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Energy and Heating

Under My Warm Blanket: What We Have Learned About a Just Energy Transition

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How we heat our homes is not our free choice, but the result of specific social, economic and political conditions. This is expressed by the resource, which we can afford to heat with, how much is subsidised by the government, or promoted by the industry. In 1958 US companies began to flood the European heating market with low oil prices (Melsted 2018, p. 405). Next to coal this investment produced new dependencies on the new fuel and its producers. A similar dependency on big industry and on fossil supply can be found in today's Rheinland. The multinational energy provider RWE is strongly interlinked with the regional fossil extraction and use. The village of Morschenich is a compelling case study of that phenomenon. It is located on top of coal reserves, close to the brown coal open-mining pit of Hambach. Residents who could cover their heating needs with a large solar roof of their own are not to be traced. In fact, you can still locate old coal and oil-fired heating systems that can be smelled throughout the settlement-all coming from the fossil supply of RWE. The company is selling coal as an energy source, and now is greenwashing its image by promising a change in the villages, which it just resettled for coal mining. However, the much-publicised transformation of the energy-system in these villages does not seem to involve all people to the same extent. We wonder, how a just energy transition could look like instead.

Prologue

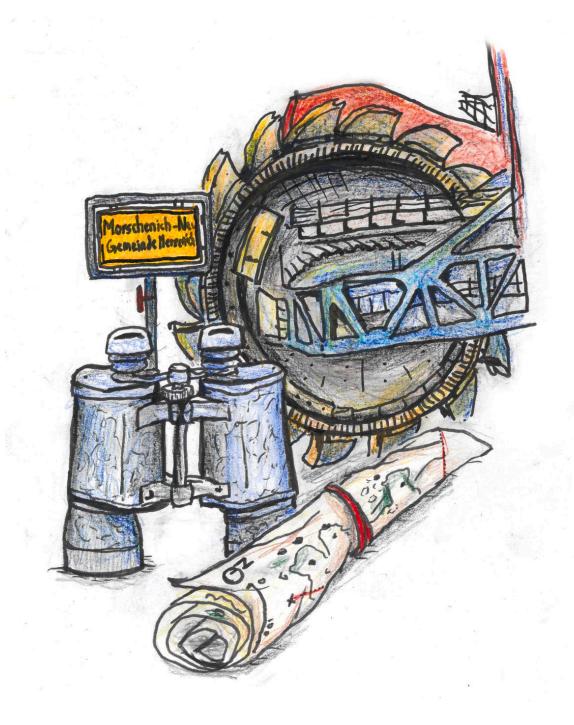


As published in numerous German newspapers during the summer of 2022, it became clear: without Russian gas supplies, heating could be in short supply next winter. Looking at the case of Morschenich, we realised that there is more to the story than the dependency on Russian gas.

When I bought this blanket last summer to make sure I could sleep comfortably in winter without intensive heating, I didn't realise the importance it would have for us in the coming months. We never really thought about where the oil and gas we need for heating comes from. Sure, we knew about the environmental impact of these resources. We all tried to heat as little as possible, keeping warm by drinking tea, wrapped into a blanket. But otherwise? The gas infrastructure that supplies our heating system is as invisible as the gas itself. And today the heating is almost completely automated, happening out of our sight. So why should we think about it? The energy crisis changed everything.

From the shelter of our warming blanket, we learned about the geopolitical tensions to which gas as a resource is exposed. The planetary gas trade creates strong dependencies precisely because gas is used for heating; essential for survival in our latitudes. We learned that this gas consumption is manifested by a huge infrastructure, from the extraction to the stove. And from the warming protection of the blanket, we would like to elaborate on our project. It is an investigation of Morschenich-Alt and -Neu, which takes up the theme of heating and the resulting dependencies that we first encountered in gas. We show that even small communities like Morschenich are entangled into globalised corporate interests.

