# PLACEMENT REPORT --- Questions, Reflections, Flows and Relations

# contents

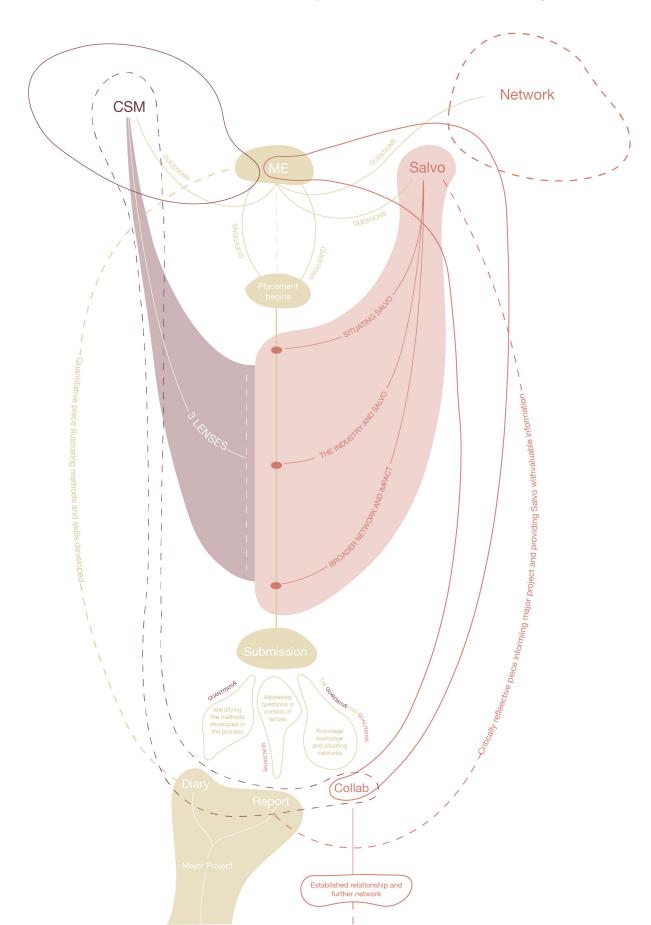
introduction to placement	3
submission package	3
placement locations	4
why salvo?	5
entering the placement period	6
approach to structure	7
identifying questions	8
working with salvo	10
industry research questions (large scale)	
market research (small scale)	28
situating salvo_tr pathways launch	
situating salvo_circular economy week	40
collaborative piece	44
activity	
tapestry	48
reflecting on placement period	
references	52

diary video link

https://youtu.be/045ZgjlgBCk

# submission package

The Placement submission package contains three components; the report, the diary and the collaborative piece. This report investigates the networks of Salvo and the context within which they operate. The structure of the report takes a more critical approach posing questions which have resulted from conversation and observation of the processes of Salvo and the industry we work in.



# placement locations

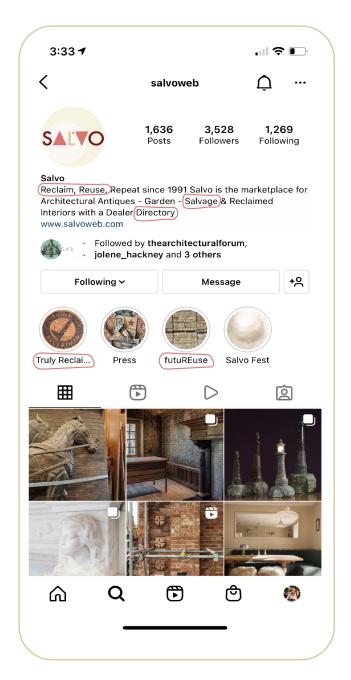
Salvo work from a variety of locations in the UK, due to the nature of their work. Their platform facilitates research, provides accessible information about reclaimed materials, supports traders in different locations around the UK and is a hub for their directory. Working around this platform allows them to branch out and connect with more people in their industry.



# why salvo?

I first came across Salvo on instagram, I was drawn to their directory and the research they have contributed towards in the industry. It was interesting to observe the variety of their network.



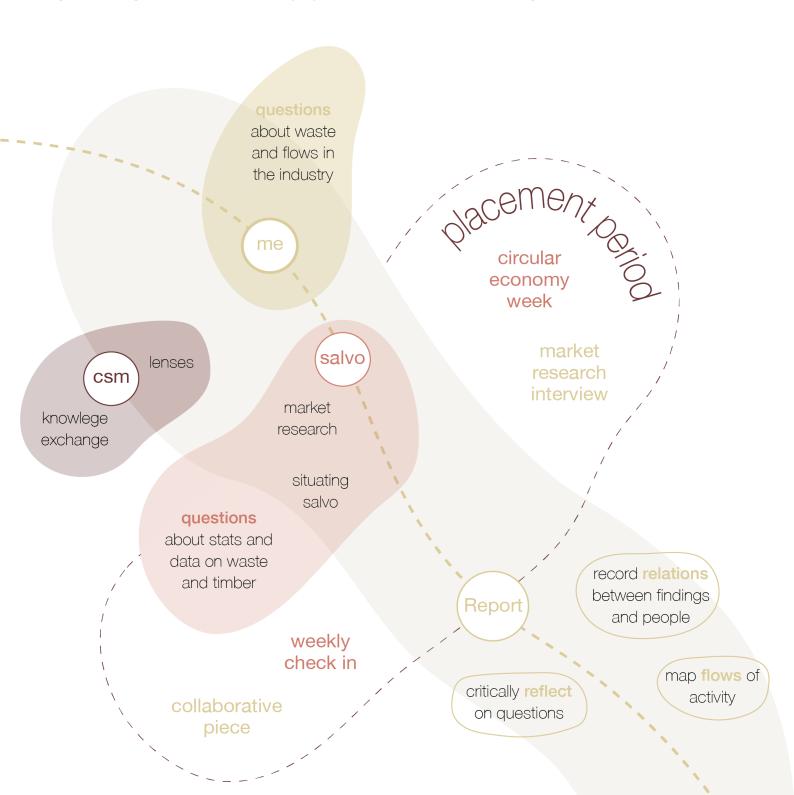


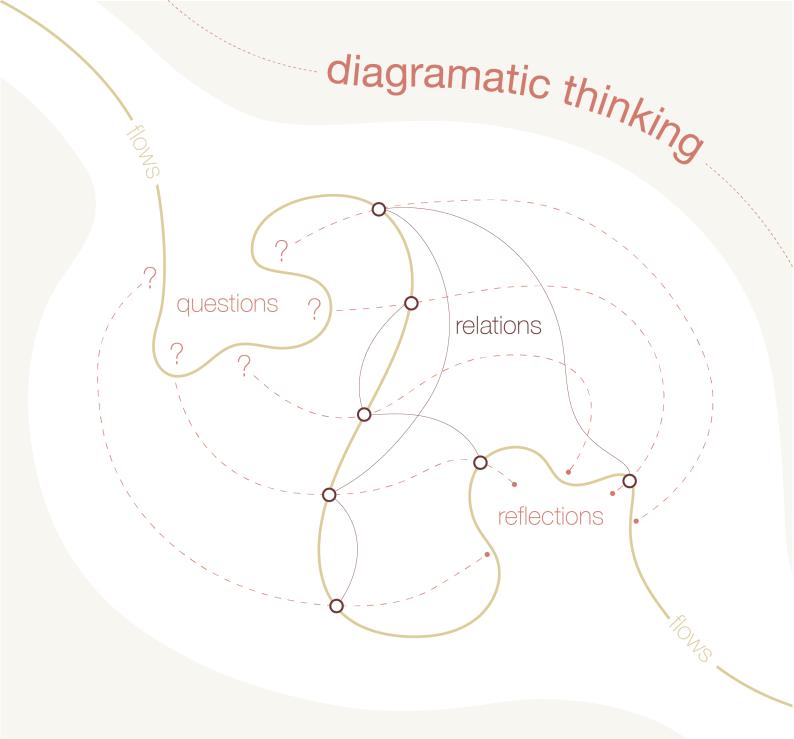
I reached out to Salvo to share my interests in waste flows and networks, and soon spoke to Sara and Becky at Salvo to discuss what we could work on for the 6 week placement period. We set a rough brief looking at 3 scales of impact. This included looking at Salvo and mapping their existing network and directory, looking at

market research in the hospitality sector, and then observing the wider context of the construction industry and how it deals with waste and material flows. The varying scales allowed me to observe how Salvo works internally, as well as understanding where they find themselves in the larger context of our industry and network..

# entering the placement period

Throughout the placement period I was keen to establish a method for measuring and reflecting on data. When exploring waste flows and data in Unit 1 I quickly discovered that information about waste and statistics in general are quite misleading and not very easy to understand in a way that makes it possible to reflect on this information in practice. It is often difficult to measure the impact of the work we produce, with Salvo I was intrigued by their network and the way in which they situate themselves in a larger context. It lead me to explore how a network and the knowlege exchange within this network can become a way to measure impact. Typically when it comes to the construction industry it is easy to observe the lack of knowlege exchange and overuse of very specific statistics when referring to broad issues.

