

Verity Close

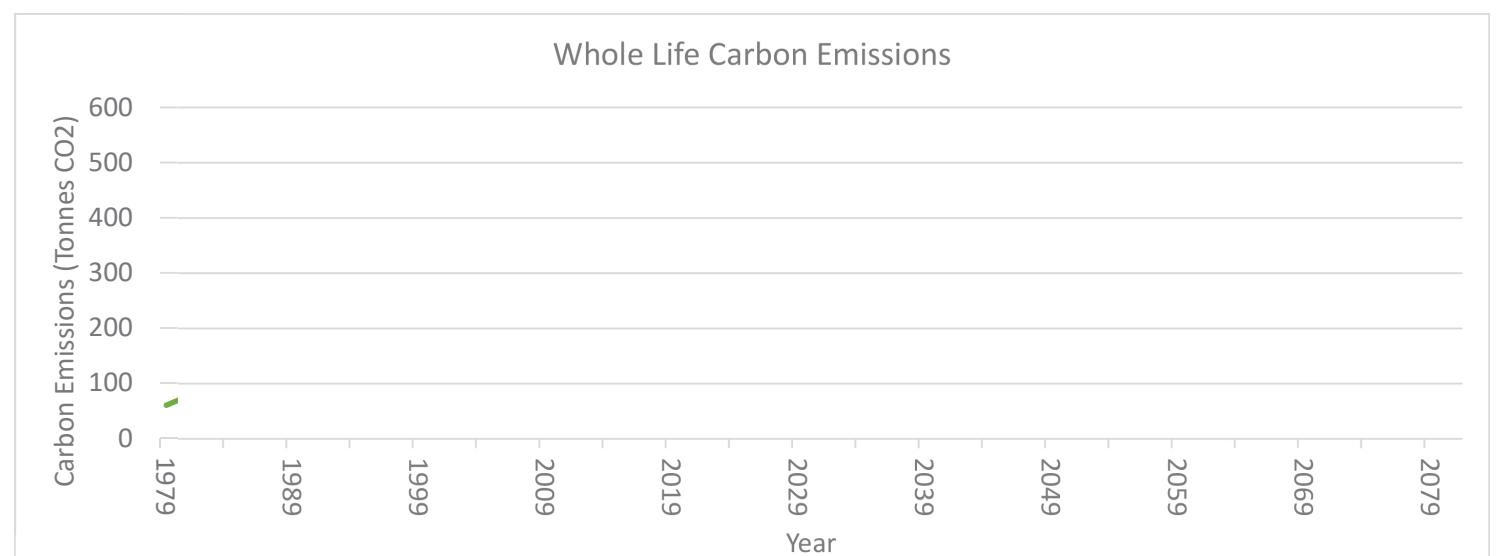
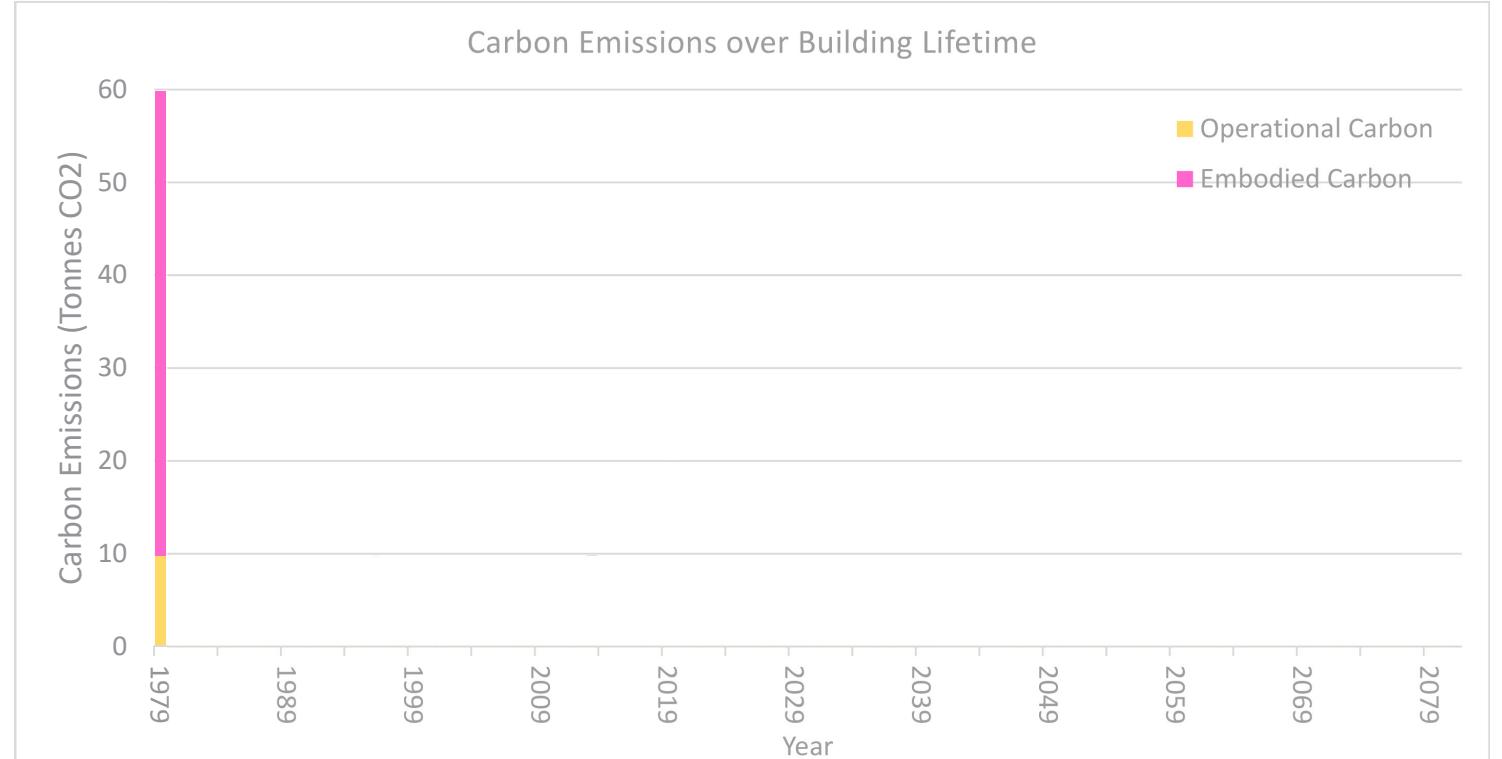
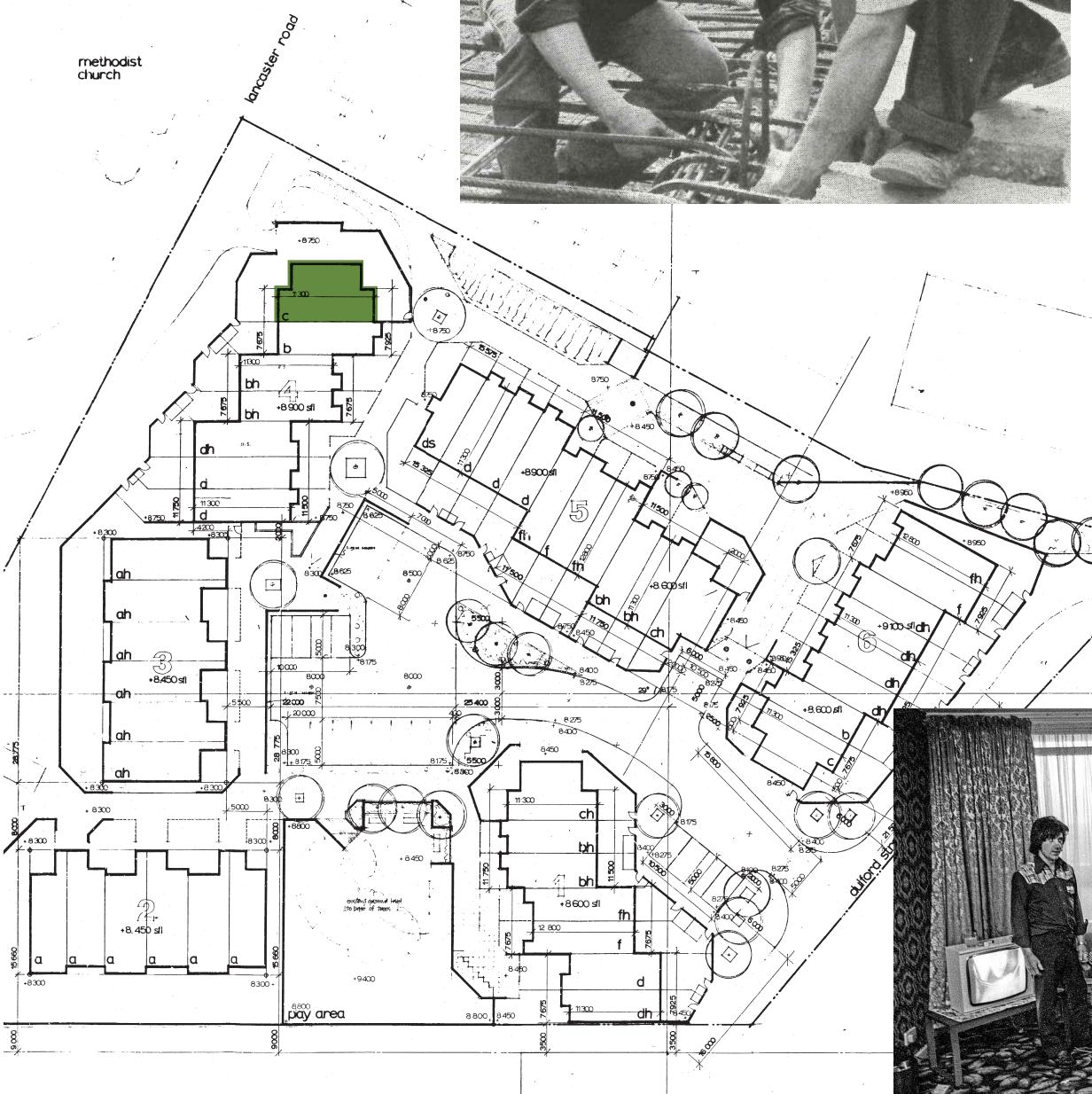
A history (& future) in carbon*

*Partially fictionalised and with
some very dodgy photoshopping!