Introducing Morschenich



On 11 May 1977 Ministerpräsident Heinz Kühn signed the *Braunkohleteilplan*, which was drafted by the regional Brown Coal Committee. The village of Morschenich should be mined away. According to the plan it was located in the projected mining pit. The future of the village was changed by the decision to make energy from the local brown coal.



In 1978 RWE started with coal extraction in the pit mine. Mrs. Kaiser a former inhabitant of Morschenich-Alt reflects on her emotions when the resettlement of her village was announced.

https://youtu.be/_eXog4NXTcs

In our field trip, we were focussing on the development of heating in the region. From heating with wood, through single coal stoves to central heating systems using liquid fossil fuels like oil and gas, the historical development of the different modes of heating can be traced in the villages. We met different people, who were showing us how they were handling their home heating.



Logbook: Sketches of various residents from Morschenich-Alt and -Neu

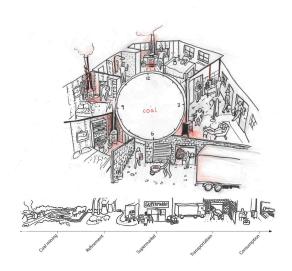


Logbook: Photos of Morschenich-Alt and its residents

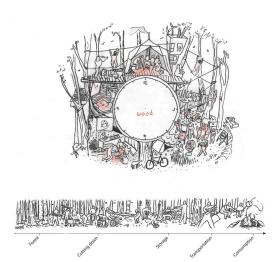


Logbook: Photos of Morschenich-Neu and its residents

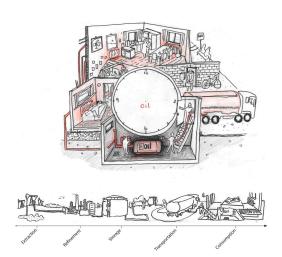
In Morschenich-Alt coal, oil and wood is used for heating. In Morschenich-Neu, the mode of heating is a centralised district heating system using wood-pellets as a resource. Linked to how the mode of heating structures the day, the used resources create unique supply chains.



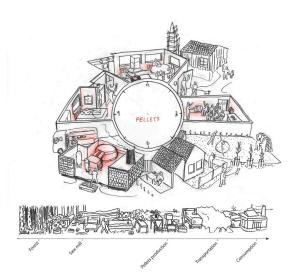
Different modes of heating in Morschenich-Alt and -Neu (coal)



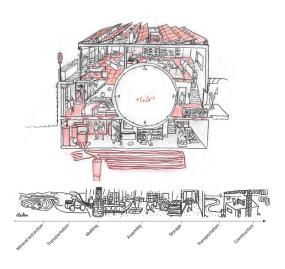
Different modes of heating in Morschenich-Alt and -Neu (wood)



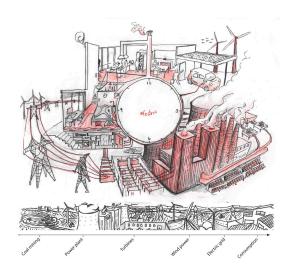
Different modes of heating in Morschenich-Alt and -Neu (oil)



Different modes of heating in Morschenich-Alt and -Neu (pellet)