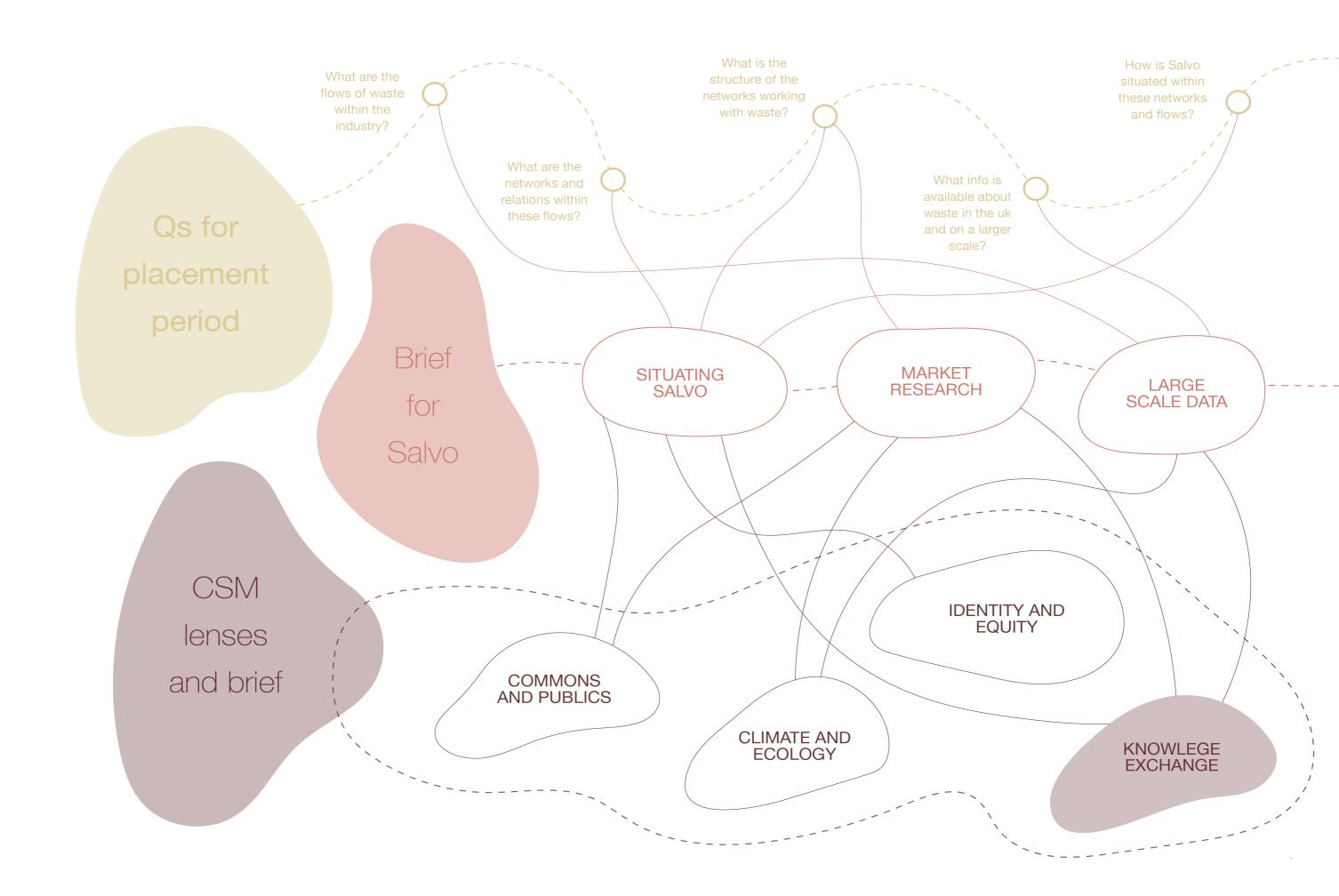


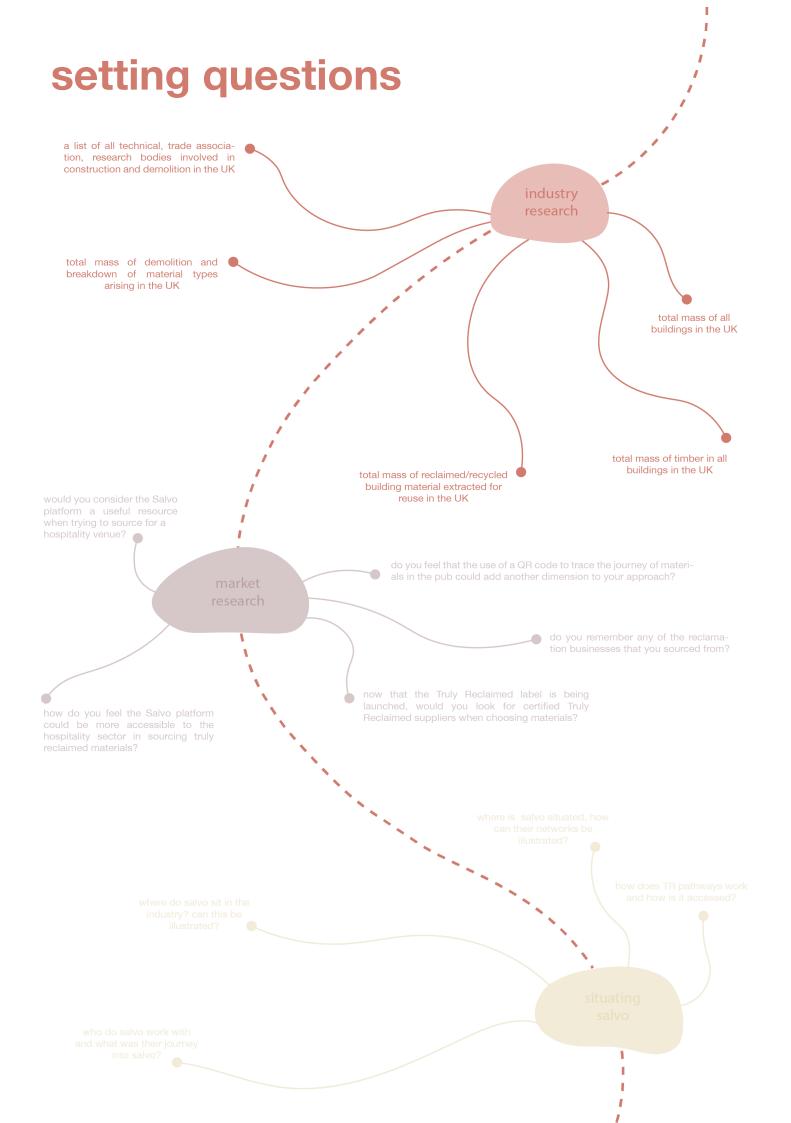


# approach to structure

In order to begin reflecting on the broad issues in our industry I wanted to set myself a structure to follow when critically reflecting on observations. At the start of the placement period I found myself with lots of questions, this included questions of my own, as well as questions set by Salvo; all to be considered within the context of the lenses of Identity & Equity, Climate & Ecology, Commons & Publics. The use of big data and statistics by the government can be misleading and therefore be seen related to issues of social justice. Big data and technology can reinforce existing inequalities and cause more harm. Information is not transparent and therefore it becomes hard to situate yourself within the discussion. The way in which Salvo works intersects this space between civil society, government and business allowing them to broaden their networks and share knowlege with a creative approach. Creativity is important in diverting away from an existing linear dependancy between research and policy informing one another, and providing a more circular framework.

# identifying questions





- a list of all technical, trade association, research bodies involved in construction and demolition in the UK

# WHO IS INVOLVED IN CONSTRUCTION

# AND DEMOLITION IN THE

?

Adjudication Society (AS) • Advisory Committee for Roofsafety • Advi-

tioning and Refrigeration industry Board \* Air Tightness Testing advanced tion (ATA) \* Allaros for Sustainable Building Products (ASBP) \* Allaros for Sustainable Building Association \* Allaros for White Products (AVB) \* Architects (AVA) \* Architects Association of Ireland (AVA) \* Architects Beaverlant Society (ASB) \* Architects Council Europe (ACB) \* Architects Decime \* Architects (AVA) \* Architects Council Europe (ACB) \* Architects Decime \* Architects (AVA) \* Architects Council Europe (ACB) \* Architects Decime \* Architects (AVA) \* Association of Ireland (AVA) \* Architects Decime \* Architects (AVA) \* Association of America (AVC) \* Association for Consultancy and Englering (ACE) \* (ACB) \* Association for Environment Conscious Building (AECB) \* Association for Froject Maragement (APA) \* Association for Project Staffy (AVA) \* Association for Specialist Froject (AVA) \* Association for Building \* Association for British Froject (AVA) \* Association for Concrete Industrial Floring Contractors \* Association of Constitution Products and Supplies\* (became the Constitution Frojects (AVA) \* Association for Concrete Industrial Floring Contractors \* Association of Constitution Products and Supplies\* (Became the Constitution Frojects (AVA) \* Association of Supplies\* (AVA) \* Association of Humilians\* (AVA) \* Association of Supplies\* (AVA) \* Association of Humilians\* (AVA) \* Association of Supplies\* (AVA) \*

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Foam Manufacturer's Association
• British Stainless Steel Association
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\*\*Under and Pipes • British Stainless Institution
((b8) • British Turnelling Society • British Stain Society • British Stain Statish Sta

Association (BURA) . British Wind Energy Association . British Industry Federation • Builders Merchants Federation • Building 8 Engineering Services Association (B&ES) • Building Control Aliance • Confederation (BEC) now defunct . Building Engineering Services Accreditation (BESCA) • Building Owners and Managers Association International (BOMA International) • Building Safety Alliance • Buildings Performance Institute Europe (BPIE) • Building Services (part of the BRE) • BuildingSMART • Business Sprinkler Alli (BSA) . Carbon Trust . Cavity Insulation Guarantee Agency (CIGA) . Centre for Digital Built Britain (CDBB) . Centre for Economics and Steels (CARES) . Chartered Association of Building Engineers (CABE) titute of Architectural Technologists (CIAT) • Charter Institute of Building (CIOB) . Chartered Institute of Ecology and Envi ntal Management (CIEEM) . Chartered Institute of Housing Chartered Institution of Building Services Engineers (CIBSE) • Char-Institute (CQI) • Chartered Society of Designers • Charte (CBCA) . Council of the Heads of the Built Environment (CHOBE) . National Safety Group (CONSG) . Closed Systems Control Associa Maintenance through Innovative Technologies (COMIT) • Composite Society . Confederation of Timber Industries . Conference on Training in Architectural Conservation (COTAC) • Construction Wales Inno tion Centre (CWIC) . Continental Automated Buildings Associatio CABA . Contractors Legal Group (CLG) . Constructing Excellence . ment Association (CEA) . Construction Federation . Construction Fixings Association (CFA) . Construction Health and Safety Grou (CHSG) . Construction Industry Board (now the Strategic Forum for Construction) • Construction Industry Council (CIC) • Construction cil (CUC) . Construction Industry Research and Information Associa · Construction Industry Training Board (CITB) · Construction Institute Construction Knowledge Task Group (CKTG) 
 Construction Lead struction Products Association (CPA) . Construction Project Informa ion Committee (CPIC) • Construction Scotland Innovation Centr (CSIC) . Construction Specifications Institute (CSI) . Constructio Task Force . Construction Youth Trust (CYT) . Consultant Quantity (CCWater) . Core Innovation Hub (CIH) . CoreNet Global, The Global Association for Corporate Real Estate • Council for Aluminium in Building (CAB) . Council of Training in Architectural Conservatio (COTAC) • Contract Flooring Association • Qustom Electronic Design National Infrastructure (DAFNI) . Demolition Contractors' Association Design-Build Institute of America DBIA Digital Framework Task Group (DFTG) Door & Hardware Federation (DHF) Electrical Conation (ECA) • Electric Heating and Ventilation Associa

Engineering Council • Engineering Industry Training Board (ETIB) • European Construction Institute (ECI) • European Council of Interior Architects ((ECIA) • European Loud Roof-ing Association • European Network of Construction Companies for Research and Development (ENCOPC) • European Phenolic Foam Association (EPFA) • Esterior Insulation Members Association (EPFA) • Earthor Insulation Members Association (EPFA) • Foarthor Insulation Association (EPFA) • Foarthor Insulation Members Association (EPFA) • Foarthor Insulation of Enforceming Contractors (EPCE) • Geselved in November 1986 and superseded by the Collegineering Contractors (EPCEA) • Federation of Enforceming Contractors Association (EPCEA) • Federation of Enforceming Contractors (EPCEA) • Federation of Enforceming Contractors (EPCEA) • Finishes and Interiors (EPCEA) • Finishes (EPCEA) • Finishes

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Alliance • Green Business Certification Inc (GBCI) • Green Constru

tion Board • Green Technical Advisory Group GTAG • Ground

Architectural Ironmongers (GAI) . Guild of Builders and Contractors Approval Scheme (HETAS) • Heating, Ventilation and Air Condition ing Manufacturer's Association (HEVAC) . Heating & Ventilating (HHA) . House Builders Association (HBA - part of the National Fed Finance Institute (HFI) • Industrial and Commercial Heating Equipment Association (ICOM) • Infrastructure Industry Innovation Plat . (IOA) . Institute of Air Qaulity Management (IAQM) . Institute of Building Control / Building Control Forum (IBC) • Institute of Clerk of Works (ICW) • Institute of Clerks of Works and Construction Inspec-(ICCP) . Institute of Construction Safety (ICS) . Institute of Corrosion (Corr) • Institute of Demolition Engineers (IDE) • Institute of Ecor ic Development (IED) • Institute of Electrical and Electronics Engineers (IEEE) . Institute of Environmental Management and Ass Engineers (IFE) . Institute of Historic Building Conservation (IHBC) . Institute of Real Estate Management IREM • Institute of Roofing (IoR) · Institute of Specialist Surveyors and Engineers (ISSE) · Institution of Civil Engineers (ICE) . Institute of Construction Claims Practitio Management IWFM . Institution of Engineering and Technology (IET) tion of Electrical Engineers (IEE) - merged with the Institution of Inco porated Engineers (IIE) to form the Institution of Engineering and Mechanical Engineers (IMechE) . Institution of Occupational Safety and Health (IOSH) • Institute of Party Wall Surveyors (IPWS) • Institu-tion of Structural Engineers (IStructe) • Insulation Manufacturers Association • Interlocking Concrete Pavement Institute (ICPI) • Inter Information Society (ICIS) . International Council for Research and Innovation in Building and Construction (CIB - former Conseil Inte national du Bâtiment or International Council for Building) • Interna tional Energy Agency (IEA) • International Factility Management agement (IRSM) . Joint Council for Landscape Industries (JCLI) . Joint Industry Board for Plumbing Mechanical Engineering Services (JIB-PMES) . Joint Taxation Committee (JTC) . Landscape Institute Escalator Industry Association (LEIA) . Local Authorities Building Control (LABC) • London Energy Transformation Initiative (LETI) • Major Contractors Group (Part of the National Federation of Builders) · Major Projects Association (MPA) · Manufacturers of Equipment England (MHFA England) . Metal Cladding & Roofing Manufacturers Association (MCRMA) • Mineral Products Association (MPA) • Modern Built Environment Knowledge Transfer Network (MBEKTN Modular and Portable Building Association (MPBA) 
 National Access And Scaffolding Confederation (NASC) 
 National Approval Council for Security Alarms (NACOSS) . National Association of Engineers (NACE) • National Association of Rooflight Ma National Council of Building Materials Producers (Became the Co (NEDC) • National Economic Development Office (NEDO) • National Examination Board in Occupational Safety and Health (NEBOSH) • National Federation of Builders (NFB) • National Federation of Den tractors Limited (NFRC) . National Fireplace Association (NFA) . ment Council (NHIC) • National H ning Association (NIPA) . National Inspection on (NIA) • National Joint for the Built Environment . Nation-