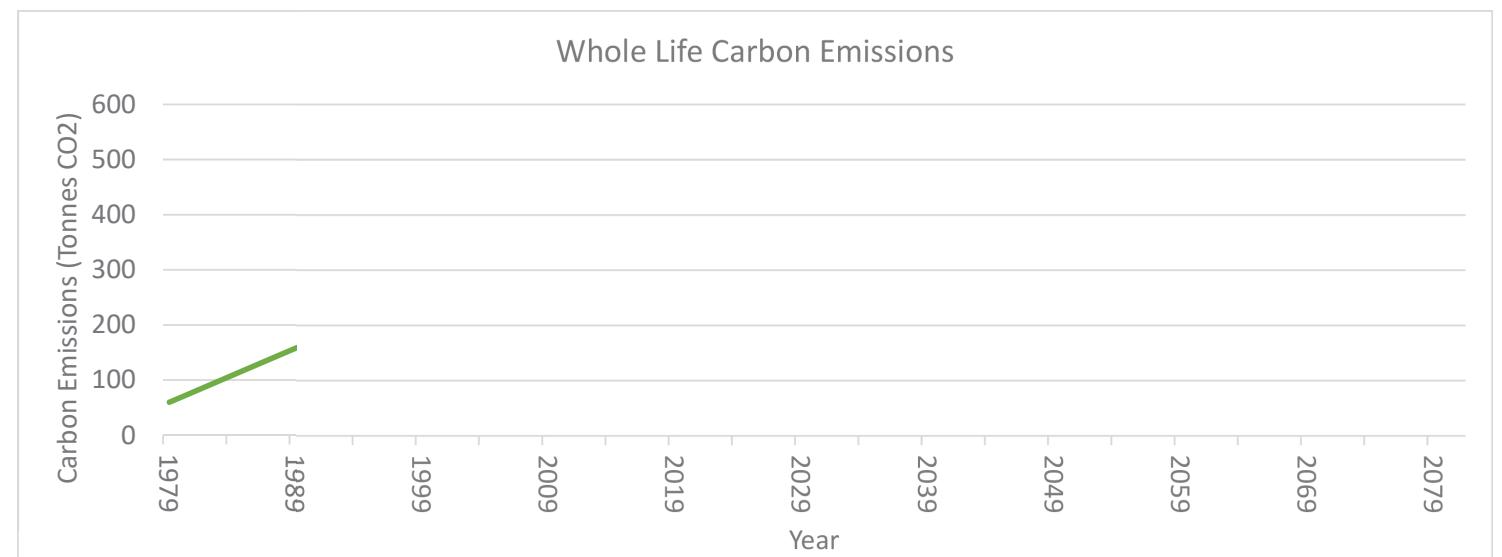
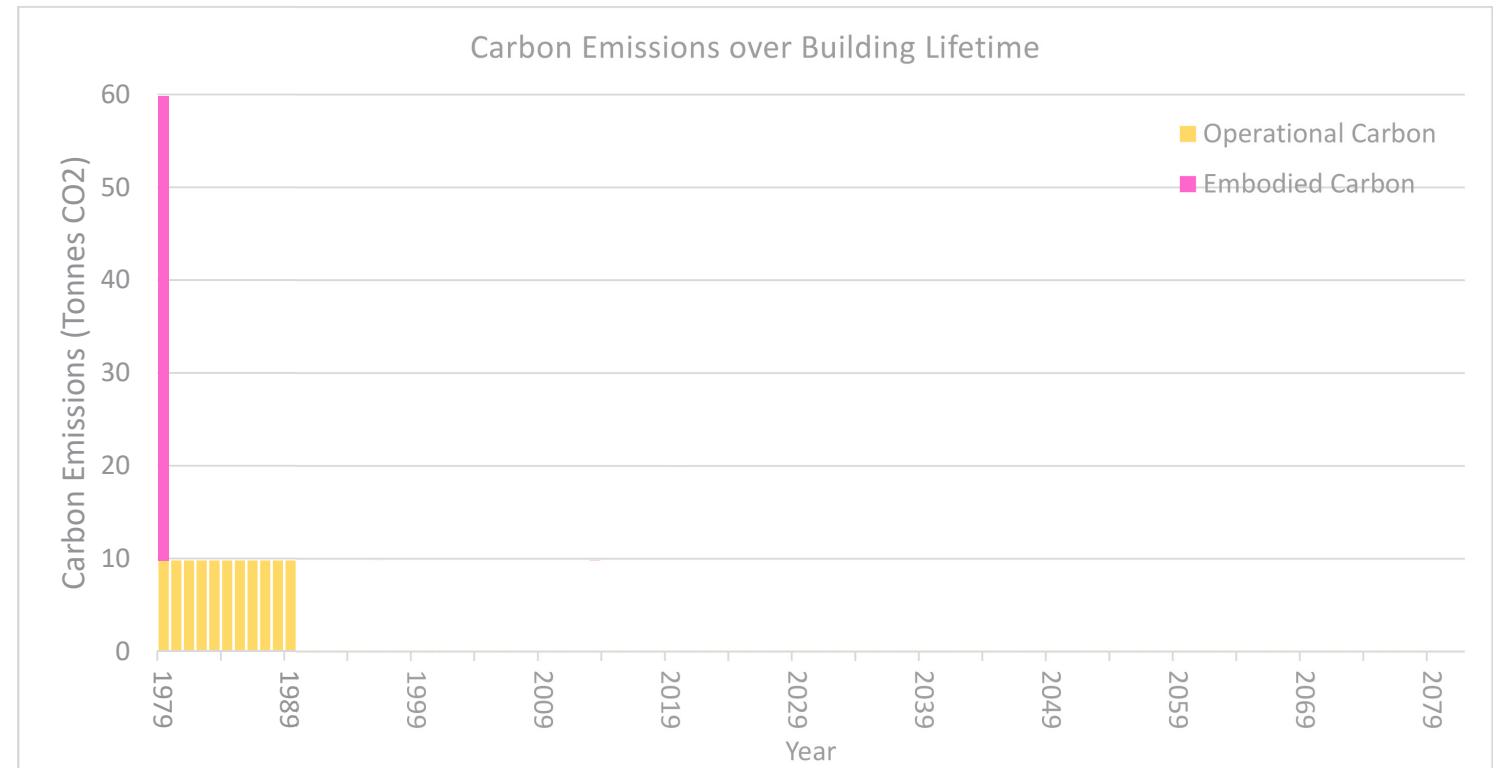
1969



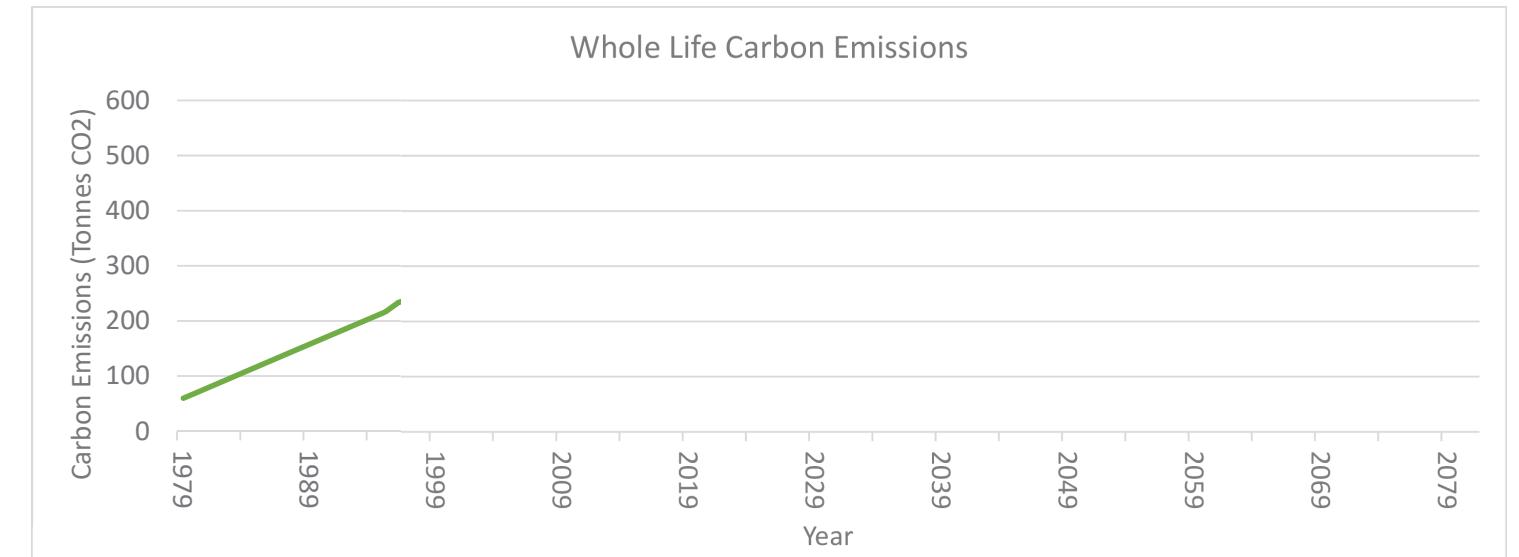
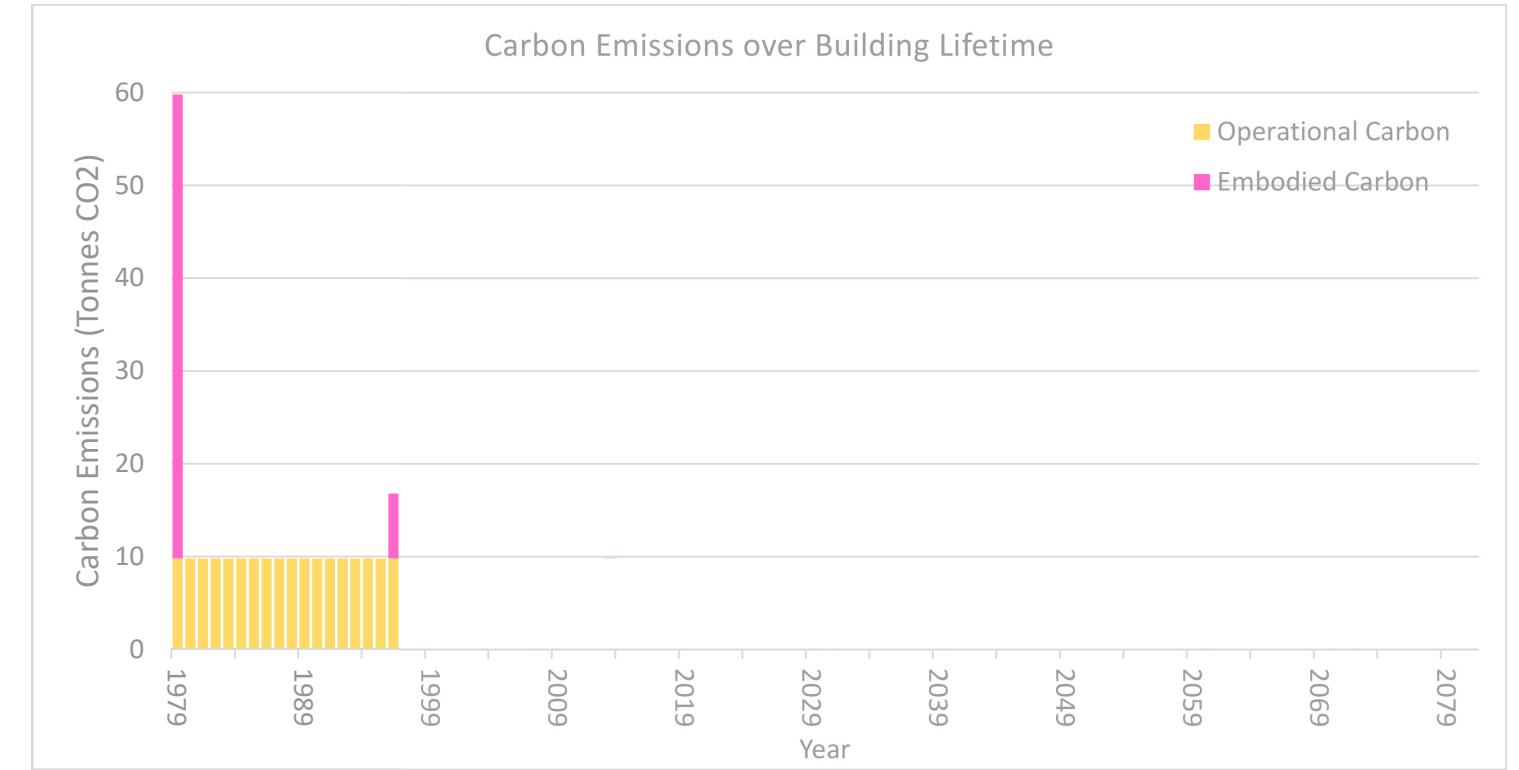
1979