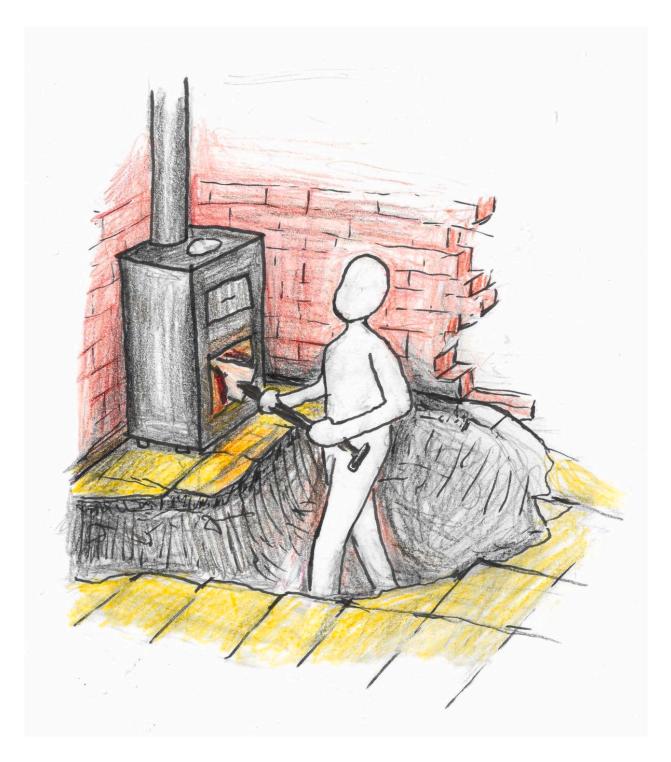


Different modes of heating in Morschenich-Alt and -Neu (solar)



Different modes of heating in Morschenich-Alt and -Neu (electricity)

A Garage Full of Coal: Wolfgang's Case of Fossil Dependency



Wolfgang, an inhabitant of Morschenich, tells us that he heats with coal. It unfolds as a paradoxical situation, which originates from his socio-economic condition as a worker in the mining industry and the dependency on his employer RWE.





A GARAGE FULL OF COAL

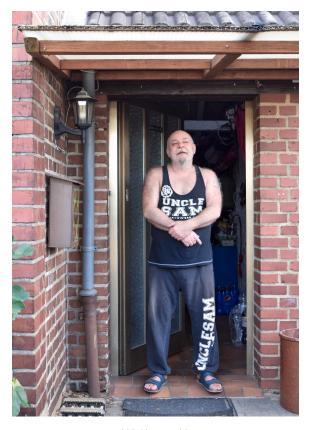
TYPENWOHNHÄUSER IN MORSCHENICH-ALT

As we enter the partially uninhabited village of Morschenich-Alt on this cold morning of the 26th of October 2022, still surrounded by morning fog, we smell coal. It is not the smell of the nearby mine, but the smell of heating.

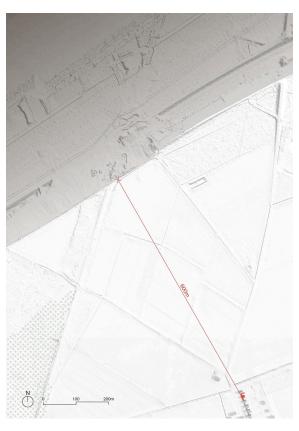


Morschenich-Alt

Just a little more than 500 metres from the edge of the opencast mine, we visit the former RWE worker Wolfgang Hartwig at his home, one of the very last inhabited houses in the village, that he heats with coal. His house is a Typenwohnhaus erected for RWE mining workers like him in the 1950s (Huntscha 2021) and is equipped with several coal stoves—one for each room. He shows us his garage: it is almost completely filled with coal briquettes, sufficient fuel for the winter to come. The briquettes were produced in a nearby RWE factory and provided at low cost by his former employer: RWE. He himself stood for over thirty years on the assembly lines in the opencast mine. Probably Wolfgang and his colleagues sourced the coal for the briquettes with which Wolfgang is heating in the same mining pit, themselves. This coal is the reason for the resettlement of the village.







Distance of Wolfgangs's home to the open pit mine

Unlike many others in the village, Wolfgang has never been offered relocation to the new settlement Morschenich-Neu. To us, he comments: "Most of the people who moved away decided to do so quite early on, and we can't understand that, because this new infrastructure in Morschenich Neu is all so sterile and city-like." RWE is subletting the dwelling to him for at least until next summer. What will happen after that was still uncertain, when we spoke to him and his 80 year-old mother.



The coal stove in the kitchen.