National Specialist Contractors Council (NSCC) Became Build UK Office of Government Property • Party Wall Academy (PWA) • Passive House Institute (PHI) • Planning Officers Society (POS) • Property Care Association (PCA) • Property Litigation Association Treatments Association (RSTA) • Roof Tile Association • Royal Scotland (RIAS) . Royal Institute of British Architects (RIBA) . Royal Institution of Chartered Surveyors (RICS) . Royal Society for the Wales (RSAW) . Royal Society of Ulster Architects (RSUA) . Royal Scaffolding Association Scottish and Northern Ireland Plumbing Employers' Federation (SNIPEF) • Scottish Building Federation (SBF) • Scottish Electrical Charitable Training Trust (SECTT) • Scot tish Joint Industry Board (SJIB) . Single Ply Roofing Association (SPRA) • Specialist Engineering Contractors' (SEC) Group • Society for the Environment (SocEnv) • Society for the Protection of Ancient Buildings (SPAR) . Society of Architectural Historians of Great Britain Society of Chief Architects of Local Authorities (SCALA) . Society of Construction Law (SCL) • Society of Construction Arb • Society of Digital Engineering (SDE) • Society of Light and Lighting (SLL) • Society of Public Health Engineers (SoPHE) • Solar Trade Association • Standing Committee on Structural Safety (SCOSS) • Steel Construction Institute (SCI) . Steel for life . Steel Window Asso ciation • Strategic Forum for Construction • Sustainable Traditional Buildings Alliance (STBA) • Technology and Construction Court Bar Association (TecBar) • Technology and Construction Solicitors' Association (TeSCA) • Temporary Works Forum (TWF) • The Chartered Surveyors' Company . The Edge . The Institute of Construc tion Management (ICM) • The Trade Assi Contracting Industry in Scotland (SELECT) • The Welding Insitute Tile Association Timber Besearch and Development Association Planning Association (TCPA) • Trade Association Forum • Transforming Construction Aliance (TCA) • UK Concrete • UK Contractors Group (UKCG) Became Build UK • UK Green Building (UKCSA) • United Kingdom Federation of Builders (UKFB) • Unite the Union • Urban Land Institute (ULI) • Usable Buildings Trust (UBT) • Water Management Society (WMSoc) • Wood Panel Indus-Constructors (WCC) • Zero Waste International Aliano

#### Noutral Grouns

All Party Parliamentary Group for Excellence in the Built Environment All Party Urban Development Group • All-Party Parliamentary Design and Innovation Group (APDIG) • Architects Registration Board (ARB) • BIM Task Group • British & Irish Legal Information Research Establishment (BRE) • British Standards Institution (bsi) • ment service • Centre for Accessible Environments (CAE) • Centre the Built Environment (CABE) . Considerate Constructors Scheme of HSE . Construction Industry Joint Council (CIJC) . Contractor Health and Safety Assessment Scheme (CHAS) . Department for sion for Architecture and the Built Environment) . Education and Skills Funding Agency (ESFA) • End-point assessment organisations (EPAOs) • Energy Saving Trust (EST) • Engineering and Physical Sciences Research Council (EPSRC) • Environment Agency (EA) • Government Construction Board • Highways England • Hazardous Substances Authority (HSA - usually the local planning authority) • Homes England . International Centre for Complex Project Manage tion (nbs part of RIBA Enterprises) . National Trust . Natural England New Engineering Contract (NEC) • Open Data Institute (ODI) •
Planning Portal • RISCAuthority • Scottish Natural Heritage (SNH) • Self Build Portal • Technology and Construction Court (TCC) •

Information source for thi research piece : designingbuildings.co.uk

Company of Constructors (WCC) .

construction industry has always been complex and diverse, and the modern industry, with it's separation of design and construction has to some xtent always been fragmented.

Where do you draw the line when trying to establish who is involved in a certain industry?

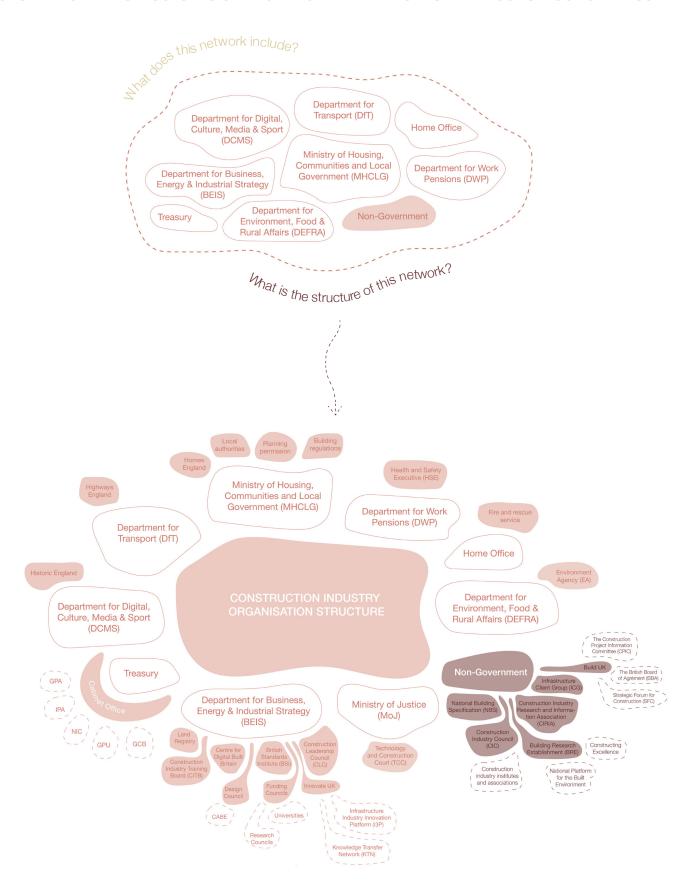


The construction industry has a reputation for being fragmented. The relationships between everyone involved in the process have a massive impact on the success of projects and general developments in the industry. Due to this lack of collaboration this results in underperformance and waste, also blocking certain ideas that could make a great change in the industry (Conway, 2018). There is so much we can contribute in our respective fields towards the climate and ecological emergencies. However this would be even more successful if we found a better way to exchange our knowledge in a more efficient way that is accessible to all. As a student I came to the realisation that I had no idea about how the industry I work in is structured. I feel that both in education and in work there are not many opportunities to collaborate with others over a longer period of time. Having had the chance recently to collaborate with students on different courses I have understood the value in multidisciplinary knowledge exchange and collaboration.

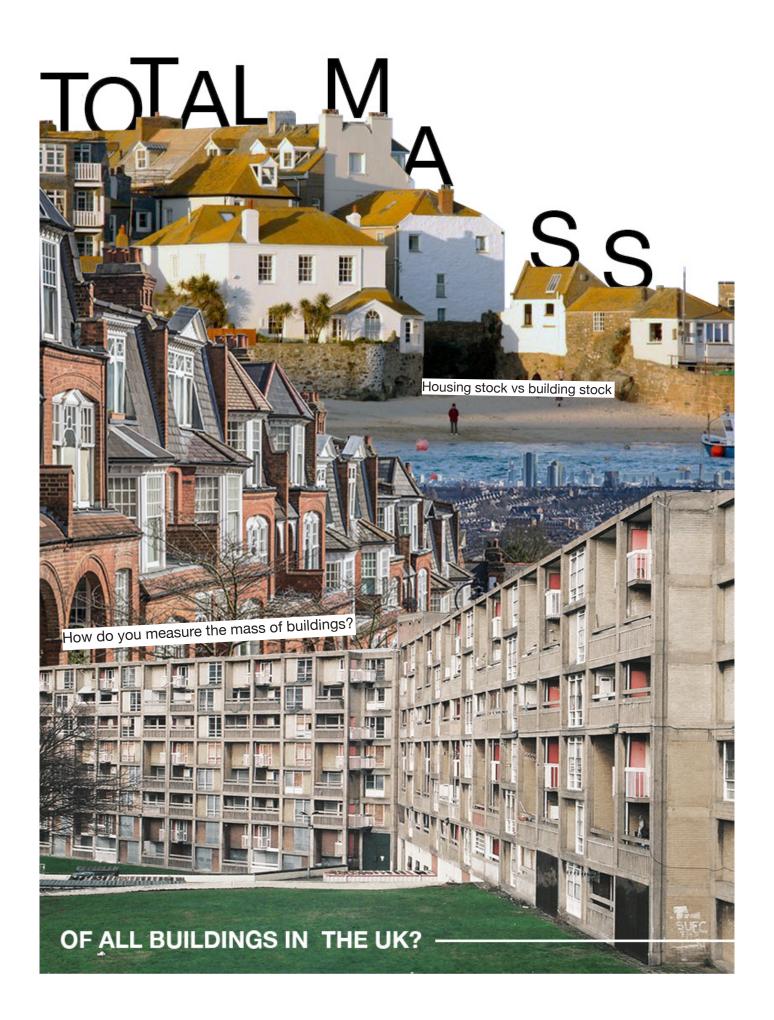
When considering this question I wanted to start by understanding the structure of the industry and who is involved in the different aspects of the process. Understanding the relationship between independent organistions as well as government departments is also valuable and interesting to observe.

# flows and relations

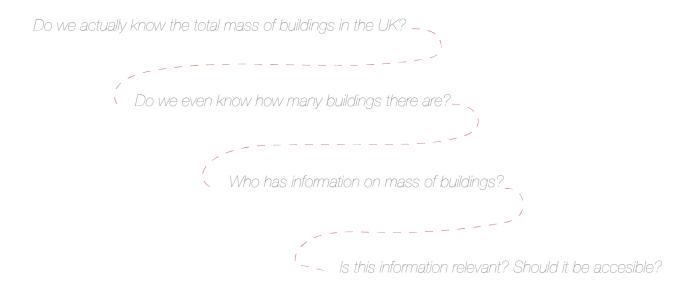
OBSERVING INFRASTRUCTURES OF KNOWLEGE AND NETWORKS IN THE CONSTRUCTION INDUSTRY



Information for diagram: Designing Buildings (2013). UK construction industry - Designing Buildings Wiki. [online] Designingbuildings.co.uk. Available at: https://www.designingbuildings.co.uk/wiki/UK\_construction\_industry.



Trying to find what seems to be fairly simple information at first only results in further questions.



There is generally not a lot of clear information on this topic. Contacting government organisations also doesn't seem to be effective, they simply point you to information which is already accesible and not very clear or relevant. The most quantifiable information is in relation to **housing stock**, this addresses the number of dwellings and is often closely linked to issues of housing supply.

According to the UK's Ministry of Housing, Communities and Local Government, there were 23.9 million dwellings in England on 31 March 2017.

Building stock is a term that is used to describe the total number of buildings in a country, region, municipal area or estate. It can include dwellings, offices, factories, shops, educational establishments, agricultural buildings and so on. There is no quantifiable research which can give a clear number as with housing stock.

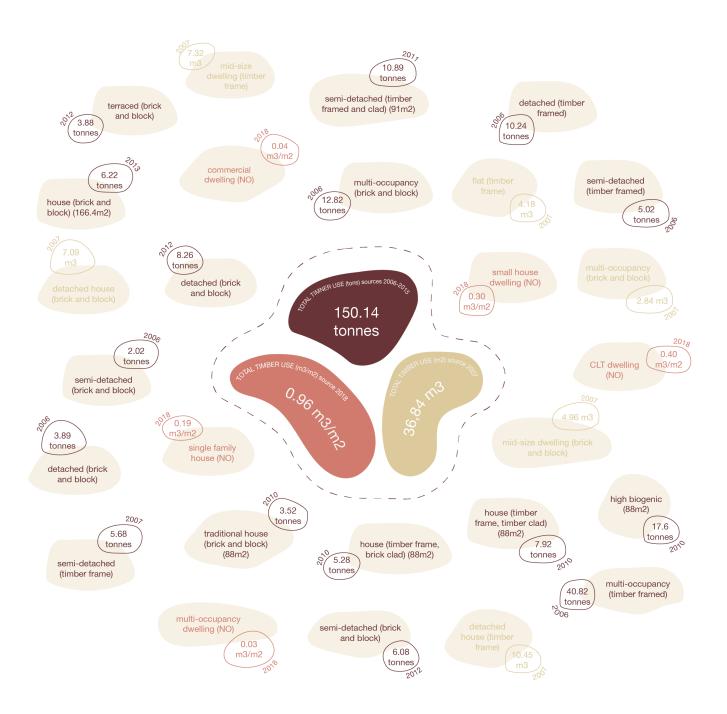
It is difficult to understand where you can find information regarding the construction industry with such a complex network of organisations. Is there a way to unpick these invisible infrastructure of knowlege along with their networks?