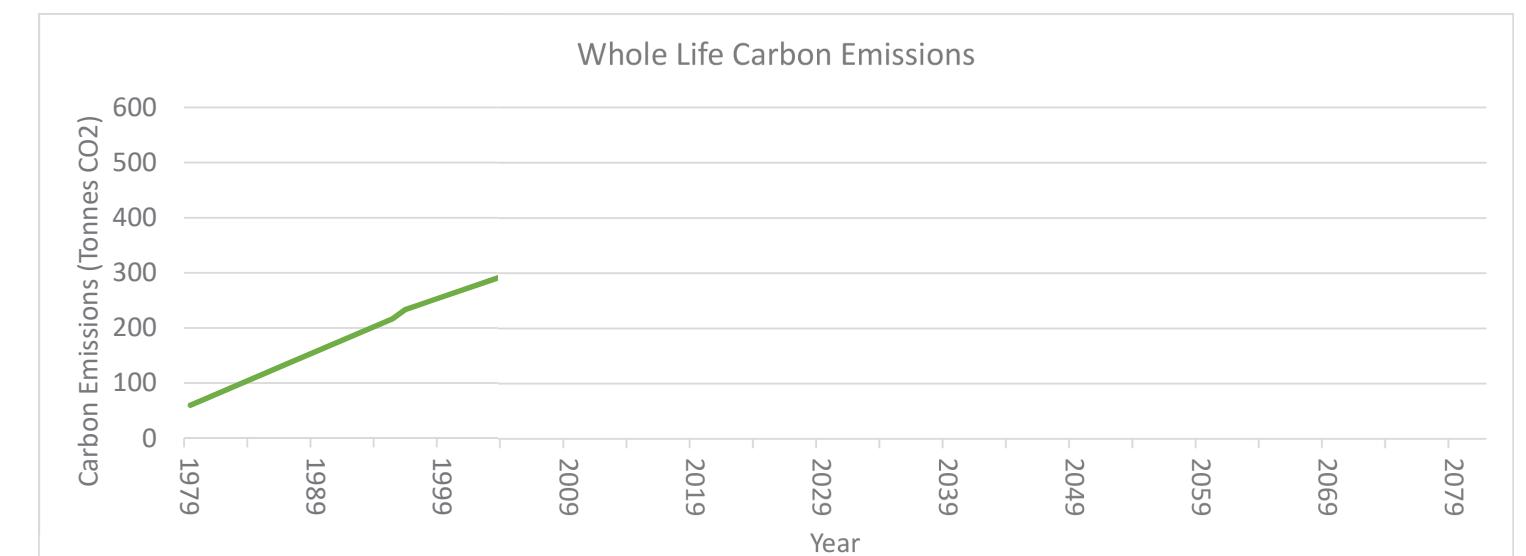
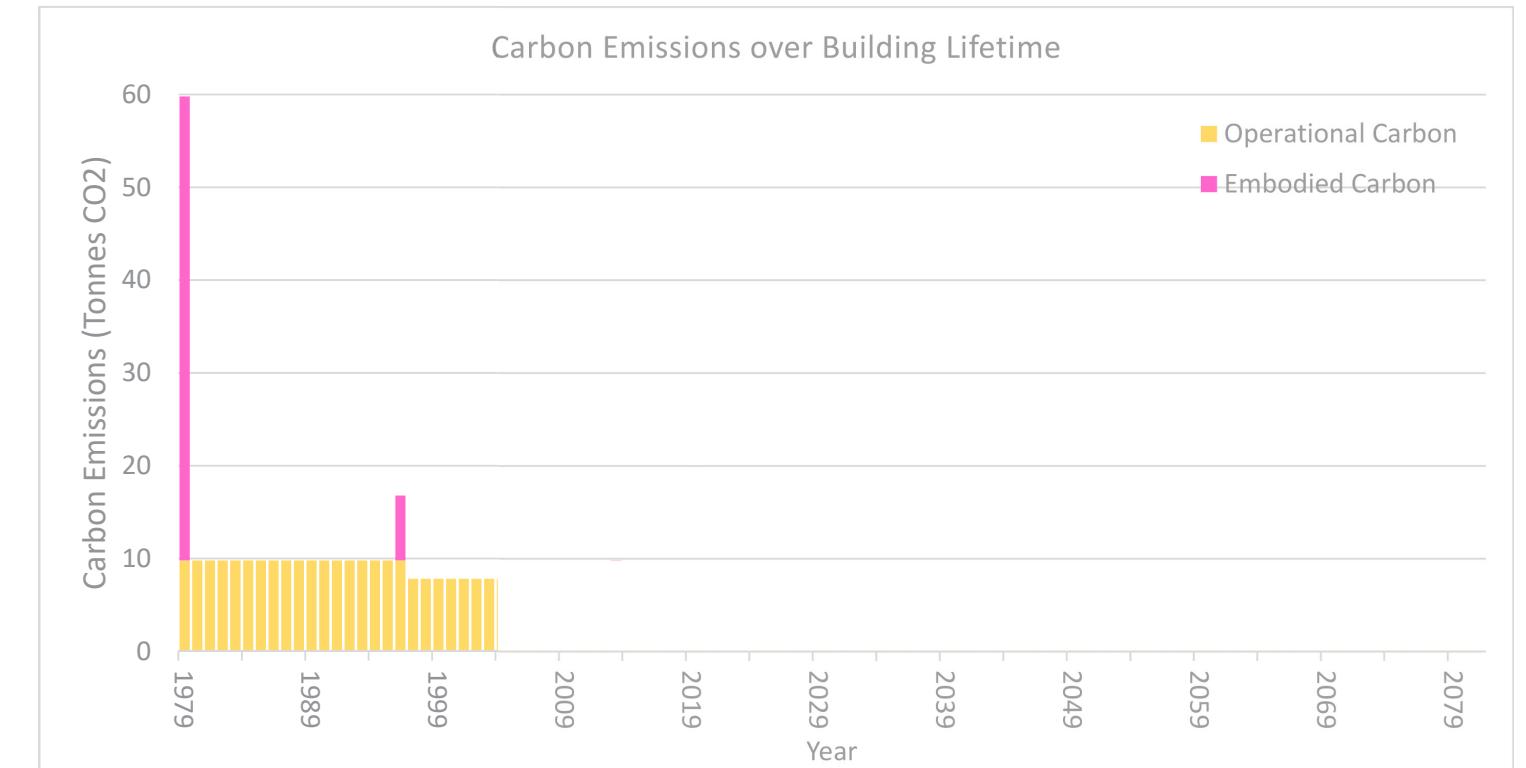
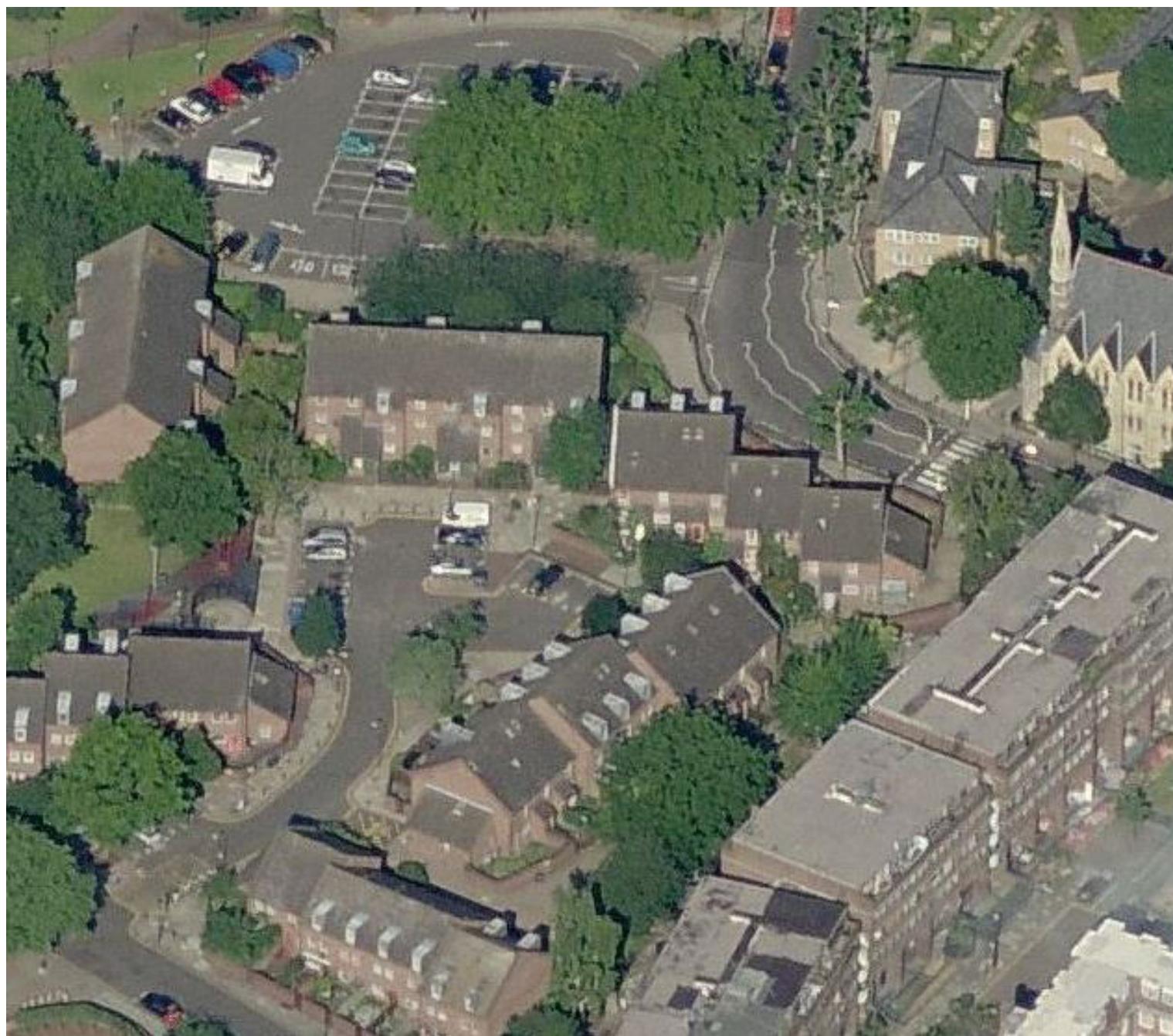
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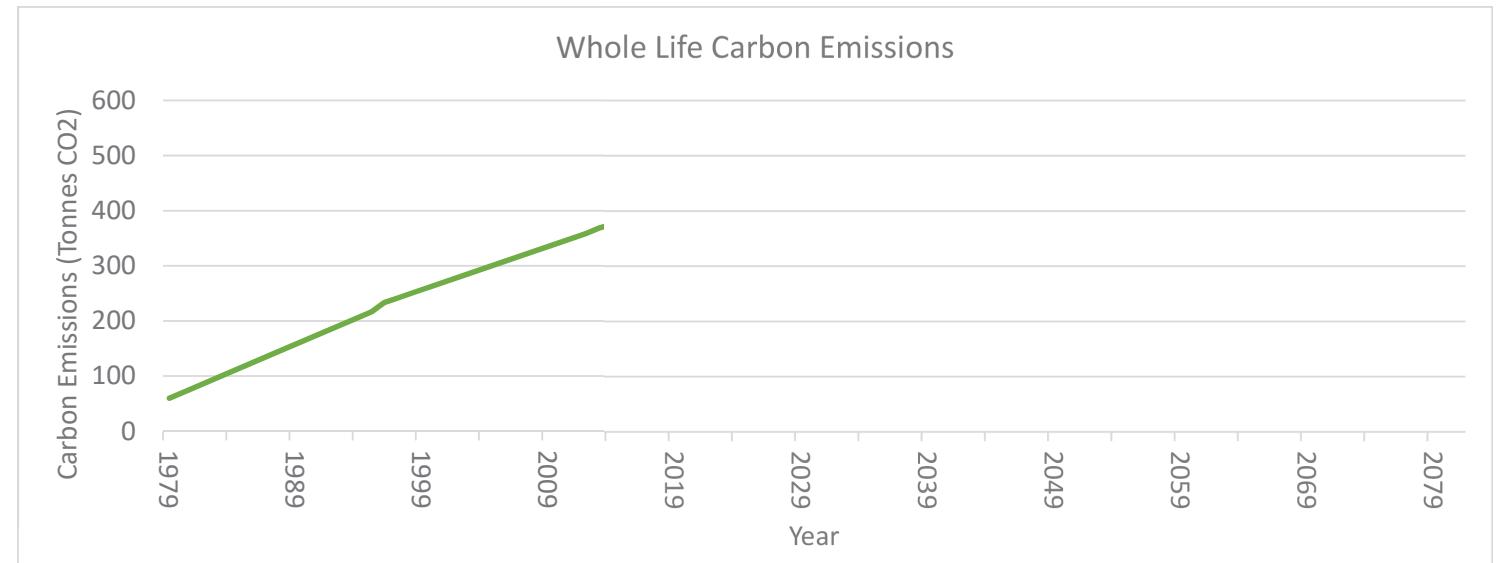
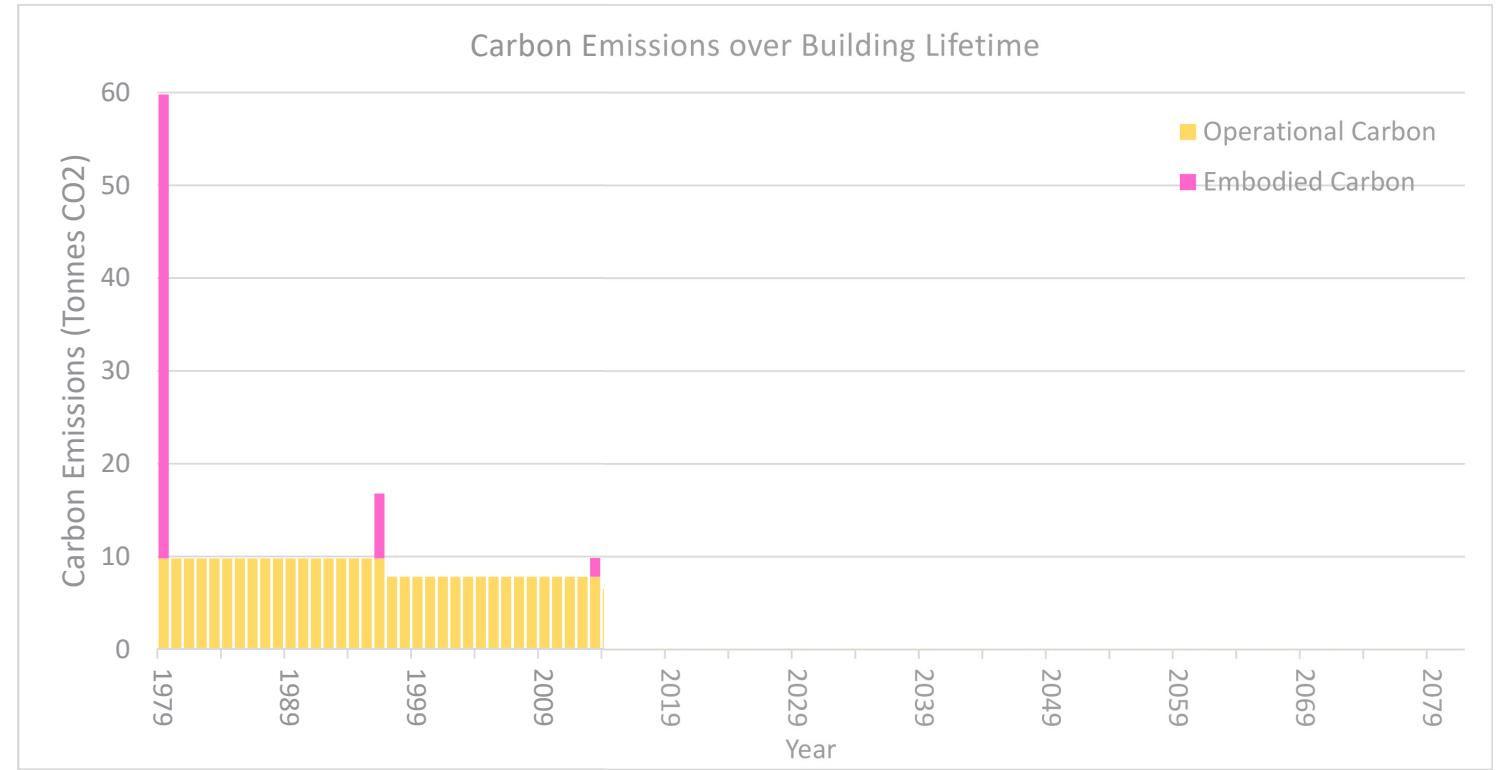
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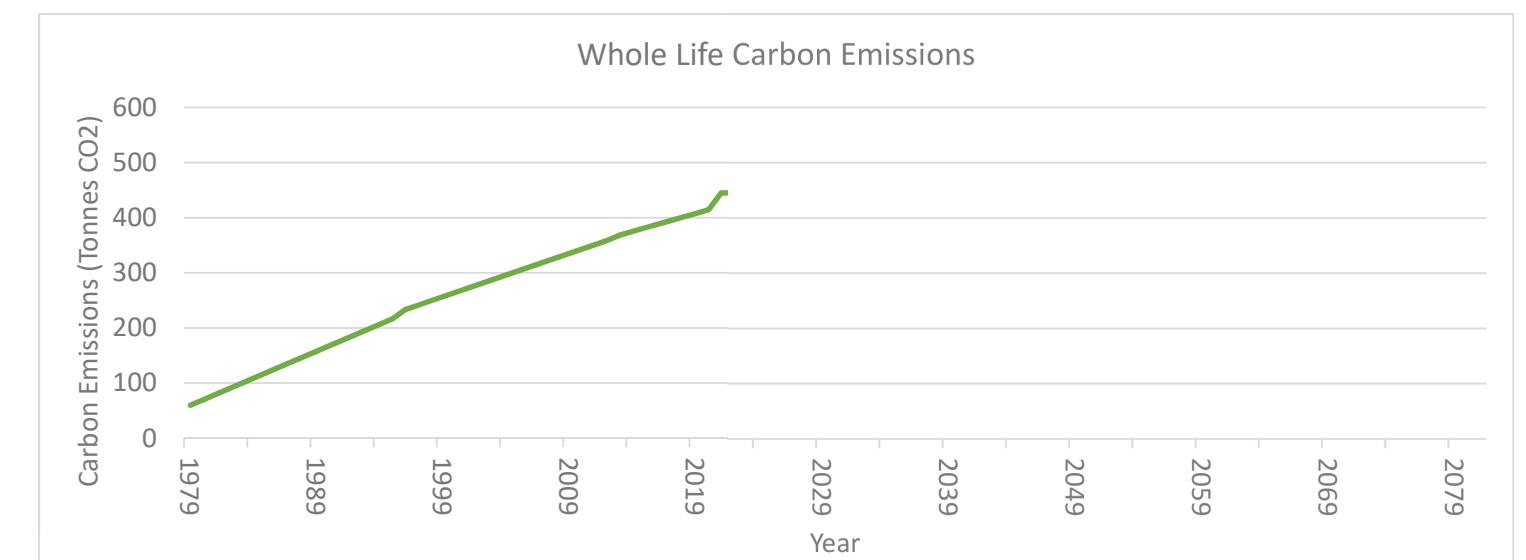
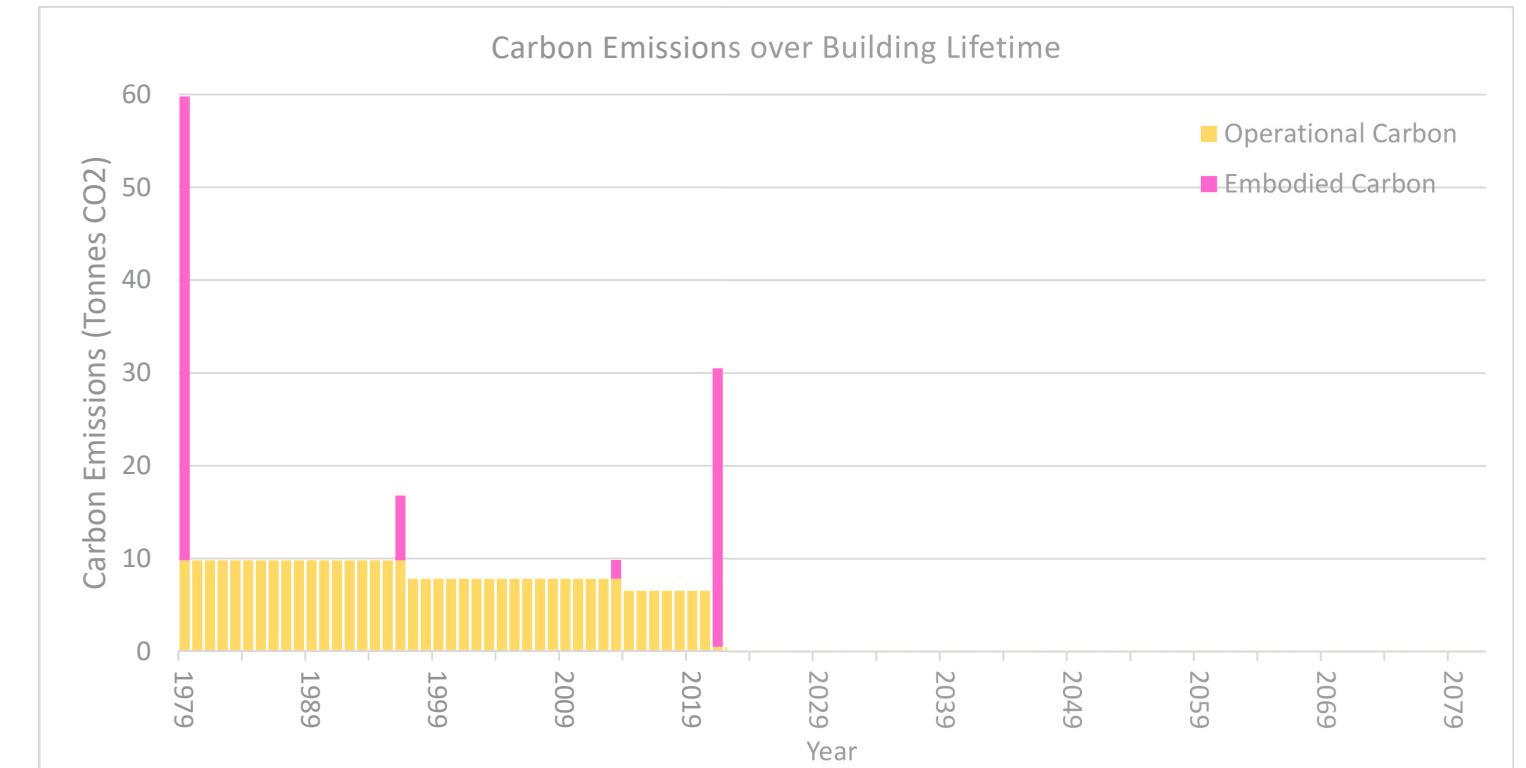
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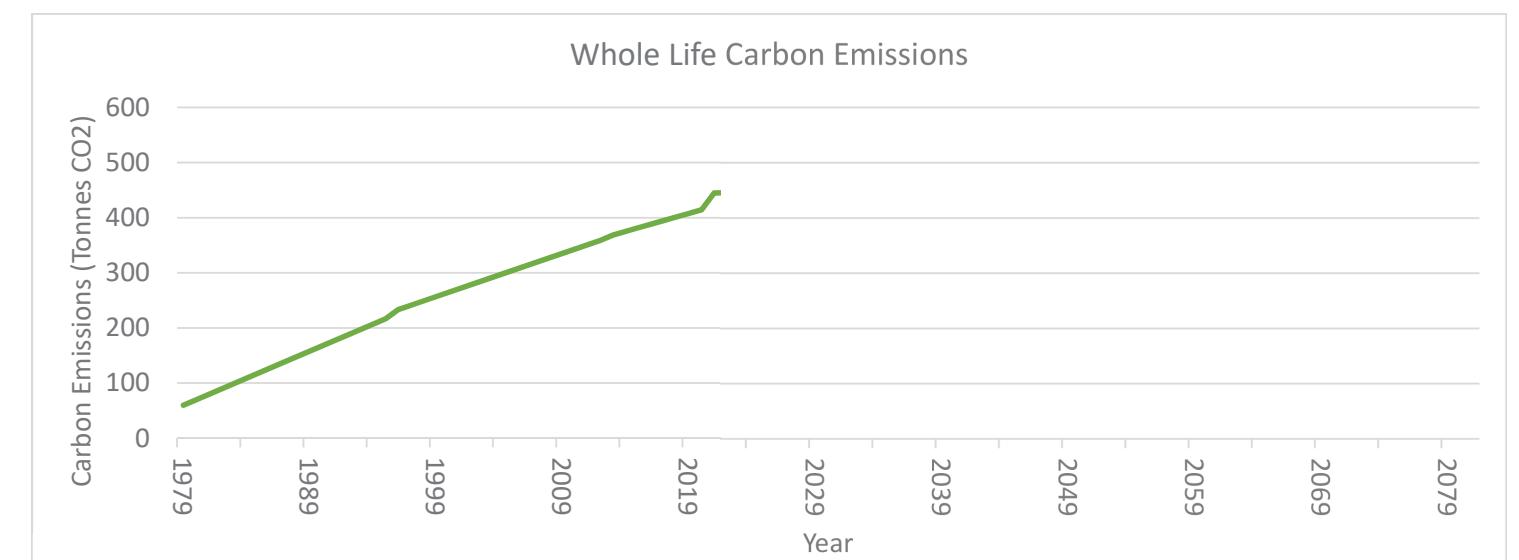
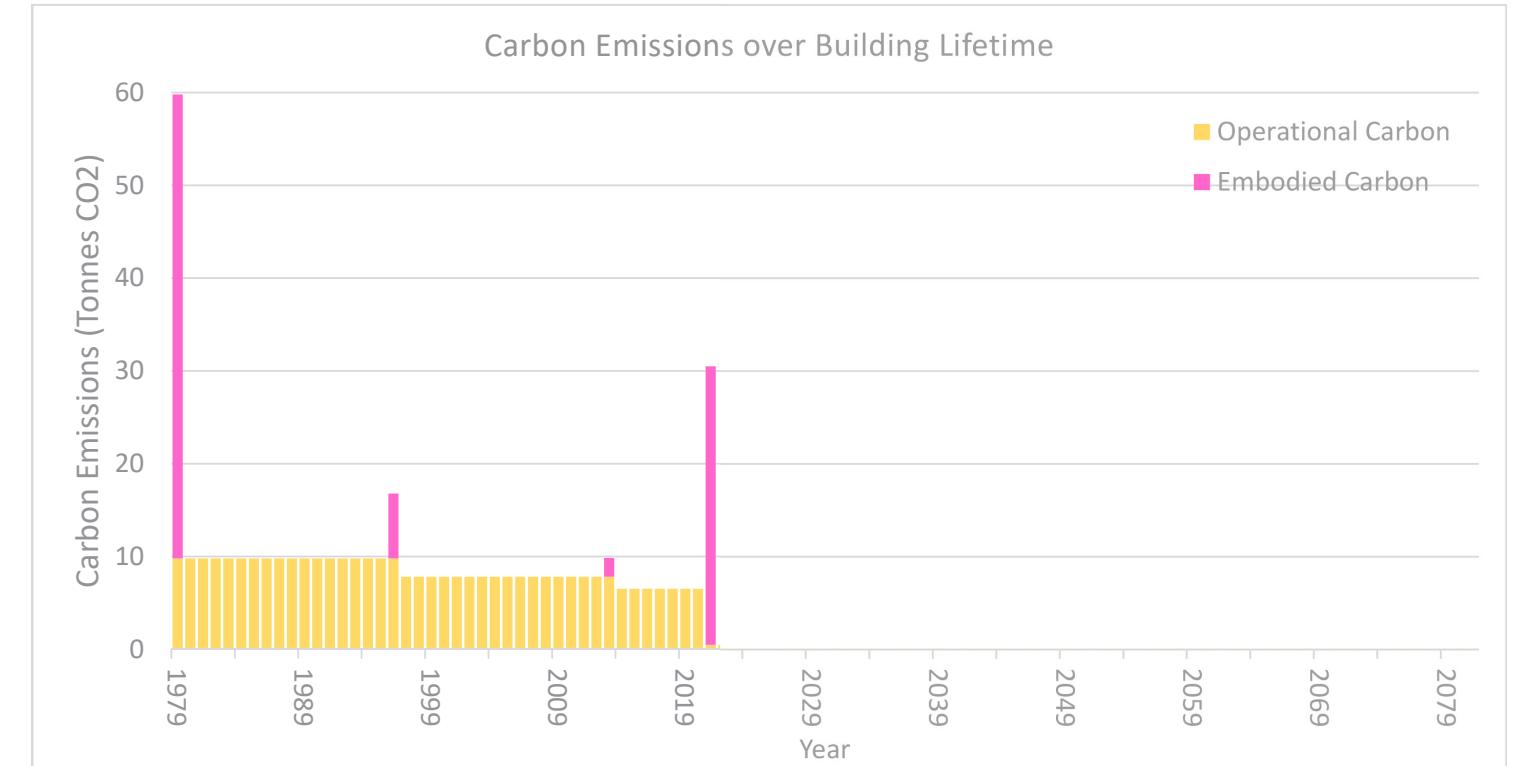
2013