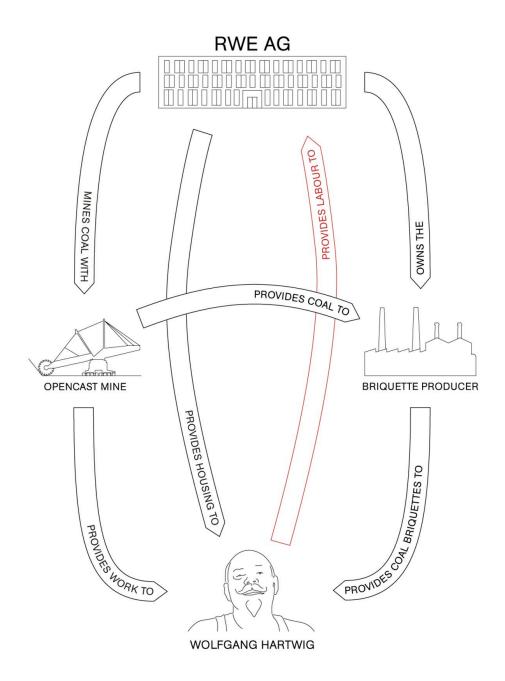


The coal stove in the guest room.



The coal stove in the living room.

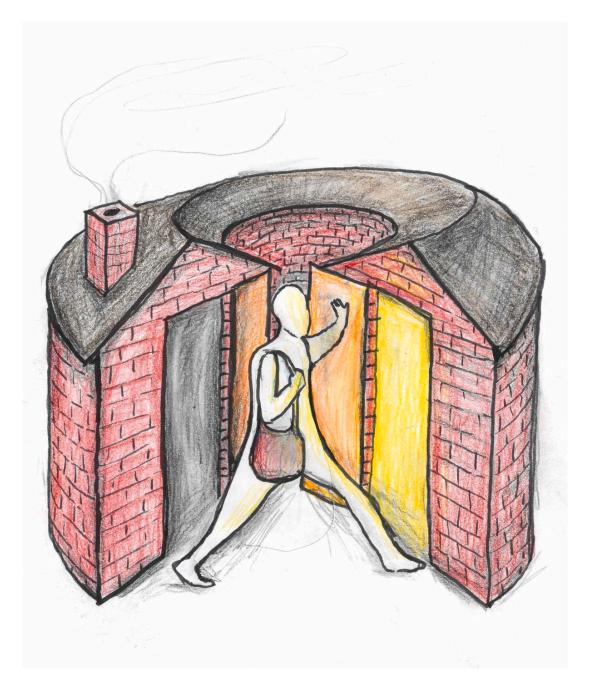
"The houses are not in the best condition. Since the open-cast mine was planned here, nothing major has been done. The roofs of the houses were done in the 1980s, but nothing has been done since then." Comments Wolfgang on his landlord, RWE, adding that he cannot afford to renew the heating system himself. He reports that he enjoys being able to heat rooms individually and only when he is at home.



The dependencies of a former coal mine worker in Morschenich.

Working for RWE provided cheap energy and security for their workers (VdPV 2017). But at the same time, the job undermined the existence of Wolfgang's own village, which not only heats with coal, but also has a coal reservoir underground. Only people who already owned a proper house, for which RWE had to reimburse them, could afford to move to the new village, Wolfgang couldn't. The choice of heating materials reflects one's socio-economic possibilities. In Morschenich, RWE reinforced this socio-economic dependence of RWE employees through its Fordist policy.

Reproducing Dependency: New Homes, Old Rules



The resettlement of the village which was forced by the approaching mining pit offered an opportunity to install new infrastructure for a communal energy transition. But instead of loosening ties to RWE, the municipality worked in close exchange with the company. As a result, the municipality and energy provider predefined the mode of heating for all inhabitants.