# flows and relations

Due to lack of clear data it is hard to calculate the total mass of building stock in the UK. With focus on understanding the embodied carbon of the built environment perhaps this is data that should be important to us. Regulations and policymakers measure the carbon emissions of buildings based on operational energy use only, ignoring the embodied wotal number of buildings in an are carbon benefits of reusing the existing structure. building stock TOTAL MASS OF BUILDINGS IN UK to the number of domestic dwellings Given the UK's growing population, the housing stock tends to increase each year, even allowing for clearance and redevelopment. However, according to Shelter, successive UK governments have failed to build houses in adequate numbers, and so there is an ongoing housing crisis. Shelter estimate the number of new homes needed each year is around 250,000. In fact, only 141,000 new homes Ministry of Housing were built in Britain in 2014. 23.9 million dwellings (2017)606,000 census vacant information

### -what is the total mass of timber in all buildings in the UK?

Where can you search for info about timber in UK?...... What is the difference in timber use in each country in UK?...... How do you categorise the timber use by building type being analysed?...... How do you measure mass? ......Which units can be used? ......How can you measure yearly growth of the mass of timber?



Timber is the most sustainable form of construction, as it benefits from the lowest embodied C02 of any building material, as well as being organic, non-toxic and naturally renewable. When researching into timber it was difficult to find any cohesive information about the mass of timber used in construction. Each piece of information was provided using a different unit which makes it harder to draw observations and reflections.

How do we measure the amount of timber in buildings in the UK? Is this possible?



The Forestry Commission has released a report which found that only 25% of housing in the UK is timber frame construction. Another study concluded that in Scotland this figure is as high as 85% for new housing using timber frame construction. This forces us to question why our industry does not facilitate more widespread use of timber in construction in the UK (Time for Timber, 2021). This is not to say the industry does not want to look into using more home grown timber. 'Research published in October by the not-for-profit promotion organisation Grown in Britain found that 92% of large contractors would support an industry-wide commitment to use more home-grown timber, and more than 60% said they would add clauses into contracts to encourage its specification' (Construction Management, 2015). It seems that this maybe a change that needs to be promoted and implemented by government led departments in order to facilitate this transition and support contractors.

Like so many initiatives that work towards making an impact on the climate and ecological emergencies, a thriving British timber industry requires a collaborative approach; proactive contractors, and supply chains willing to consider out home-grown alternatives (Construction Management, 2015).

# flows and relations

#### OBSERVING INFRASTRUCTURES OF KNOWLEGE AND NETWORKS IN THE TIMBER CONSTRUCTION INDUSTRY

The Forestry Commission is a non-ministerial government department responsible for the management of publicly owned forests and the regulation of forestry in England. The FC supply England's largest amount of sustainably-sourced timber, and conserve thousands of plant and animal species (Forestry England, 2022).

The Confederation of Forest Industries, shortened to Con-For, is the trade association for the forestry industry in the United Kingdom. It was established to represent forestry and wood-using businesses, from nurseries and growers, to wood processing end-users (www.confor.org.uk, 2022).

The British Woodworking Federation is the trade association for the woodworking and joinery industry in the UK. They have over 700 members, from manufacturers, distributors and installers. The woodworking sector is a £3.8 billion industry operating at the heart of UK manufacturing (British Woodworking Federation, 2022).

TRADA (The Timber Research and Development Association) is an international membership organisation dedicated to inspiring and informing best practice design, specification and use of wood in the built environment and related fields (www.trada.co.uk, 2022).

As building offsite solutions in timber are gaining traction across the industry, the STA's mission is to enhance quality and drive product innovation through technical guidance and research, underpinned by a members' quality standard assessment - STA Assure (www. structuraltimber.co.uk, 2022).

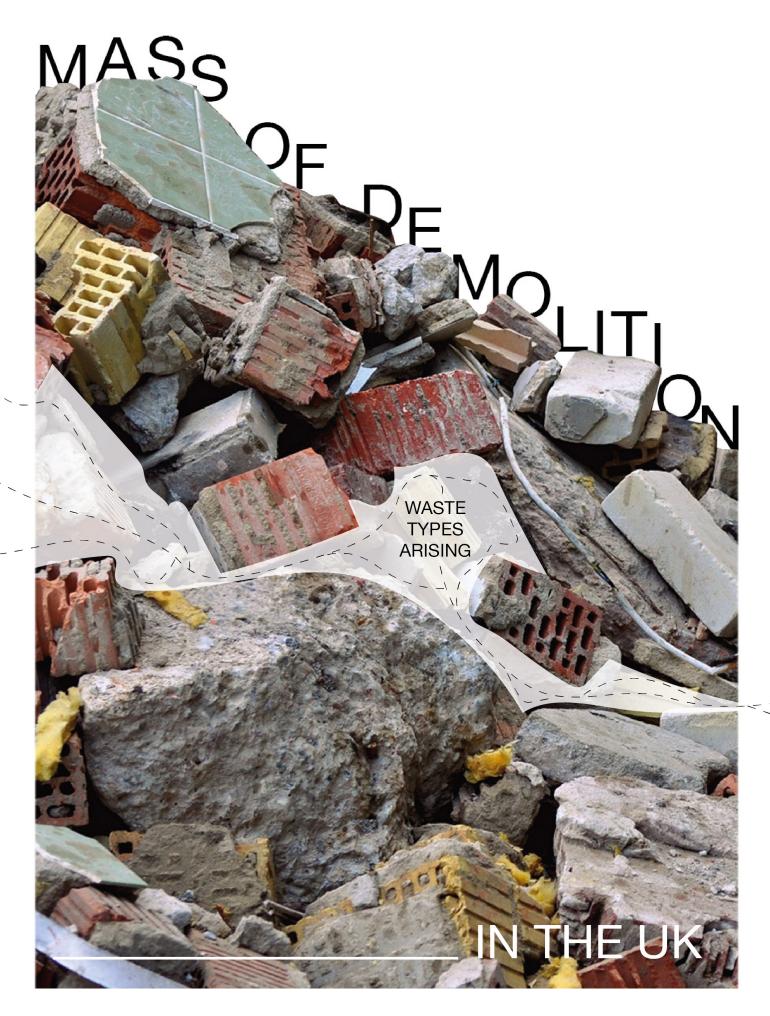
The Building Centre is a hub for the built environment, providing a platform for the exchange and development of knowledge. Established in 1931, the Building Centre is unique in representing and bringing together the different disciplines that form the built environment industry (www.buildinacentre. co.uk, 2022).

The Wood Protection Association and its members champion the use of building with timber influencing, developing and promoting technologies that enhance its performance and value as a building resource for the future. The Wood Protection Association is affiliated to Timber Development UK (WPA.

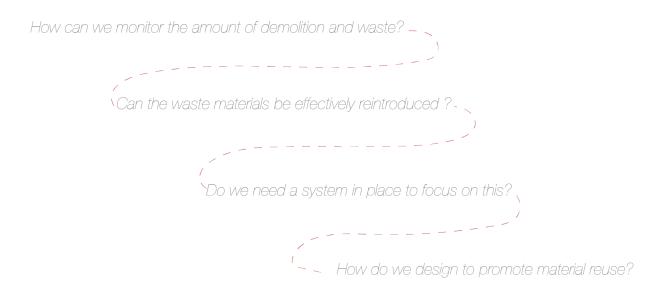
The United Kingdom Forest Products Industry is making a significant contribution to the national economy. The role of representing the technical and commercial interests of this dynamic industry is a crucial one, filled by the United Kingdom Forest Products Association -UKFPA (Robbins, 2022).







There was 60 million tonnes of C&D waste in 2018 and roughly 50,000 were buildings demolished annually.

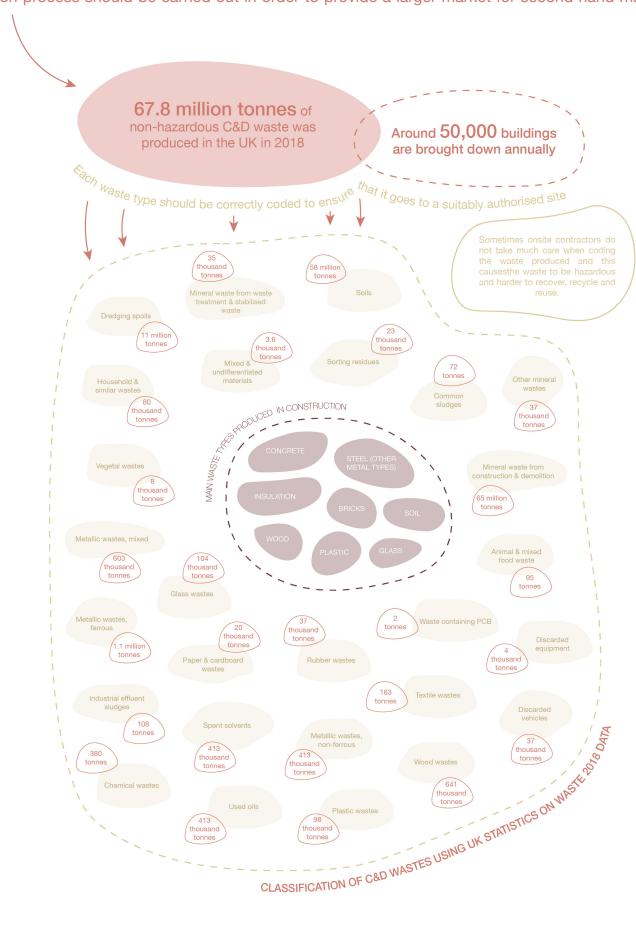


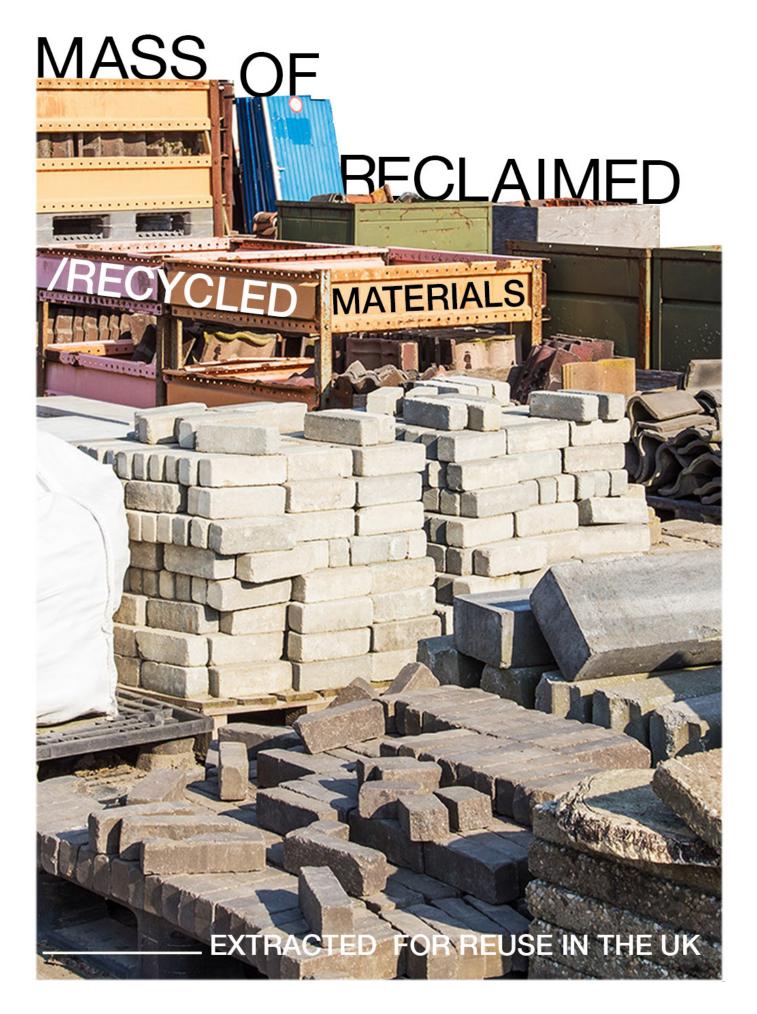
There is an increase of developments using identified brownfield sites across the country and especially in big cities this is having a large impact on permitted sites which are often the end destination sites for construction and demolition waste. It is a collaborative effort to ensure that the right waste goes to the right place. Everyone from the builder generating the waste, right through to the operator of the end destination site has a legal duty of care. One of the main challenges for the C&D sector is waste classification. Each waste type should be correctly coded to ensure that it goes to a suitably authorised site that is set up to handle it (pressoffice, 2021). The way in which waste is classified makes it difficult to implement schemes for material reuse in building projects. It would be useful to implement a classification system specifically for building materials, with more support from the government to reclaim and reuse.

As designers we need to consider how we design and which materials we are choosing. We should reassess the longevity of the buildings we design and consider future uses of the components of our buildings. The concept of a waste strategy could be an element of design we introduce into our proposals.