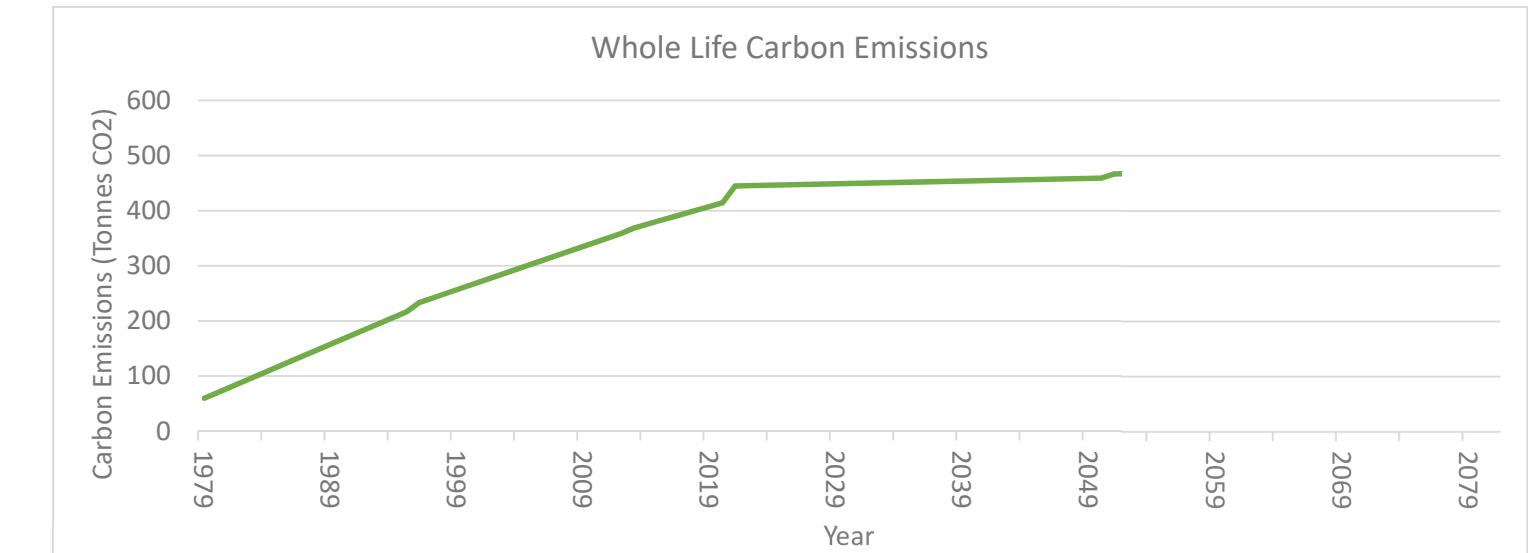
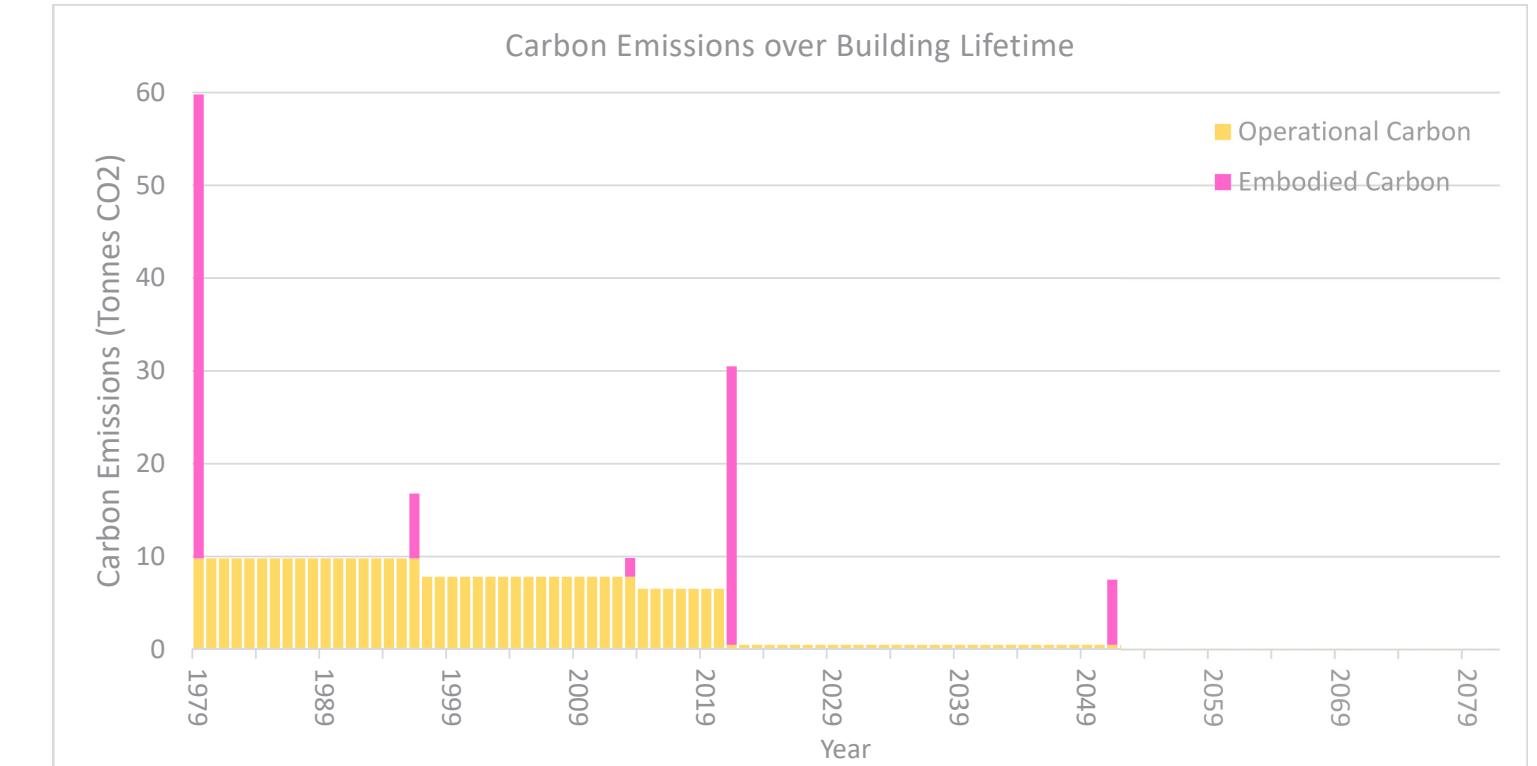
2020



