HAD LOW VISION ON THEIR REGULAR ROUTES...

HUGE AMOUNT OF DIFFERENCE BETWEEN EACH PERSON.

SIGHT LINE

STILL AVAILABLE ONLINE

CITY OF YORK

SHADOWED PEOPLE WITH A VARIETY OF DISABILITIES

MANY STREET FEATURES AFFECTED THEM ALL

SAW AN OPPORTUNITY TO TAKE ON ROADWORKS

MOST FREQUENT CAUSE OF ISSUES

DESIGNED A NEW TYPE OF BARRIER

DIGITALLY ACCESSIBLE INFORMATION

HIGH CONTRAST VISUAL INFORMATION

TACTILE INFORMATION

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