Am Kamp Street in Morschenich-Neu



Frau Kaiser's house (left) in Morschenich-Neu was one of the first houses built in the village. Source: Wikipedia [https://de.wikipedia.org/wiki/Morschenich-Neu#/media/Datei:Ansicht.JPG], 2015.



An already demolished part of Morschenich-Alt where Mrs Kaiser lived. Source: Aachner Zeitung [https://www.aachenerzeitung.de/lokales/dueren/es-darf-nur-einmorschenich-bleiben_aid-48379679], 2020.

She holds tight onto the door frame when she talks to us, asking us not to record her voice. Described by others as the soul of the community who knows everything about the new village, Mrs. Kaiser is a seventy-year-old woman who has spent her whole life in the village—or rather in the villages that were called Morschenich. Her house was the second to be completed in Morschenich-Neu. What she did tell us was how she feels in the village, which with the proximity to shops and facilities now makes age-related limitations more bearable for her.



Morschenich-Neu

"The fact that the new heating system was predefined deterred some people here from moving to the new place. It wasn't easy for me and my husband at the beginning either. We had oil heating in the old house and we actually wanted to change to a heat pump in the new place," recounts Mrs Kaiser.

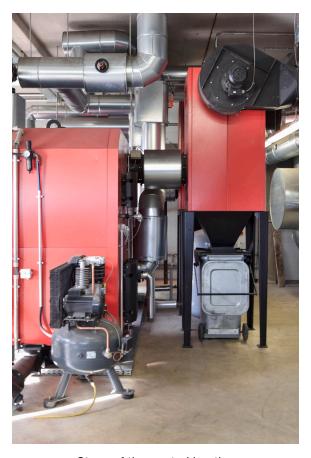




Mrs. Kaiser

Central heating in Morschenich-Neu

Only too gladly would she have installed a heat pump. She was lucky to get enough compensation for her old house to be able to afford to move to the new village. Yet in Morschenich-Neu, the municipality and the energy service provider stipulated that the entire village would be heated with pellet district heating (Gemeinde Merzenich 2014), which would be provided and maintained by the municipal utility in Düren—at that time 49.9 percent owned by RWE (Stadtwerke Düren 2022).



Stove of the central heating system in Morschenich-Neu

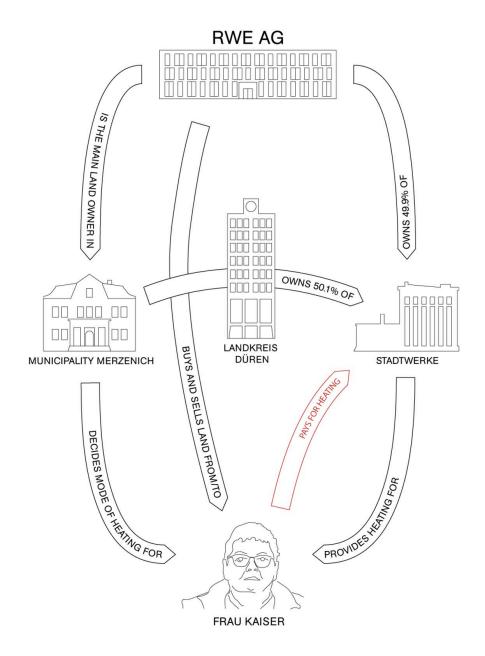


Heating storage unit



Pellets are used as fuel for heating and are bought from the cheapest supplier

Together with RWE, the villagers defined the location of the new village in a workshop a few years before the resettlement (Bezirksregierung Köln 2010). The corporation offered four plots of land—all of them cheap agricultural land that RWE had acquired and would sell to the future residents (RWE Power 2012). Throughout the process, the municipality and the company were and still are in close communication about the planned resettlement. As the owner, RWE had influence on the proposed solution and the municipality's decisions.



The dependencies of an inhabitant of Morschenich-Neu

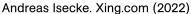
The inhabitants of the village are dependent on RWE not only because of the mining law that makes opencast mining and the threatened expropriations possible (§8 BBergG). The company acts as a land and infrastructure owner and thus exerts its influence on the village.