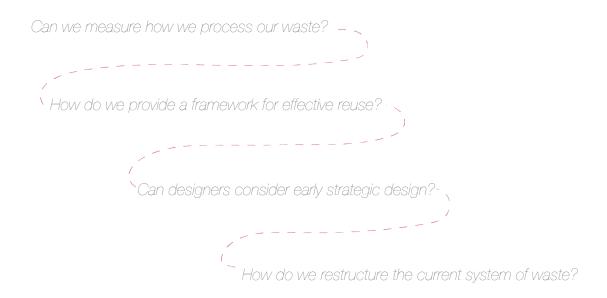
# flows and relations

When looking at the waste data supplied by DEFRA it is difficult to understand the classification system in relation to construction. There needs to be more information on how the demolition process should be carried out in order to provide a larger market for second hand materials.





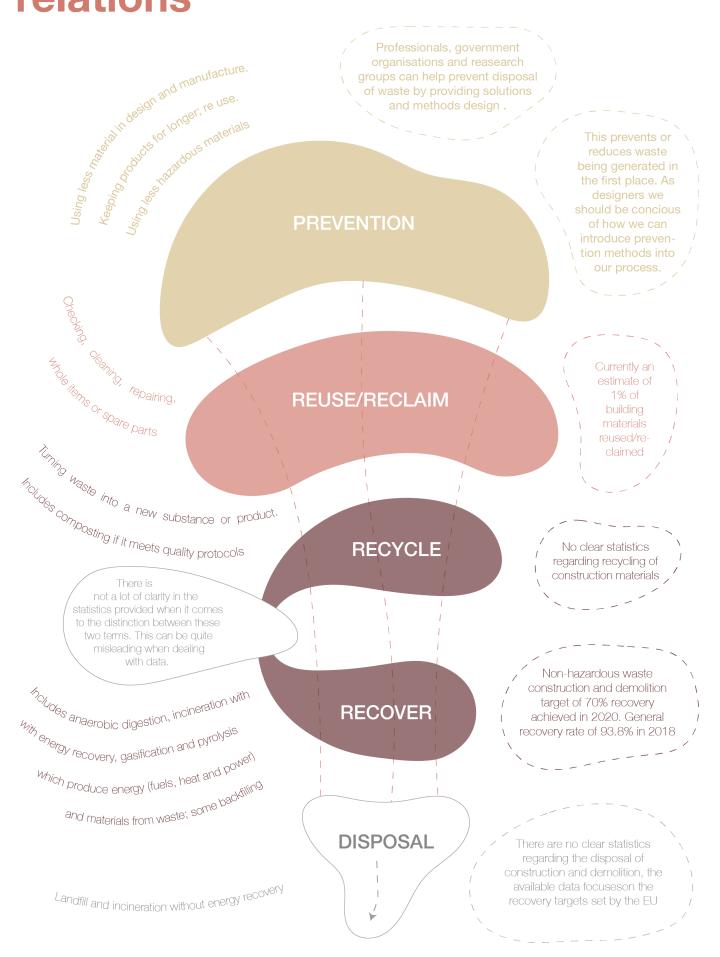
The terminology use in waste processing is quite unclear and therefore often misleading

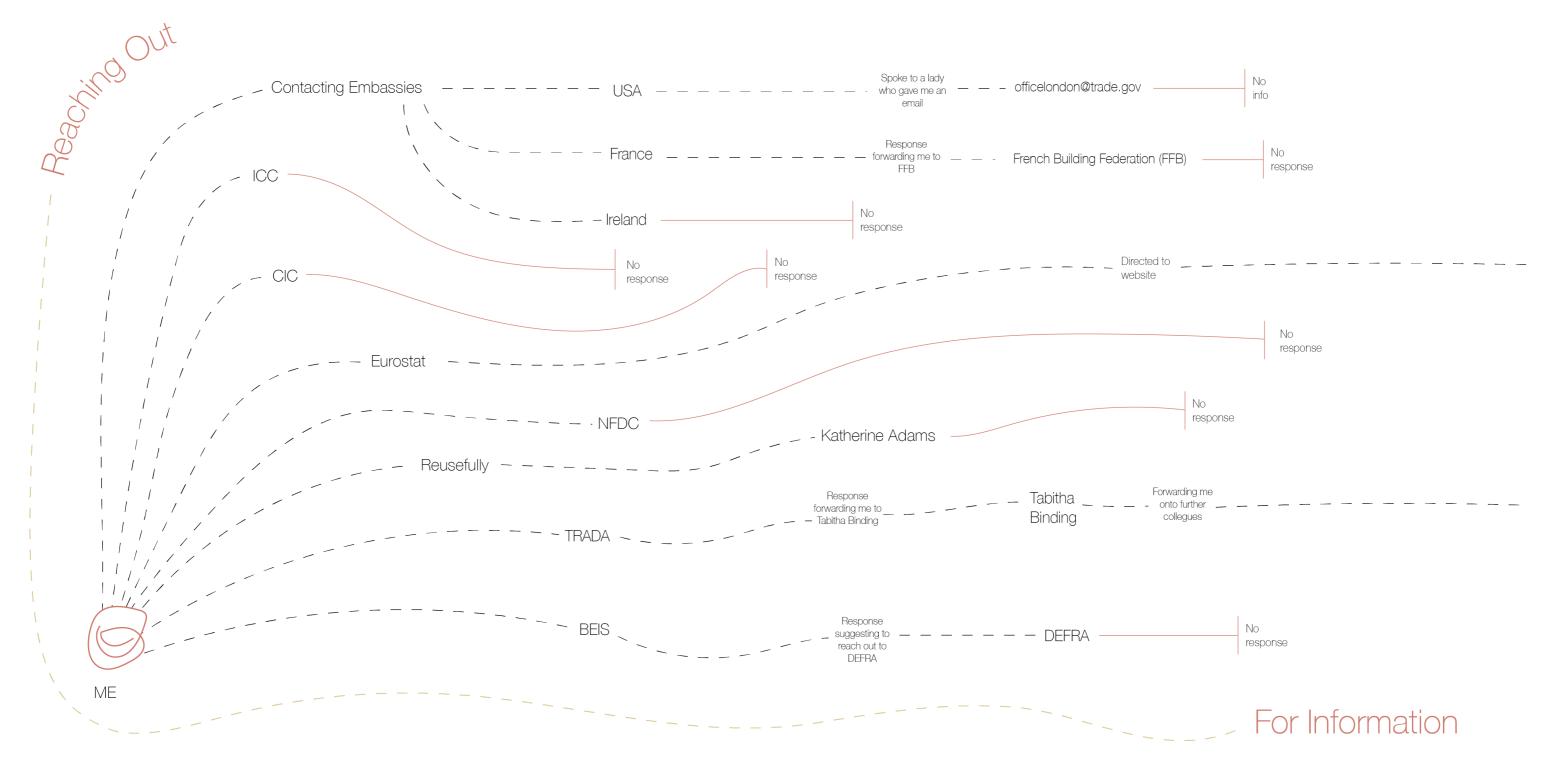


Words such as recycle, reuse, reduce have been overrused to the point they fail to communicate clear information. The UK tend to measure their waste processing by looking at values of recovery, as opposed to recycling and reuse. These terms are not part of the conversation when it comes to measuring progress even on the scale of the EU. If we are not measuring ourselves against those terms we will not visually understand the amount of work we need to undertake to change these values, and our industry will not understand the adjustments that need to be made in order to cater for reuse and reclamation work to take place. The waste hierarchy in its current form is an insufficient foundation for waste and resource policy to achieve absolute reductions' (Van Ewijk and Stegemann, 2016). As a designer I had never come across the waste hierarhy and the consideration of waste as potential materials for design is not something I have come across in previous education.

A collctive approach is necessary in order to begin reassessing the waste hierarchy and implementing initiatives that can alter the linear nature of it. There need to be more solutions which encourage prevention in design and reuse of materials before disposal and recovery are considered.

# relations





When carrying out the research in relation to the industry questions set up by Salvo, I was asked to reach out to a number of organisations and individuals. It was interesting to keep a note of any responses and information I received from each suggested contact. It illustrates the importance of establishing strong networks when researching.

At the start of the placement period Salvo suggested I reach out to the foreign embassies in the UK to enquire about the information for the US, France and Ireland. It was the first point of refrence for contact, and after speaking with them it seemed like they did not have the right information or really any information when it comes to the construction and demolition industry in their respective country.

**Embassies** 

The ICC is The International Code Council is the leading global source of model codes and standards and building safety solution. Their vision is to create safe, affordable, and sustainable buildings. This seemed like a good point of contact in trying to understand a more global perspective on issues of waste in construction and its potential for reuse. Unfortunately I did not receive a response.

DEFRA The Department for Environment, Food and Rural Affairs is the government department responsible for environmental protection, food production and standards, agriculture, fisheries and rural communities in the United Kingdom. They provide relevant statistics on waste including Construction & Demolition, and was advised to contact DEFRA by BEIS after contacting them initially via email.

DEFRA

Eurostat is the statistical office of the European Union, responsible for publishing quality Europe wide statistics and indicators that enable comparisons between countries. They provide relevant statistics regarding Construction & Demolition waste. When I contacted them via email they provided me with relevant and useful links to the tables and data which would be of use.

Eurostat

The Construction Industry Council (OIC) is the representative forum for the professional bodies, research organisations and specialist business associations in the construction industry in the UK. CIC uses expertise to shape a built environment that delivers a better society and a better world bringing Built environment professionals together. Sadly, I did not receive a response from CIC.

TRADA (The Timber Research and Development Association) is an international membership organisation dedicated to inspiring and informing best practice design, specification and use of wood in the built environment and related fields. When I contacted them I was forwarded to a collegue who seemed interested in the work and she forwarded me to further collegues.

TRADA

Reusefully provides expert circular economy and broader sustainability advice for the built environment. I was put in contact with Katherine from Reusefully as they are both working on PreDem a project that aims to help the industry better realise reuse potential, improve circularity and reduce carbon in the refurbishment of UK's housing stock. I did not receive a response.

Reusefully

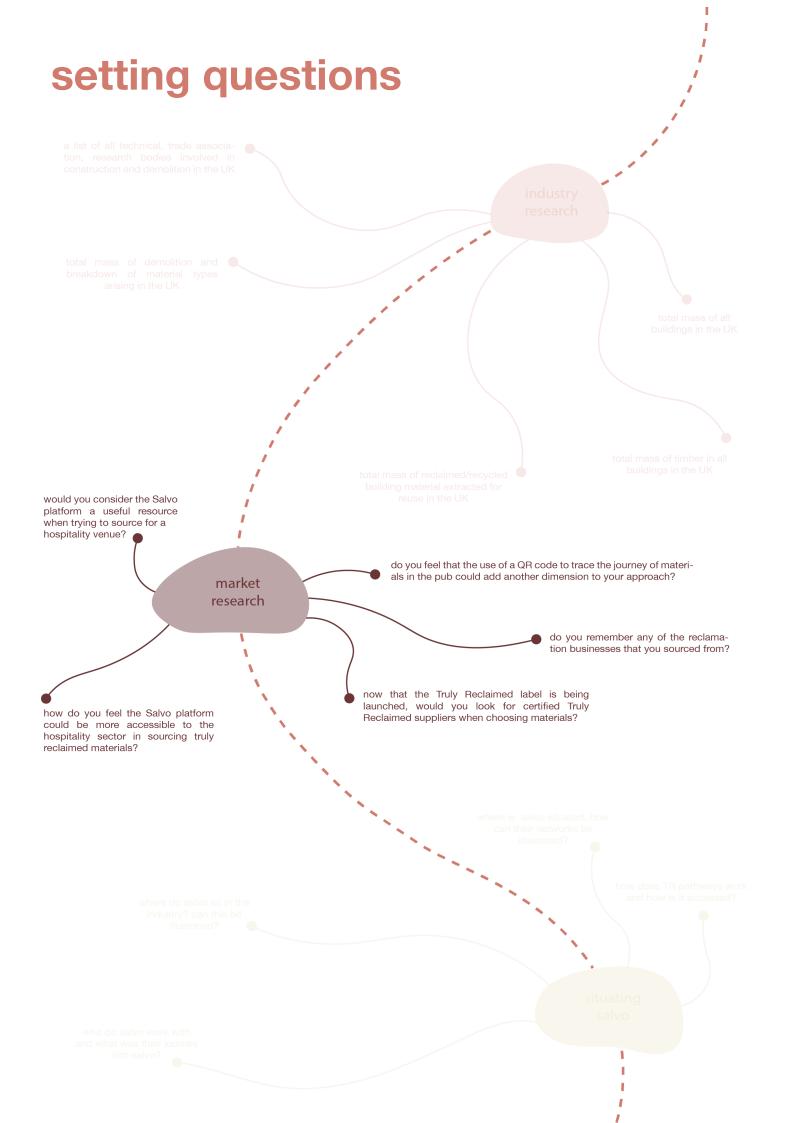
The Department for Business, Energy and Industrial Strategy is a department of the government of the UK. They lead economy-wide transformation by backing enterprise and long-term growth, generating cheaper, cleaner, homegrown energy and unleashing the UK as a science superpower through innovation. They suggested to contact DETRA via email.