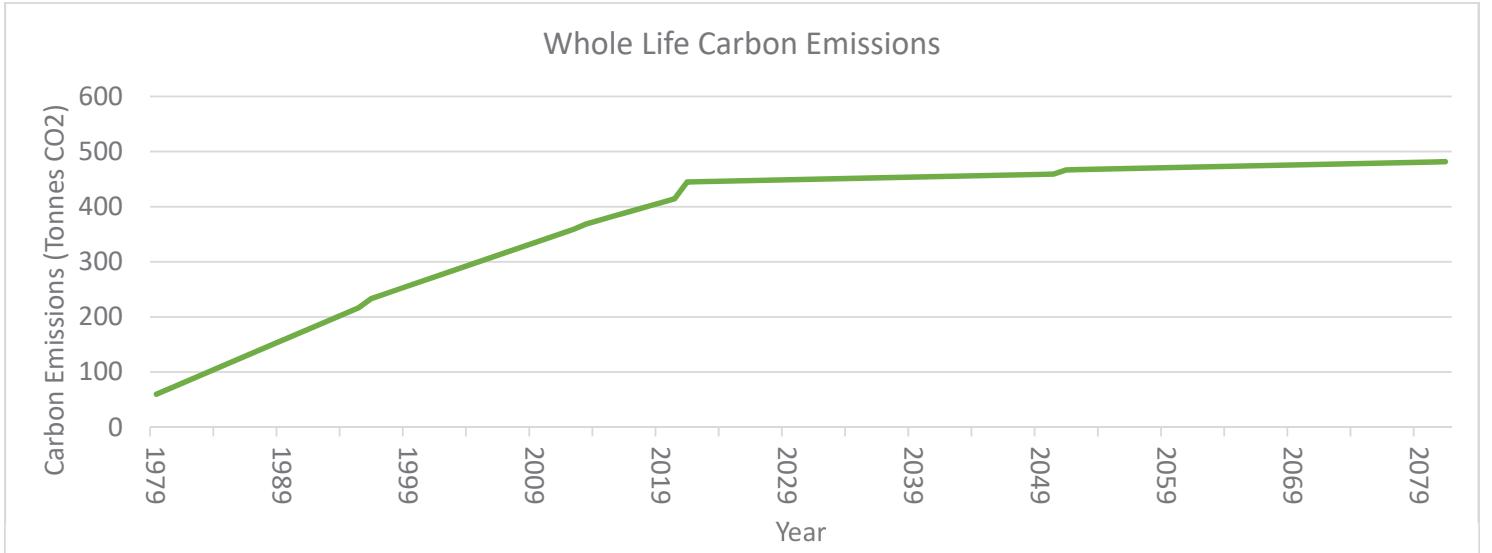
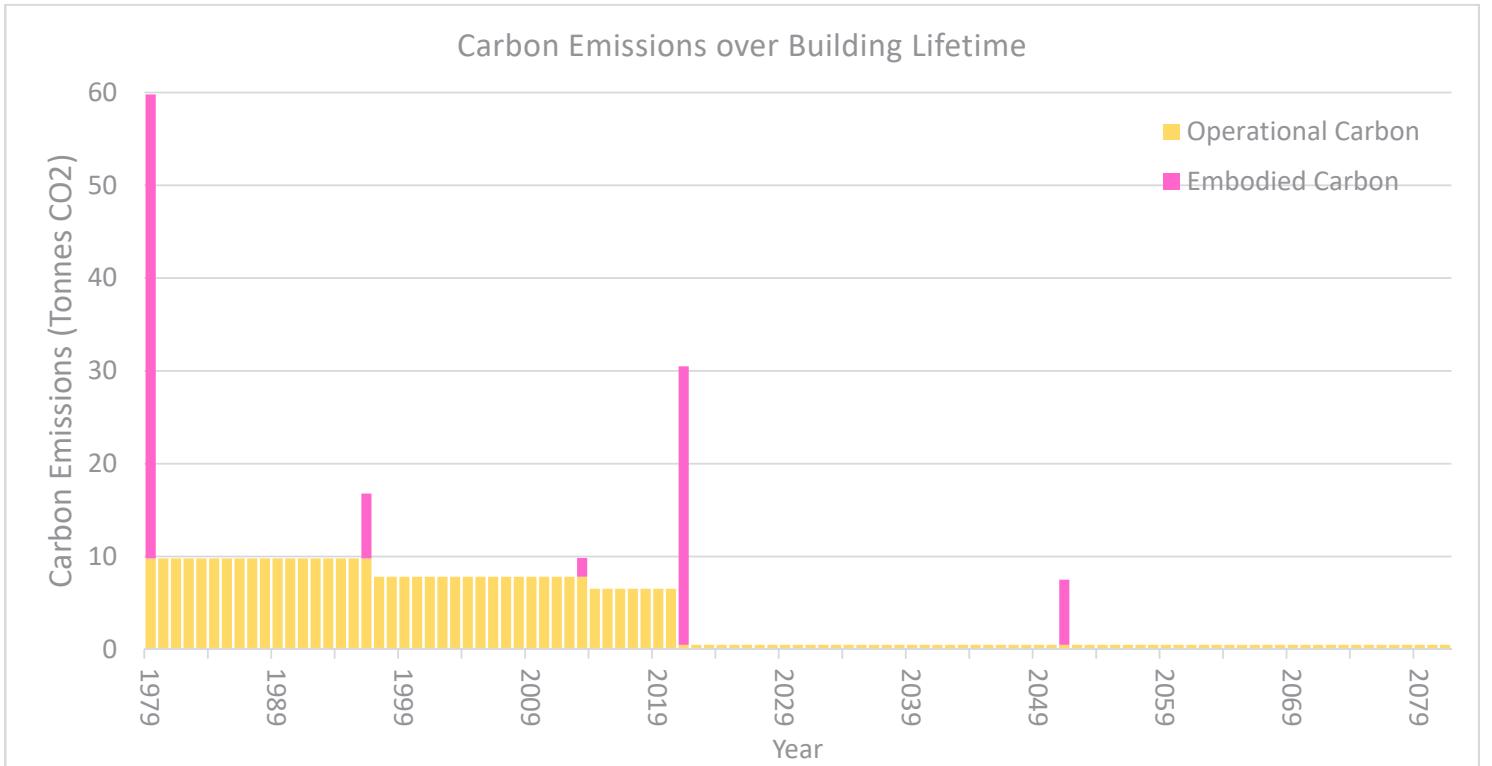
2020