The Body of an Energy Corporation: Tracing the Limits



In 2018 climate protesters saved Morschenich from destruction. Instead of the inhabitants being able to return to their village, RWE now owns most of the houses. Next to being a landowner, the company is a strong economic factor in the region. Many cities and districts own shares of the company, making them dependent on the corporation's prosperity.







Morschenich-Alt owners

Public

Owned by RWE

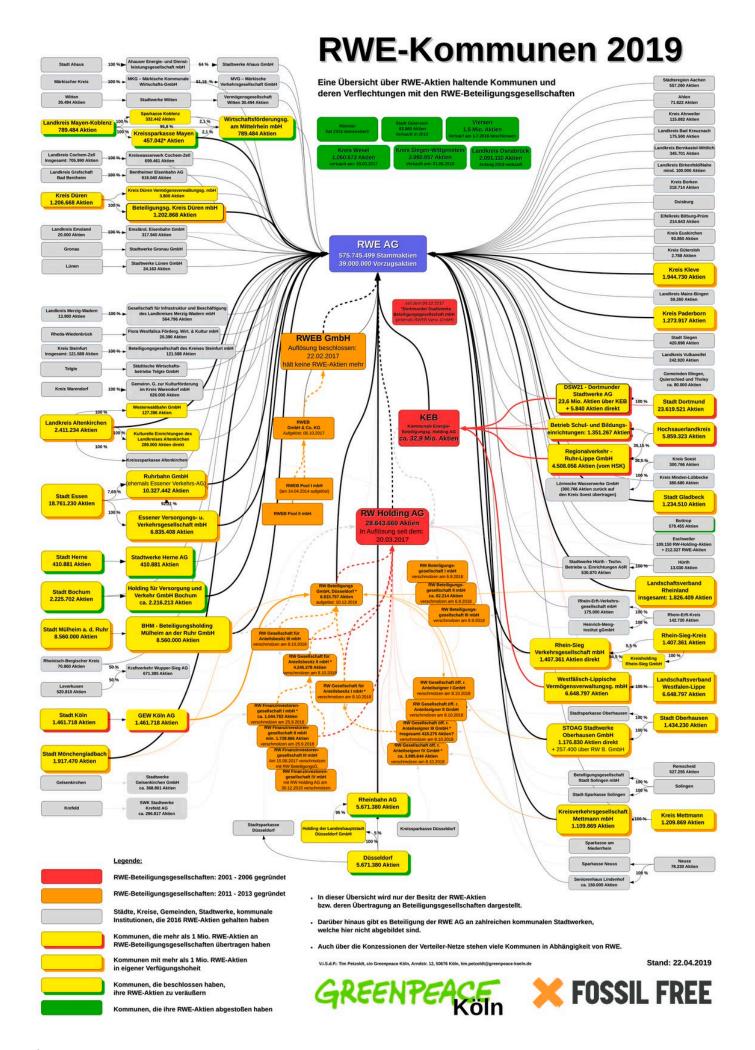
Farm land

Not owned by RWE

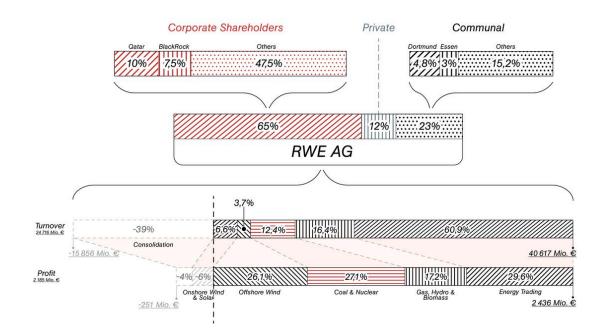
Activists occupied land

Demolished buildings

Already on the first morning of our individual field trip, we got the opportunity to talk to officials from the municipality of Merzenich about the future plans for Morschenich-Alt. Since 2015 the new village is a fact and since 2020 it has been decided that the old structure would remain in place as well (Ministerium für Wirtschaft NRW 2020). This is opening up the question for the future of Morschenich-Alt. We followed around Andreas Isecke, the facility manager from the commune of Merzenich, through the village. He tells us his personal opinion on the future plans for Morschenichwhich we will not elaborate on because of privacy reasons. The commune planned to create a future vision for the energy landscape, which should be developed with companies and research institutes from the region (Gemeinde Merzenich 2019). Right next to the old village RWE projected a huge lake in the open-cast mine, which the company wants to use as an energy park (Sieben 2022). The vision however still cannot take place as RWE owns the area, at least until 2024 (Gemeinde Merzenich 2022).