BEIS

The FFB (Fédération Française du Bâtiment) is a network made up of 96 local federations, 27 regional federations and 30 trade unions. It promotes the restoration and preservation of buildings. Also, the FFB promotes sustainable construction. The French Embassy passed on the details of FFB so I could contact them with my questions, sadly they did not respond to my email.

The National Federation of Demolition Contractors is the only UK federation in the demolition industry, and counts some of the biggest names in demolition amongst its membership. The NFDC has championed the standards and professionalism of its members for more than 75 years. It was suggested by Salvo to try contact the NFDC for Demolition stats. They did not respond.

NFDC.



# the pig's head

The Pig's Head took over the site of now-shut boozer the Rectory, it opened in November 2021 with a 60-cover bar space and a 40-cover dining room. Sustainability is a big drive behind the new spot, they provide an environmentally conscious approach in both the food and drink, as well as the decor and running of the pub. As well as using 100 per cent sustainable electricity and cleaning with 100 per cent biodegradable chemicals, the menu is fully carbon neutral with an aim to become carbon negative. Any leftovers are composted on site, to avoid the carbon involved in transporting it, with the compost available for local residents and nearby allotments. When speaking to Salvo initially about carrying out market research in the hospitality sector, The Pig's Head came to mind and I suggested it as a possibility. The way in which they have approached their industry and put a structure in place for others to follow was inspiring. It was also good to engage with a different industry to see how we could learn from their process and approach, not only with the decor and fit out but also the food.



During my visit to the Pig's Head I interviewed director and part business owner Jack Ross.

The approch they take addresses everything they do.

From food to farming and sourcing all the furiture and fit out.

Speaking to Jack allowed us to understand the structure in place.

It relies on a great network, which allows them to exchange knowlege and develop further.

Approaching the pub industry with a focus on sustainability is not easy to go all the way with. There are many examples of hospitality businesses that use sustainability credentials as a chance to market their business and capatlise from it. This is what makes the Pig's Head unique, their main ethos and aim revolves around good food and great relationships with their suppliers and farmers, which they have spent years building upon. They work hard in the background to upkeep their progress when it comes to their aims in sustainibility but it is not their key selling point. They are involved in plenty of large scale initiatives such as carbon free dining. Carbon Free Dining Certified restaurants empower their restaurant diners to plant a fruit tree in the developing world to counterbalance the environmental impact of their meal and at the same time, help put an end to poverty. Their impressive value of 80% reduced food waste is a result of their on site compost scheme.

The furniture they sourced was all second hand or antiques, Salvo were interested to hear about this process in order to understand how hospitality businesses can be supported by them. Furthermore it was interesting to hear about their views and suggestions on the Truly Reclaimed label and it's features.

31

# flows

Throughout the interview I began to understand the flow of food and materials at The Pig's Head. Every component of the journey is meticulously detailed. The way in which they work is a model to be followed.





























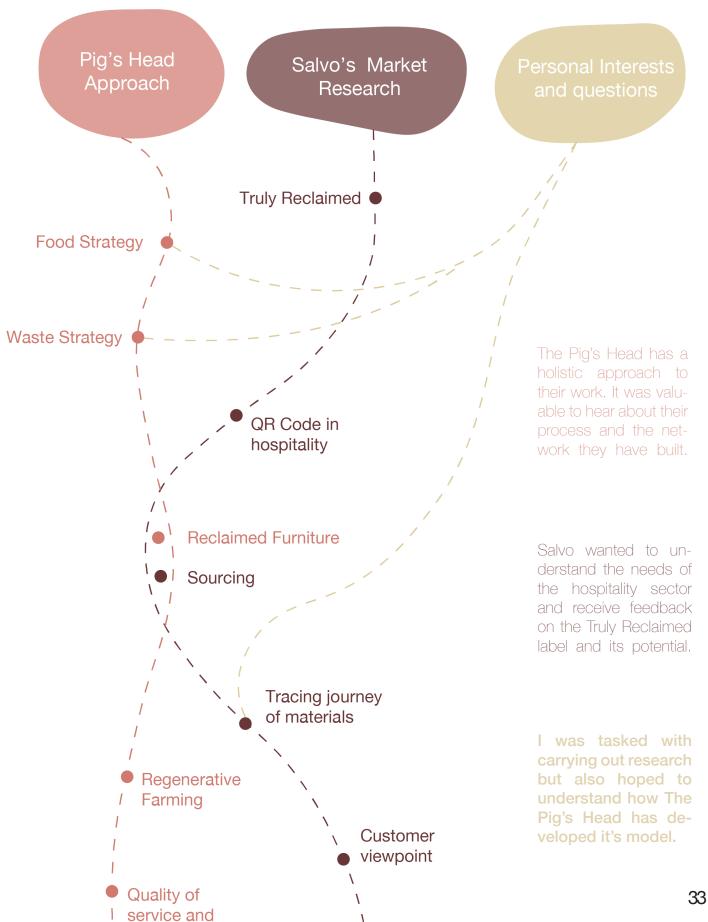


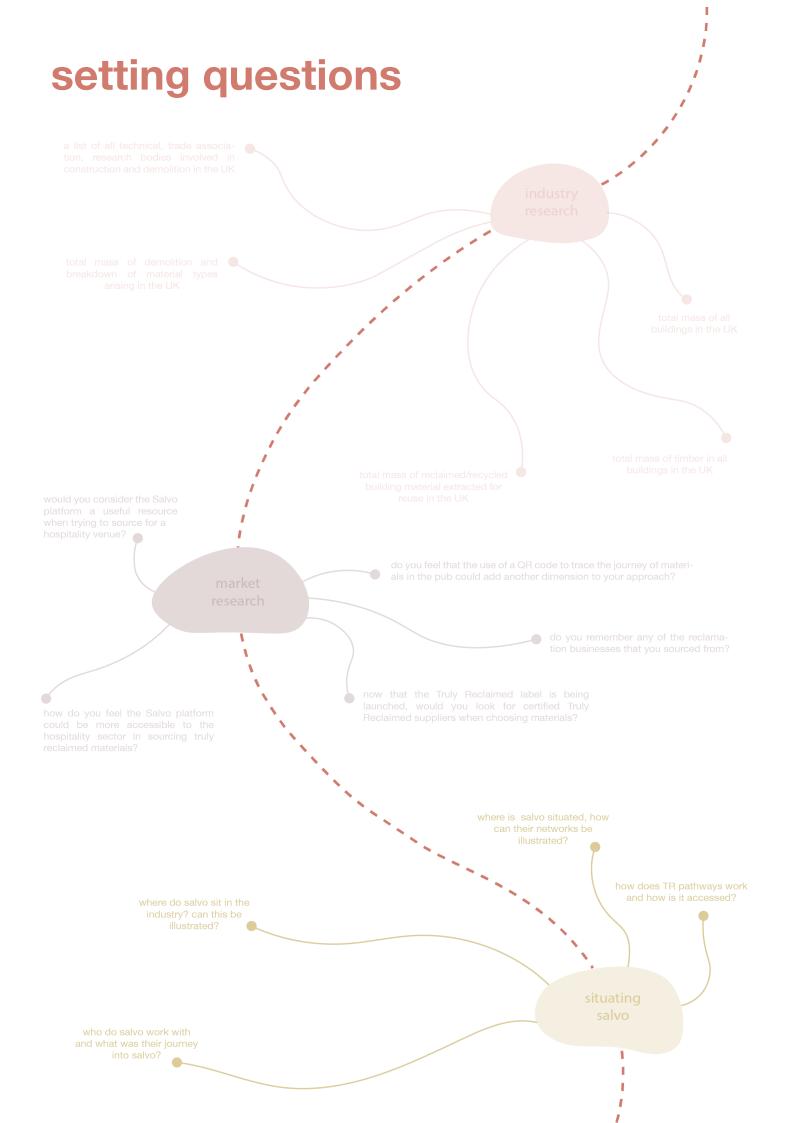
TO WATCH THE FULL VIDEO PLEASE FOLLOW THE LINK PROVIDED BELOW:

https://youtu.be/-Fx0qzWS0aY

# relations

food





# tr and salvo

The Truly reclaimed label has been launched by Salvo, in order to verify a product or batch of material is genuinely reclaimed. This will inform people of the provenance and positive carbon consequence of choosing materials that really are reclaimed for reuse. By linking products to protocols and allowing people to easily see and share the stories behind reuse, the label builds trust in our built environments (FutuREuse, 2021). My placement hosts sent me an extensive document outlining the process to becoming a member and all the details explaining how the label works on different scales. I was tasked with taking the information and producing a piece of work which communicates the main points in the document. This could then be shared with potential member and collaborators to give context of the label in a visually accessible way. I developed a diagramtic method of recording information to format my work which resulted in a flexible format allowing it to be used as a poster of leaflet.

# truly reclaimed pathways?



#### WHAT IS TR PATHWAYS?

Salvo certifies Salvo Code members (Code established in 1995), who already adhere to high standards in responsible sourcing, as registered operators of the Truly Reclaimed label.

Truly Reclaimed operators receive an induction & training sessions in order to verify and self-certify their ow stock as Truly Reclaimed. This includes the process of recording a reclaimed product or batch of material from reclamation to reuse, how to use the Truly Reclaimed label, QR tagging, data uploading and promotion Truly Reclaimed operators will record the full chain of custody from source/seller to end- reuser/buyer, as well as same site and site2site salvage.

A product or material is considered Truly Reclaimed when verified by a registered operator Verification requires the operator to make a statement to the effect that a specific material, product or item is reclaimed. The verification can be recorded by the operator using their own manual or online system which is forwarded to Salvo, or by using the Truly Reclaimed digital form. As the Truly Reclaimed scheme regulator, Salvo will periodically inspect the list of verifications.

A construction professional asks Salvo to certify a project that contains same-site or site-2-site reuse on projects of a short time period as Truly Reclaimed. Longer periods which require stockholding would require the stockholding trade membership.

Labels may appear in a number of ways applied by, or under the control of the registered operator. For example:

- On stock or signage in yards and showrooms
  On wrapping, boxes, crates or labels fixed to stock in transit
  On items installed in the end-user's premises

#### **HOW DOES THE PROCESS WORK?**

People discover the Truly Reclaimed label in a members' showroom or insitu in shops, hospitality spar

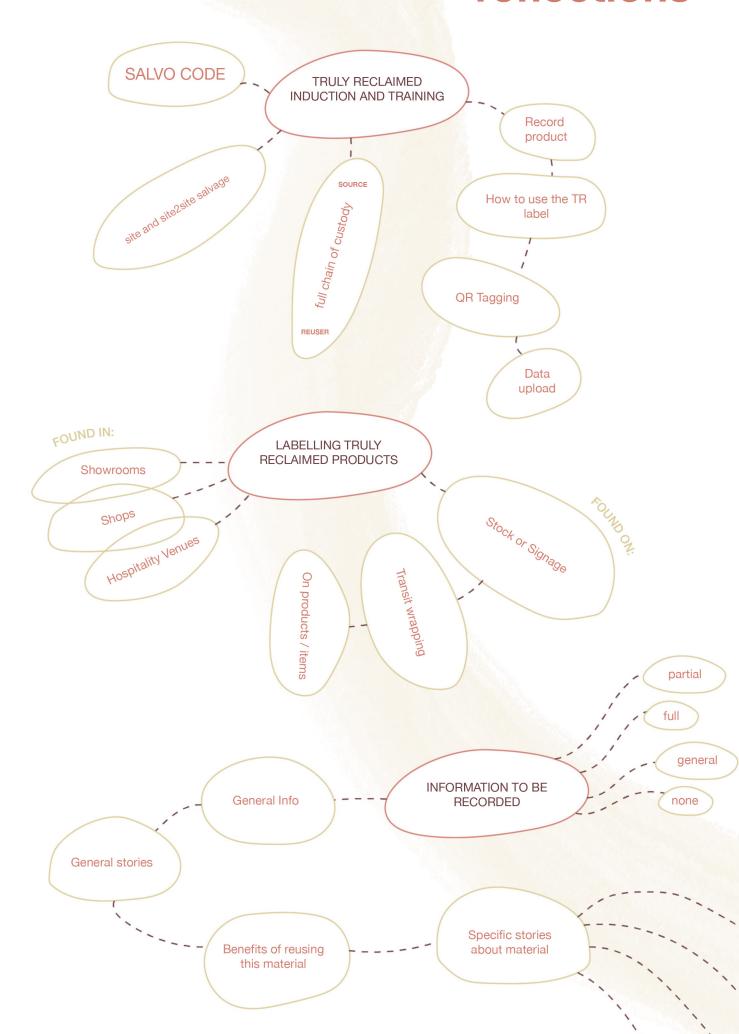
People discover the True Reclaimed label online and explore the growing map of Truly Reclaimed suppliers and eco-conscious design destinations that feature Truly Reclaimed materials.

