CARBONF/

ABOUT US

Main contributors to climate change are the release of carbon dioxide and methane into the atmosphere. A possible solution to lessen the negative effects is the production of carbon nanofibers (CNFs) from these two gases. CNFs have a wide array of applications including their uses in the polymers, infrastructure, and materials industries. CarbonFi has been tasked with producing 120 tonnes/year of CNFs. To complete the task, CarbonFi has partnered with Carbonova, a start-up company already developing the process for CNFs production; the CarbonFi team is proud to present their results below.

MORE THAN 5,000 TONNES of CO₂ repurposed every year

THE MARKET

CNF Pricings Per Company



CarbonFi (outer diamter 90-600 nm) Nanografi (outer diamter 190-590 nm) Applied Sciences (outer diameter 70-200 nm) SigmaAldrich (outer diamter 100 nm)

Figure 3: Current CNF Pricing. [2], [3], [4]





PRODUCTION OF CARBON NANOFIBERS REPURPOSING OF CO₂

CARBON NANOFIBER



of CNFs produced every year





Figure 1: Drawing of a CNF structure [1]

APPLICABILITY



Figure 5: Application of CNF [6], [7], [8], [9]. Images obtained with microscope provided by Carbonova a) 10μm, b) 5μm c) 0.5 μm

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OUR PARTNERS



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BLOCK FLOW DIAGRAM

Figure 2: Block Flow Diagram for CarbonFi's complete process

carbonova

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