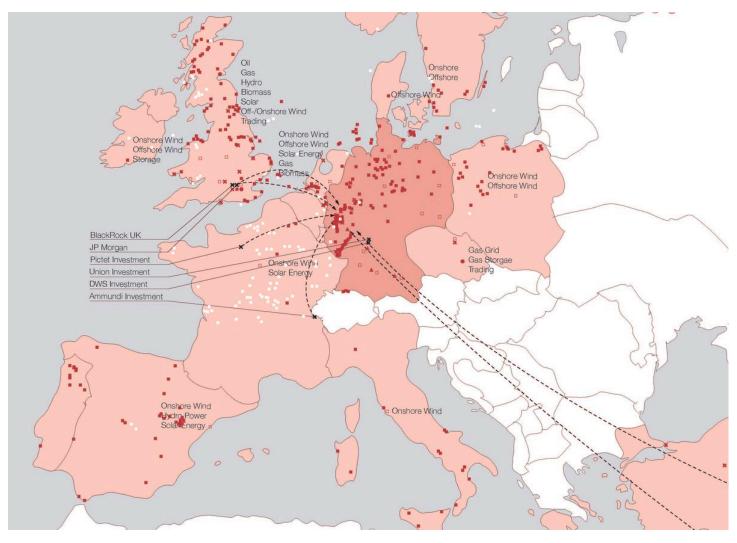


A detailed breakdown of municipalities that own RWE shares. Souce: Go Fossil Free, 2019



RWE shareholders and annual report
Source: RWE [https://www.rwe.com/-/media/RWE/documents/05-investorrelations/finanzkalendar-und-veroeffentlichungen/2021-GJ/2022-03-15-rwe-annualreport-2021.pdf?sc lang=en], 2021

At present, the municipality, which continues to use the village to house refugees, has no choice but to rent the dilapidated buildings from RWE and heat it themselves. But this is not the only way the community is dependent on RWE. The district of Düren alone, to which the municipality of Merzenich belongs, of which Morschenich is part of, owns 50 million in RWE shares (Go Fossil Free 2018). This is not an isolated case. The municipalities in the Ruhr region own about 20 percent of RWE (Meves 2018). The communes are dependent on the economic prosperity of the company that is taking their ground. Next to the production of energy RWE also has a wide network of other investments, be it in the production of building materials, storage solutions or worldwide trading on the energy exchanges. In addition to coal mining, coal-fired power plants and two nuclear power plants, RWE's portfolio today also includes 219 windparks, 4 solar parks and 48 hydropower turbines (RWE Power 2022).