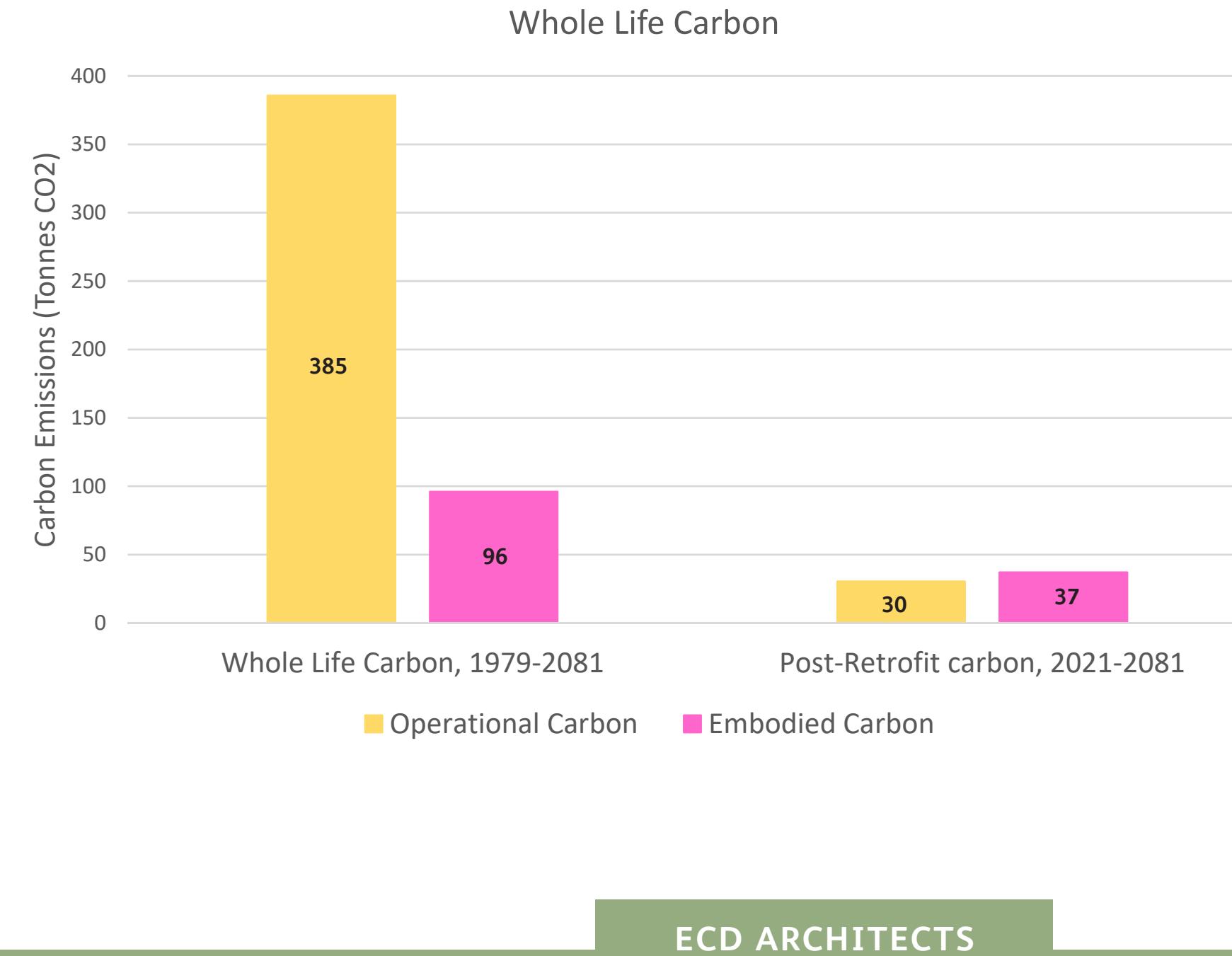
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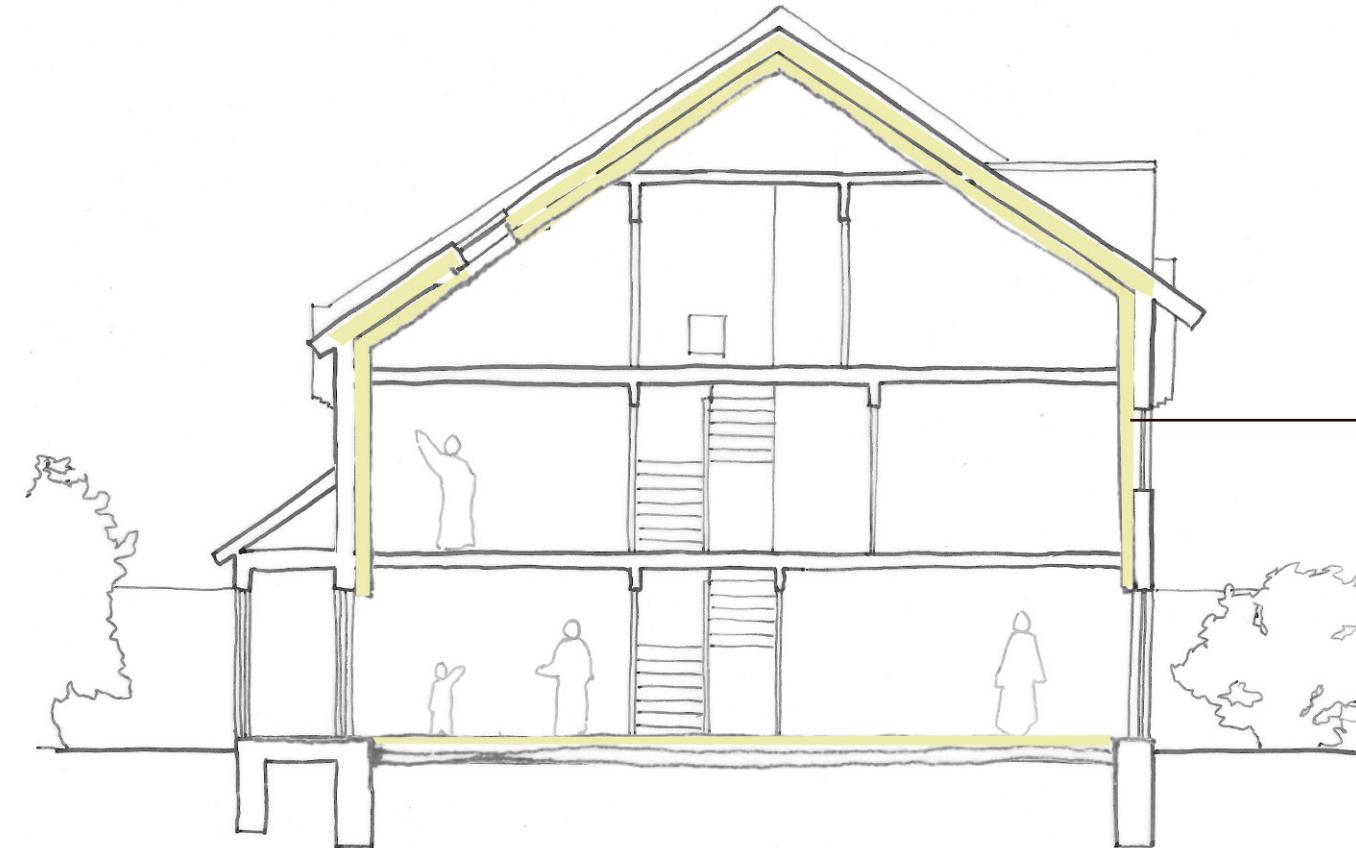
2081