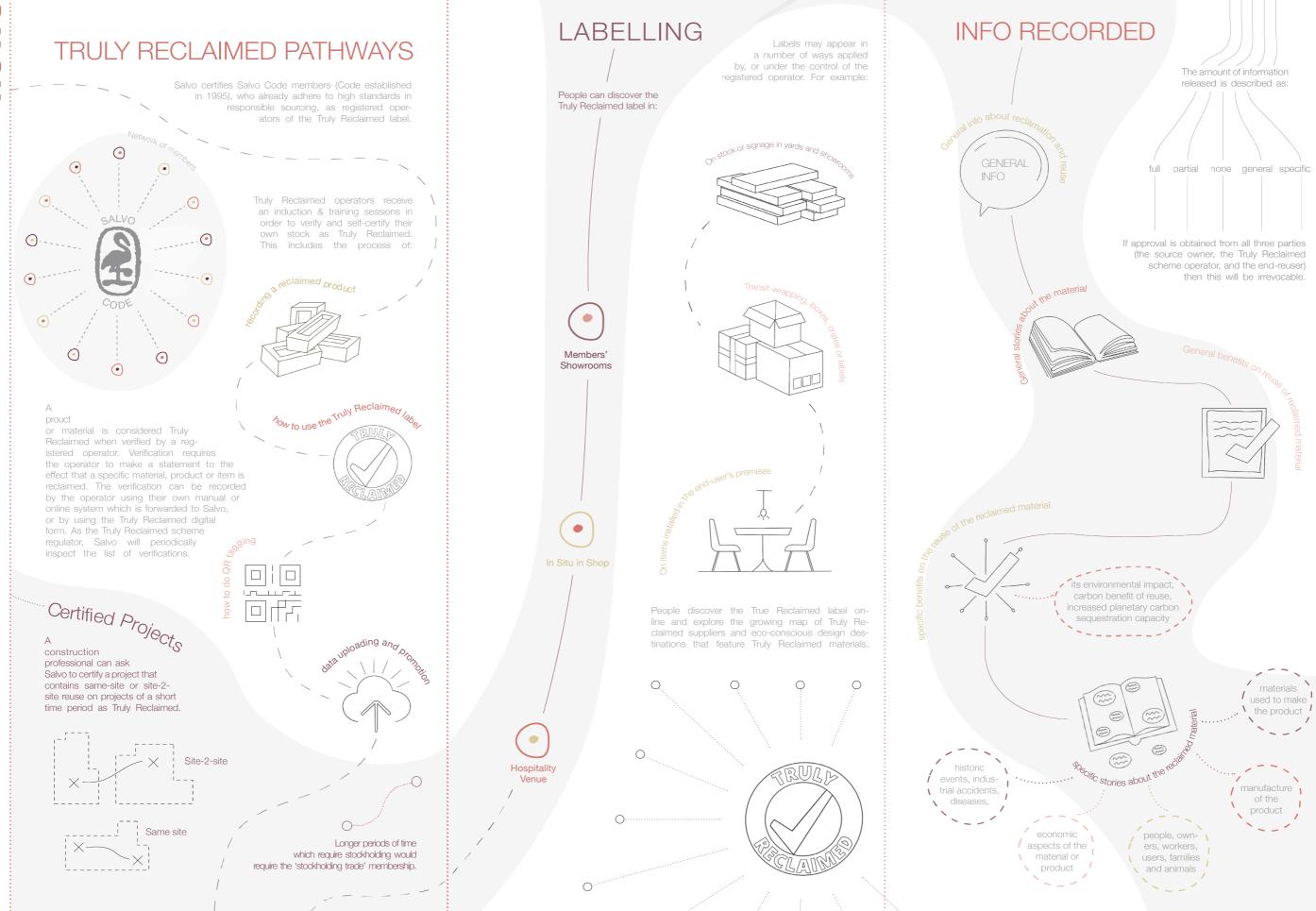
#### Information recorded by Truly Reclaimed

The amount of information released is described as full', 'partial', 'none', 'general' or 'specific' it approval is obtained from all three parties (the source owner, the Truly Reclaimed scheme operator, and the end-reuser then this will be irrevocable.

- General information about reclamation and reuse, not related to the specific material
- General stories about the material, products, benefits of reuse, not related to the specific material
- General benefits on reuse of reclaimed building material and products
- and who, about:
  - materials used to make the product
  - 2. manufacture of the product
  - 3. the building where the product was last located

  - people owners, workers, users, families and animals
     historic events, industrial accidents diseases, inventions ... 6. economic aspects of the material or
- specific benefits on the reuse of the reclaimed material, its environmental impact, carbon benefit of reuse, increased planetary carbon sequestration capacity.





38 39

#### situating salvo? circular design week

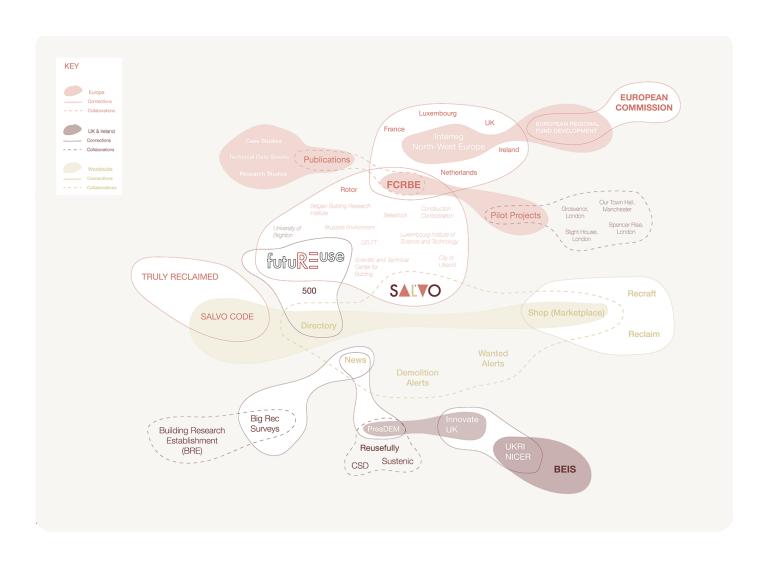
From the very begining of my placement I was very interested in Salvo's identity and how they can be situated within their network and context. It was clear that they are part of a variety of different networks ranging from relationships with salvage and reclamation dealers to connections with organisations who work directly with government departments. I was keen to unpick their website and begin to understand all that they offer and the amount of work they have been involved in since the 90s.





Who are salvo? What is their identity?

Who do Salvo work with?



#### reflections

Salvo's network helps them to reach more people and to understand their own industry and how they can affect it.



When I first came across Salvo I felt their range of networks and connectivity with different people and organisation was extremely valuable, and demonstrated their values and approach as an organisation. It made me think about how successful networks can be in measuring impact. Measuring impact can contribute to better decision-making, impact demonstration, quality of delivery, accountability, communication, and learning. I decided to try and situate Salvo visually from an ousiders perspective. I used their website to gather all the information I needed, and I produced a diagramatic drawing to illustrate all of their connections and where they sit within their network. My placement hosts reviewed this with me and found it really valuable to see how I perceive their work from an outside perspective. It is interesting to visually analyse the range of work they are involved in and the scale of connections they have not only in the UK but in Europe and worldwide.

#### flows

I was asked by my placement supervisors to arrange the information I had collected in a video format. They wanted to include it in their circular economy week video they had been invited to present. It is useful to understand Salvo's heritage and identity as well as their network, as they soft launch the Truly Reclaimed label.

# Premiered at #CEweek2022 TRULY RECLAIMED: INTRODUCING THE NEW LABEL FOR REAL REUSE

#CEweekLDN #TrulyReclaimed #RealReuse @SalvoWEB @SalvageUK Tune in to learn about **Truly Reclaimed** which assures that a product or batch of material is genuinely antique or reclaimed. The label helps you distinguish Truly Reclaimed from new products that are made to resemble the old, highlighting the environmental benefit of choosing materials that really are reclaimed for reuse.

Sister to the Salvo Code, a longstanding peer-reviewed community of businesses that meet high standards in responsible sourcing. Through Truly Reclaimed, you can discover a material's past life, reclamation rescue stories and the embodied carbon saved.

Join the campaign for real reuse!







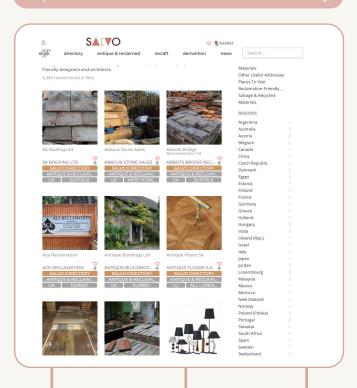


TO WATCH THE FULL VIDEO PLEASE FOLLOW THE LINK PROVIDED BELOW:

#### relations

Mapping the directory was an important activity I wanted to carry out during my placement. I really wanted to understand the extent of Salvo's directory in a very clear and visual format. I sifted through their whole directory in order to plot the geographical locations of all members and salvo members in the UK and Ireland. This information was then represented in a map format. It was valuable to include this in the circular economy week video, in order to give context and a true understanding of the extent the directory. Over the years Salvo have built such a strong network of collaborators, and this allows me to be able to measure their impact as an organisation. The label they launch will be available to people from different industries and their own collaborators. It is exciting to see how this will expand and reach a range of different people.

#### https://www.salvoweb.com/salvo-directory





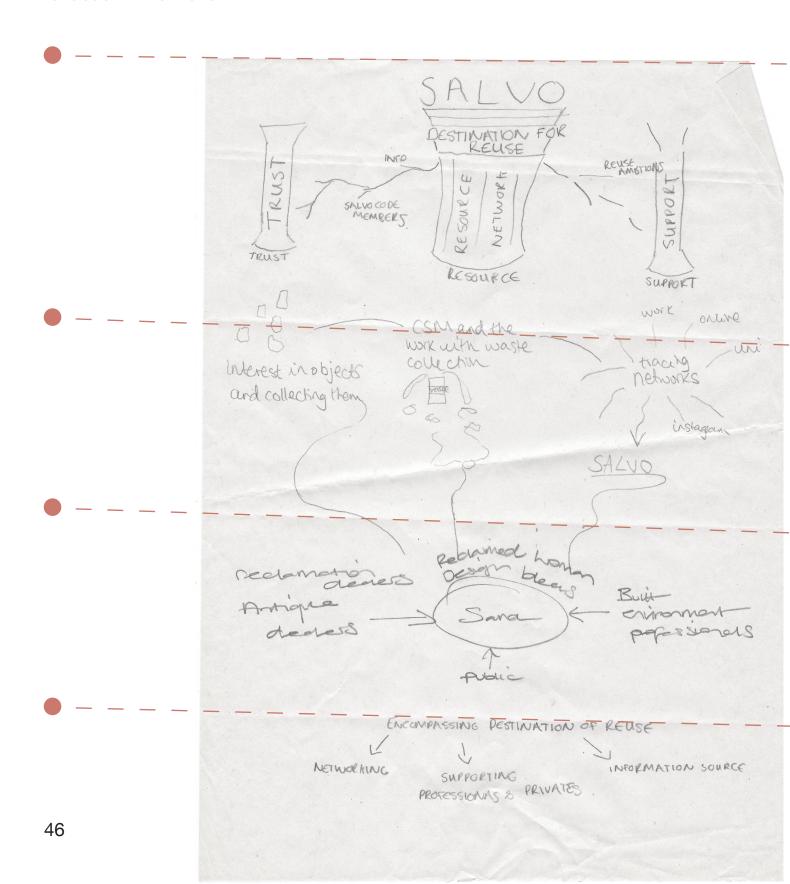


#### concept

I met for the first time with my placement hosts in person at the end of my placement at the British library, so I planned this activity for this day. I decided to plan the collaborative piece to take place in the last week as I wanted to present some questions to Sara and Becky about my experience and initial enquiry into Salvo. My placement hosts had previously expressed that they found it useful to present me with text and questions to see how I interpret it from an outsiders perspective. I wanted to take a similair approach in order to encourage conversation and reflection on the placement period as a whole.