1979-2081



Embodied Carbon



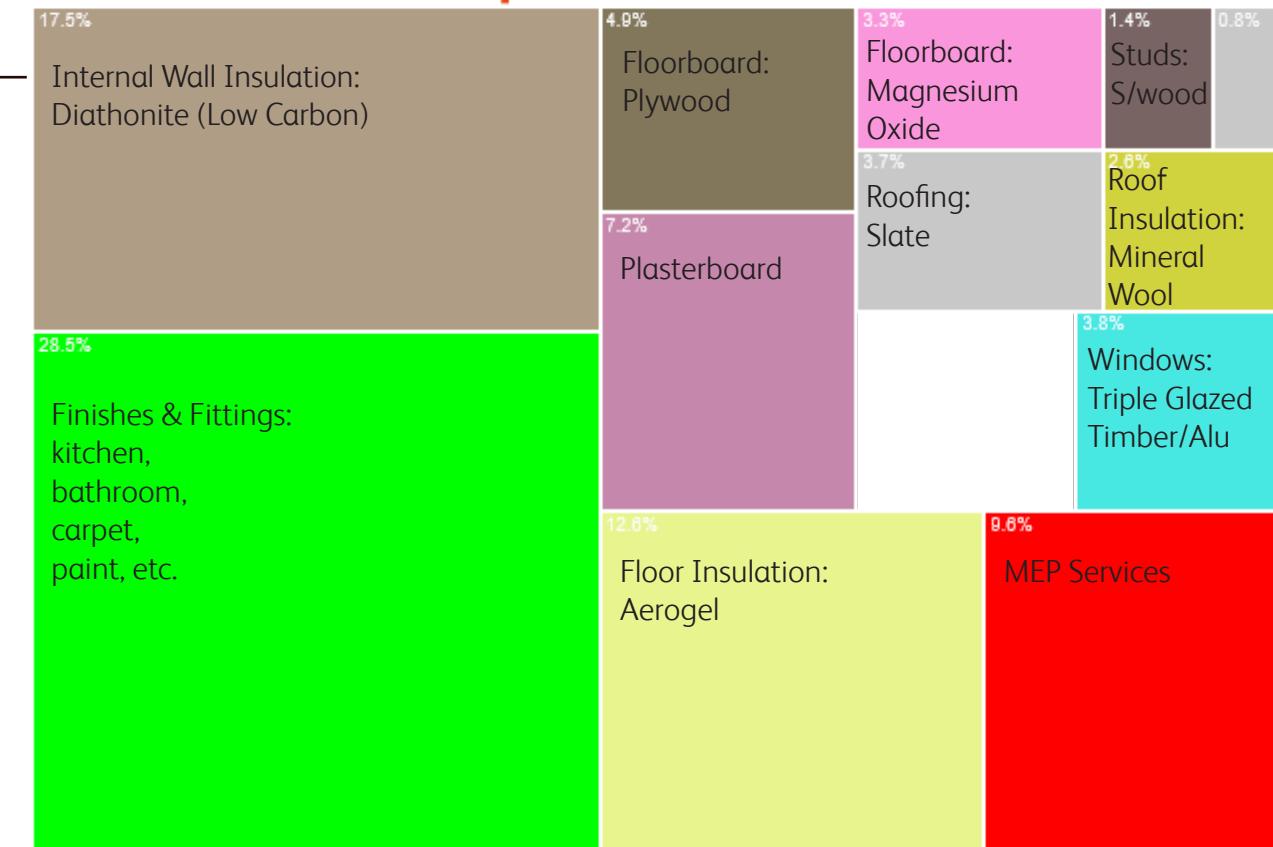
Total Embodied Carbon of Retrofit

30 ton CO₂e

256.27 kg CO₂e/m²

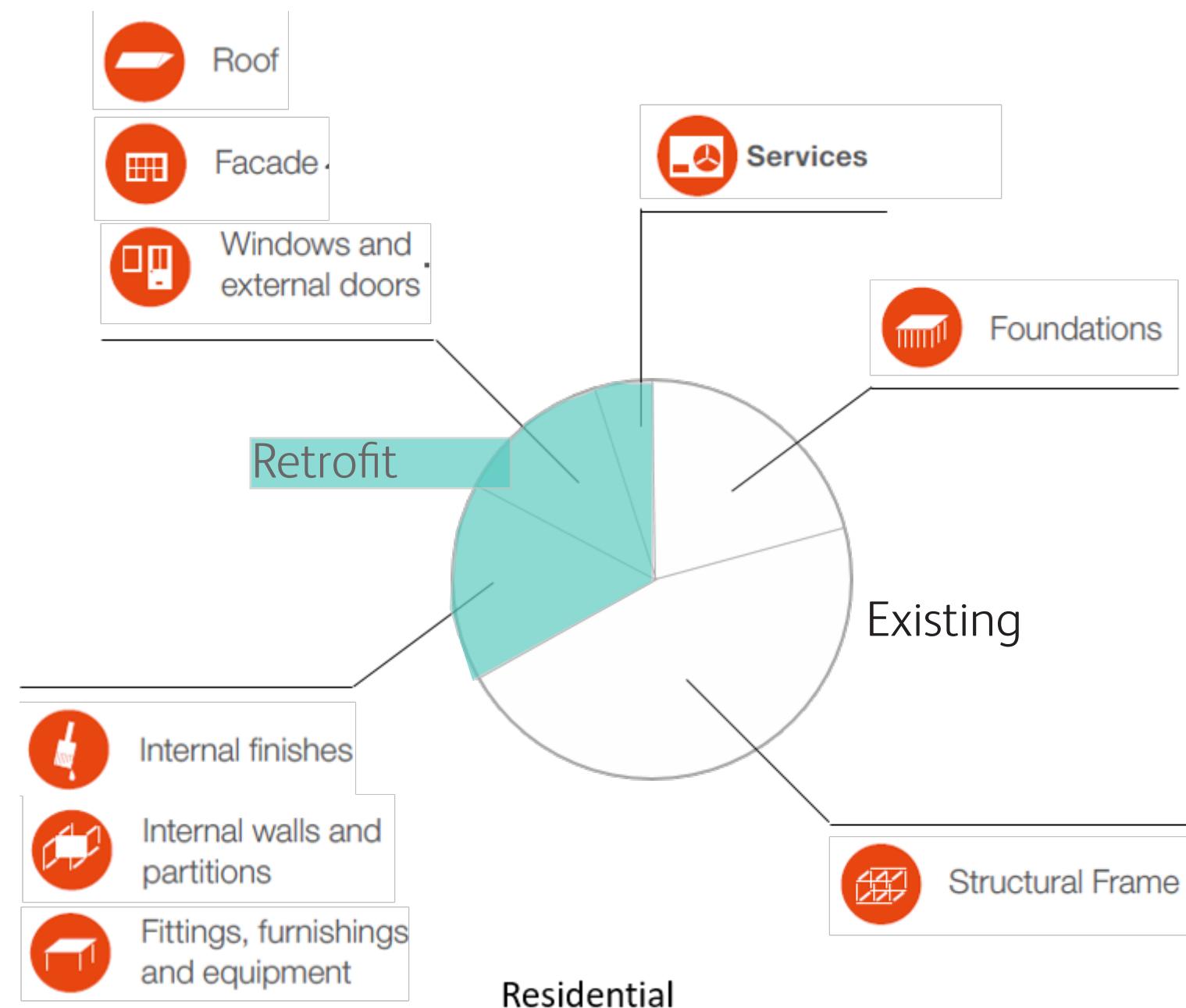
Identifying Core Contributors to Embodied Carbon