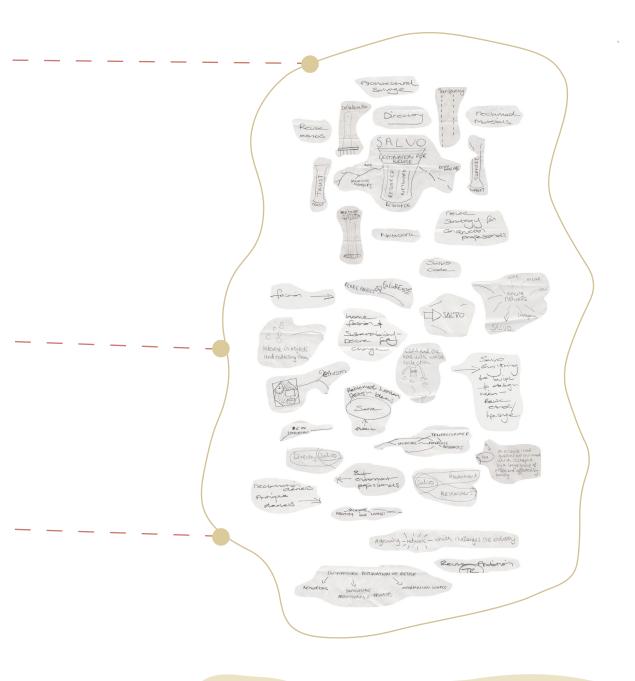
### collaborative piece

The format I chose for the activity was inspired by exquisite corpse. This is a collaborative drawing approach first used by surrealist artists to create intuitive drawings and push their concepts further. I felt this was a really effective way to initiate conversations about our collaborative practice and how we situated ourselves in it. The results of the activity prompted important conversation and knowledge exchange in a very relaxed environment. The activity allowed us to overcome any preconceptions and become truly vulnerable with their views.



#### reflections

I wanted to record this experience by producing a tapestry of Salvo which illustrates my experience and the variety of skills I have developed. I developed a process to collage our pieces together and group them visually, this allowed the tapestry to evolve to look like a journey with a range of experiences and connections.

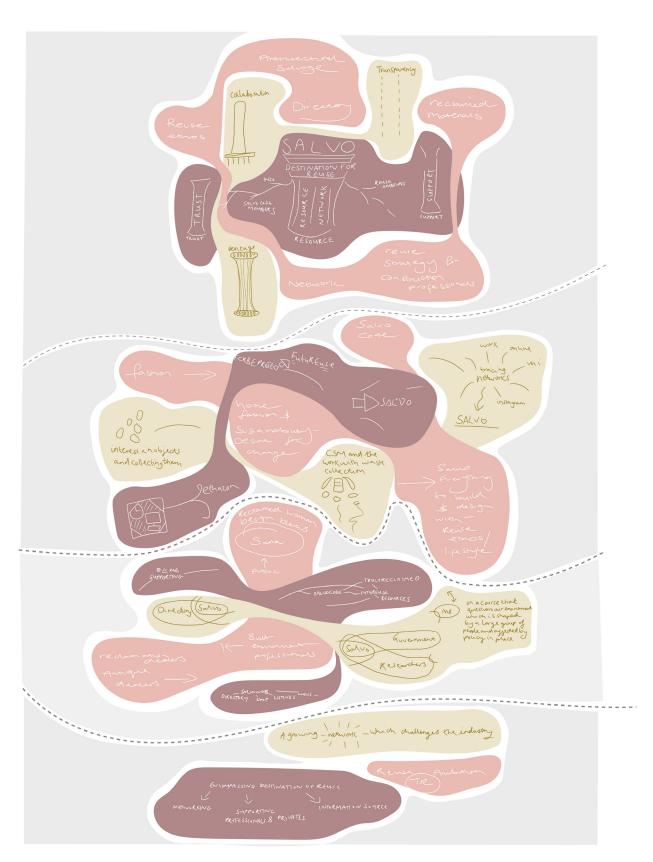


The collection of all our responses provided a range of threads, to be discussed reflected on. Weaving them together leaves a trace of those important discussions

weaving the tapestry

#### flows

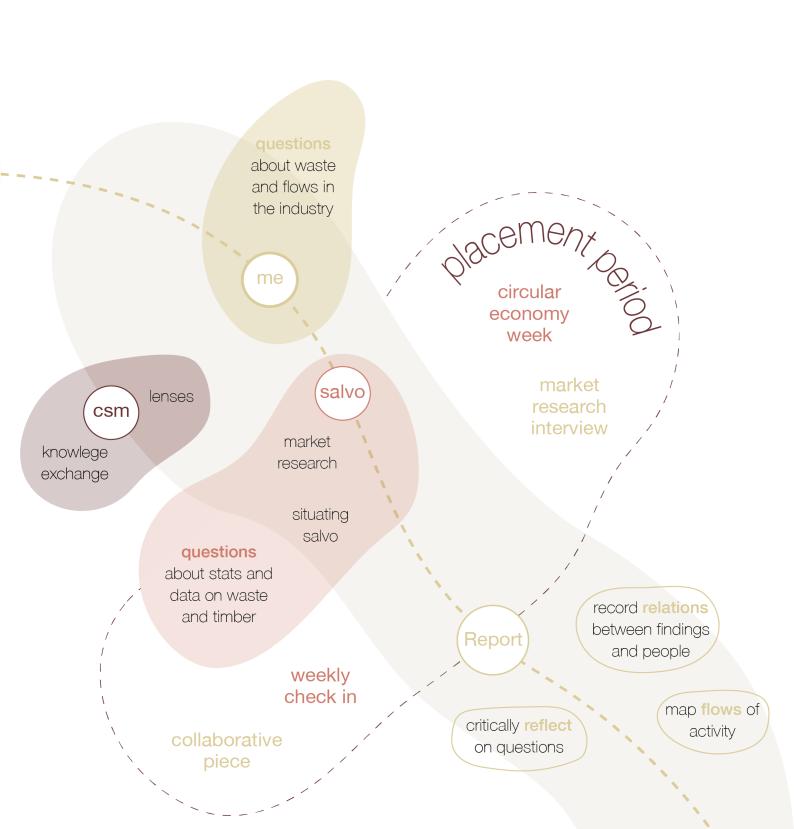
The process of combining our responses made it feel like i was meticulously weaving our collective tapestry which resulted in a rich and layered piece which tells the complex and unique story of our collaboration and how we have shared knowledge with each other throughout the experience. It was a very special piece to produce and a great conclusion of my work with Salvo.





## reflecting on the placement period

Researching and working with Salvo has been a really enjoyable experience, and I feel like I have been able to learn a lot from the experience. It was great to have a balance between carrying out work for Salvo while also addressing my own inquiry in the background. It has been useful to frame this experience within the structure I have set myself to follow looking at questions, reflections flows and relations. It has encouraged me to continuously reflect on my processes and way of work. Salvo's work in itself addresses the lenses of Identity & Equity, Commons & Publics, and in particular Climate & Ecology, so these were issues which. were inevitably considered when critically reflecting on the tasks set by Salvo, and further work I carried out for myself. This was the first time I have worked with an organisation that has given me complete freedom in how I express my thoughts and concepts, and this has resulted in a personal growth through the process of making mistakes and learning the different ways in which I work. In the true spirit of Salvo I was treated as any other collaborator they have worked with. They valued my knowlege and experience, and in exchange provided me with their own knowlege and broad network. This motivated me to learn new skills, try out new methods of work and generally push myself out of my comfort zone. I feel they are a true reflection on how successful collaborative work can motivate individuals to reach a collective goal. I hope to continue developing the skills I have learnt throughout this process, and to keep focusing on the importace of keeping strong networks in our industry.



#### references

Arup.com. (2015). Rethinking Timber Buildings. [online] Available at: https://www.arup.com/perspectives/publications/research/section/rethinking-timber-buildings.

Bioregional. (2008). https://www.bioregional.com/resources/reclaimed-building-products-guide. [online] Available at: https://www.bioregional.com/resources/reclaimed-building-products-guide [Accessed 26 Sep. 2022].

British Woodworking Federation. (2022). About the BWF | The British Woodworking Federation. [online] Available at: https://www.bwf.org.uk/about-bwf/ [Accessed 26 Sep. 2022].

Climate Change Committee. (2019). Wood in Construction in the UK: An Analysis of Carbon Abatement Potential (BioComposites Centre). [online] Available at: https://www.theccc.org.uk/publication/wood-in-construction-in-the-uk-an-analysis-of-carbon-abatement-potential-biocomposites-centre/ [Accessed 26 Sep. 2022].

Construction Management. (2015). UK construction can't see the wood for the trees. [online] Available at: https://constructionmanagement.co.uk/we-cant-see-wood-trees/.

Conway, I. (2018). Optimising collaborative working in the construction industry - UK Construction Online. [online] Ukconstructionmedia.co.uk. Available at: https://www.ukconstructionmedia.co.uk/features/optimising-collaborative-working-construction-industry/.

DEFRA (2011). Guidance on applying the Waste Hierarchy. [online] Available at: https://assets.publishing.service.gov.uk/government/uploads/system/uploads/attachment\_data/file/69403/pb13530-waste-hierarchy-guidance.pdf.

Designing Buildings (2013). UK construction industry - Designing Buildings Wiki. [online] Designingbuildings. co.uk. Available at: https://www.designingbuildings.co.uk/wiki/UK\_construction\_industry.

Duffy, A., Nerguti, A., Engel, C. and Cox, P. (2019). UNDERSTANDING CARBON IN THE HISTORIC ENVIRON-MENT Scoping Study Final Report. [online] Available at: https://historicengland.org.uk/content/docs/research/understanding-carbon-in-historic-environment/.

Europa.eu. (2021). [online] Available at: https://ec.europa.eu/eurostat/databrowser/view/t2020\_rl110/default/bar?lana=en.

Forestry England. (2022). About us. [online] Available at: https://www.forestryengland.uk/about-us.

FutuREuse. (2021). Truly Reclaimed. [online] Available at: https://futureuse.co.uk/truly-reclaimed/ [Accessed 26 Sep. 2022].

GOV.UK. (2022). UK statistics on waste. [online] Available at: https://www.gov.uk/government/statistics/uk-waste-data/uk-statistics-on-waste.

Hill, C.A.S. (2019). The Environmental Consequences Concerning the Use of Timber in the Built Environment. Frontiers in Built Environment, 5(129), doi:10.3389/fbuil.2019.00129.

Pinsent Masons. (2022). Overcoming the blockers to greater collaboration in construction. [online] Available at: https://www.pinsentmasons.com/out-law/analysis/overcoming-blockers-greater-collaboration-construction.

#### references

pressoffice (2021). Construction and demolition sites - Do you know what's in your waste? - Creating a better place. [online] environmentagency.blog.gov.uk. Available at: https://environmentagency.blog.gov.uk/2021/03/28/construction-and-demolition-sites-do-you-know-whats-in-your-waste/.

Robbins, M. (2022). United Kingdom Forest Products Industry Association. [online] Cfa-international.org. Available at: http://www.cfa-international.org/NGO%20directory/DFA-746.htm [Accessed 26 Sep. 2022].

Time for Timber. (2021). Timber around the world. [online] Available at: https://timefortimber.org/timber-around-the-world/.

Van Ewijk, S. and Stegemann, J.A. (2016). Limitations of the Waste Hierarchy for Achieving Absolute Reductions in Material Throughput. Journal of Cleaner Production, [online] 132, pp.122–128. doi:10.1016/j.jclepro.2014.11.051.

WPA. (2022). The Wood Protection Association. [online] Available at: https://www.thewpa.org.uk [Accessed 26 Sep. 2022].

www.arup.com. (n.d.). Evaluating re-use potential: Material profiles - Arup. [online] Available at: https://www.arup.com/perspectives/publications/research/section/evaluating-re-use-potential-materials-profiles.

www.buildingcentre.co.uk. (2022). About us | Building Centre. [online] Available at: https://www.buildingcentre.co.uk/about.

www.confor.org.uk. (2022). Publications on Forestry and Timber | Confor. [online] Available at: https://www.confor.org.uk/about-us/this-is-confor/ [Accessed 26 Sep. 2022].

www.structuraltimber.co.uk. (2022). About Us Structural Timber Association. [online] Available at: https://www.structuraltimber.co.uk/about [Accessed 26 Sep. 2022].

www.trada.co.uk. (2022). TRADA | Timber Research and Development Association. [online] Available at: https://www.trada.co.uk

52 53