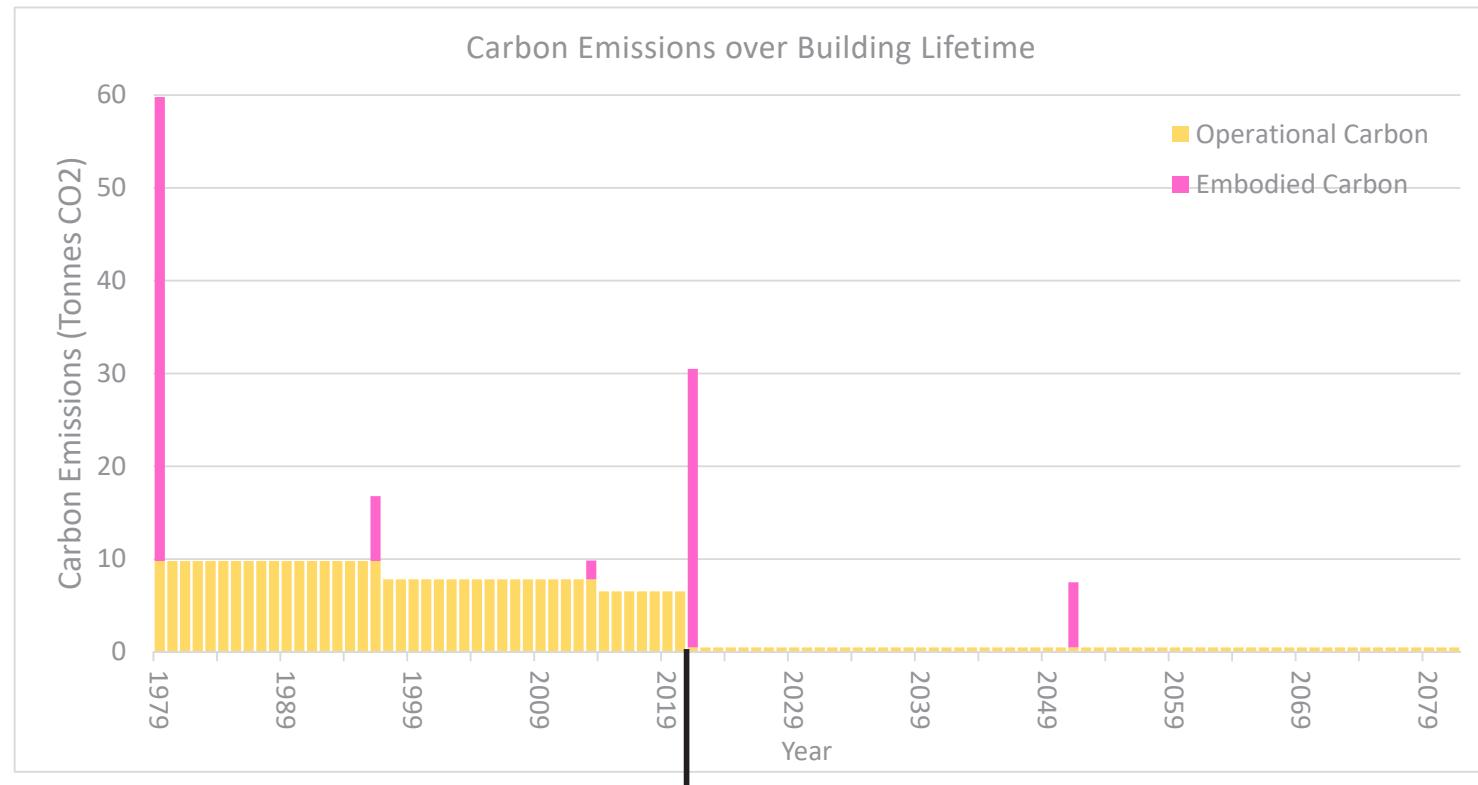
Embodied Carbon per Material



Primary Actions

- > Choose low carbon products
 - > from responsible (local if possible) sources
 - > Choose durable products
 - > Proactively Maintain Fitting & Fixings
 - > Choose easily maintainable (repairable) products
 - > Design for Servicability (demountability)
 - > Design for Flexibility (futureproof space & services)
 - > Choose items with Take-Back/Leasing Scheme
 - > Design for Disassembly (reuse & repair)
- = reduction in waste(value) in the building lifecycle



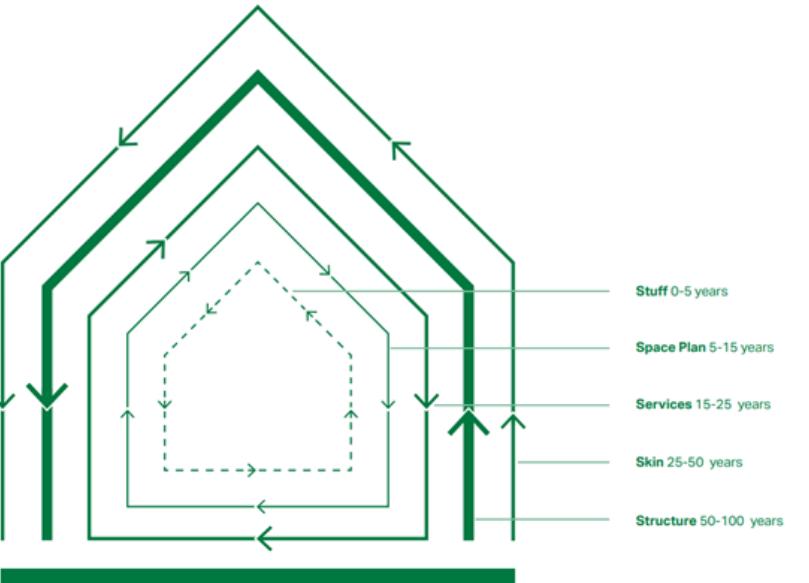


keep products, components, and materials at their highest utility and value for as long as possible and are repaired, reused or recycled, minimizing waste, from an built asset point of view:



by

- >Actively maintaining and monitoring performance
- >Recording and tracking the asset information



Smart Controls/ Monitoring



Systems Analysis

Occupant Feedback (POE)



Occupant Reporting

Building Passports/ Asset Mgmt.



Material Passports

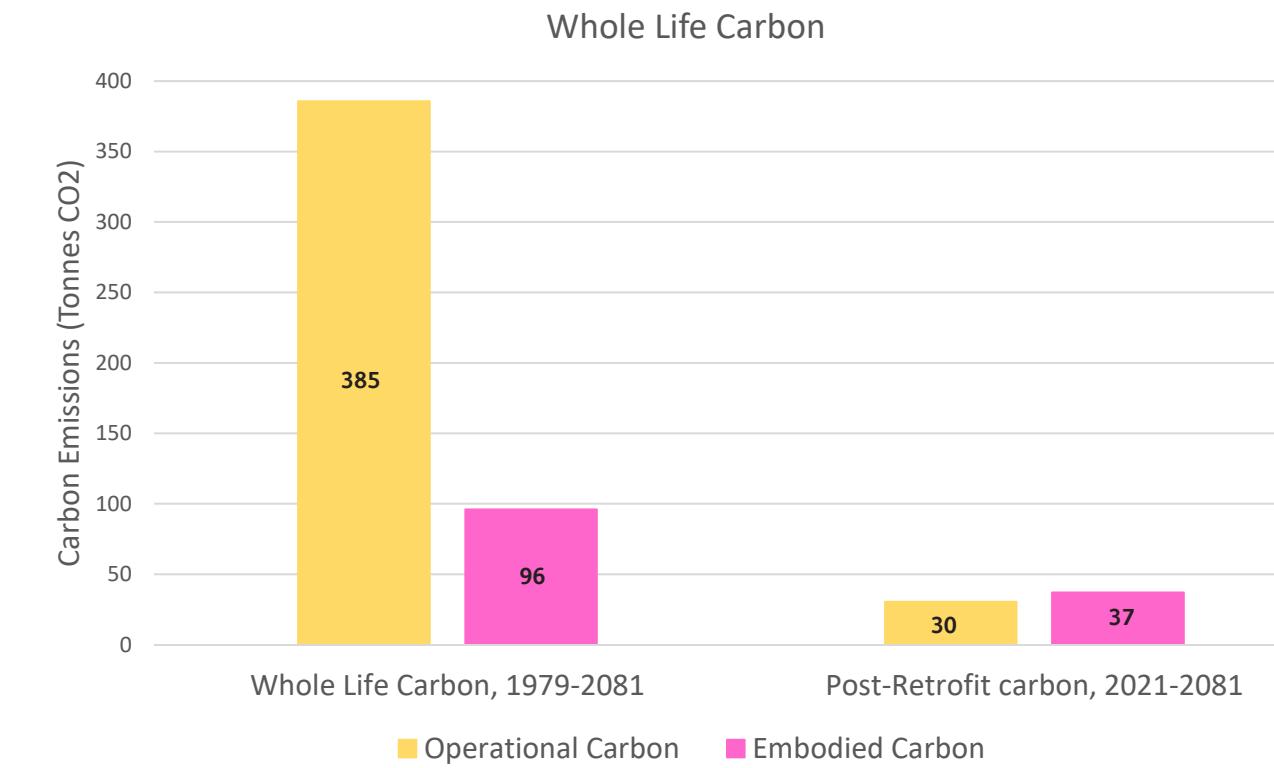


O&M Manuals



3D/ 2D Building Information

1979-2081



Embodied Carbon per Material