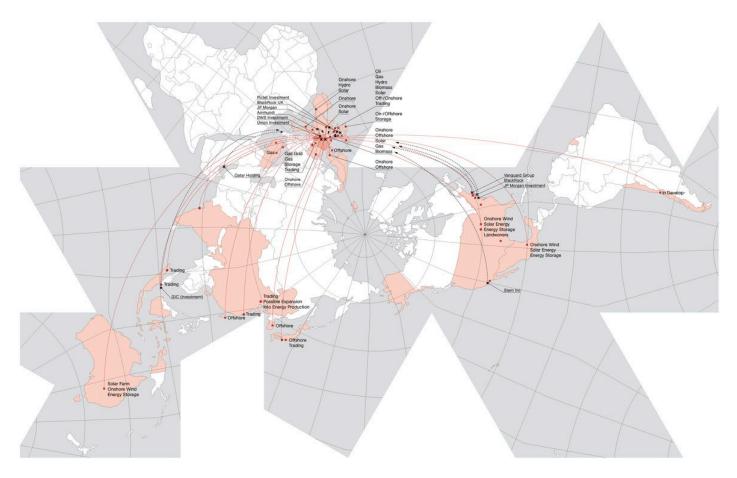


RWE branches in Europe
Source: RWE [https://www.rwe.com/der-konzern/laender-und-standorte/?
country=*&destination=*&ppaStatus&target=*], 2022

- Shareholders
- Renewables
- Nuclear

- Fossil
- Trading Planned

Offices



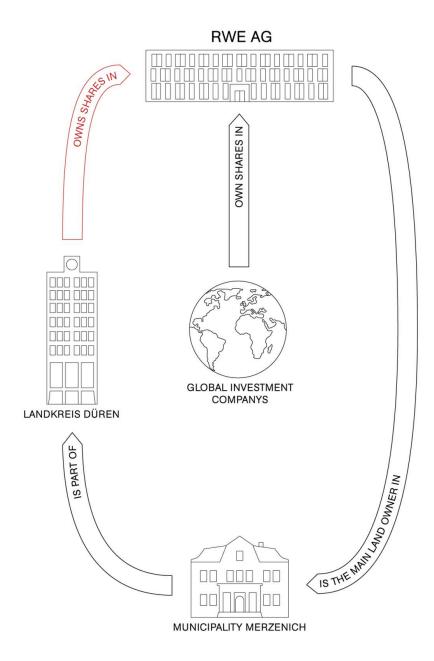
Global RWE branches
Source: RWE [https://www.rwe.com/der-konzern/laender-und-standorte/?
country=*&destination=*&ppaStatus&target=*], 2022

- Shareholders
- Renewables

- Nuclear
- Fossil

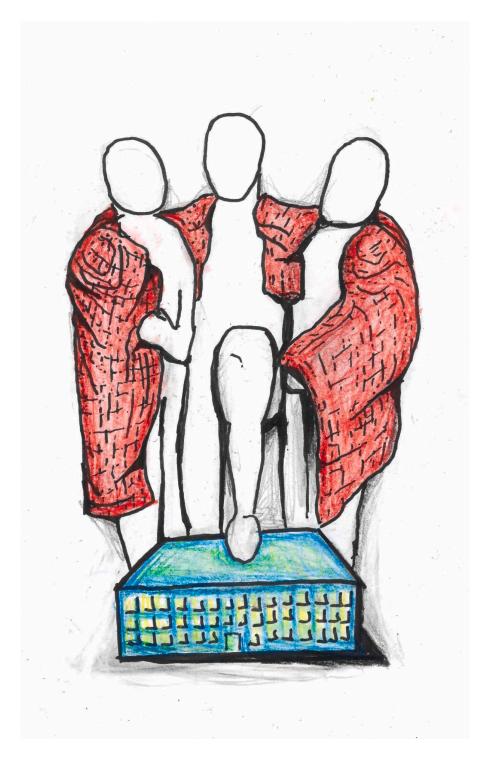
Offices

The municipalities are dependent on RWE's performance and prosperity (see Engels 1880, p. 222). However, RWE is a company that is acting on a global scale, still profiting from CO2-intensive energy production (Seidel 2022). Through its enormous financial strength and economic influence, the company exerts its control over the regional energy landscape. This relationship between the energy provider and the region is shaping the life of the inhabitants of Morschenich and the village itself.



The dependency of a municipality in the Ruhr region

A Just Energy Transition?



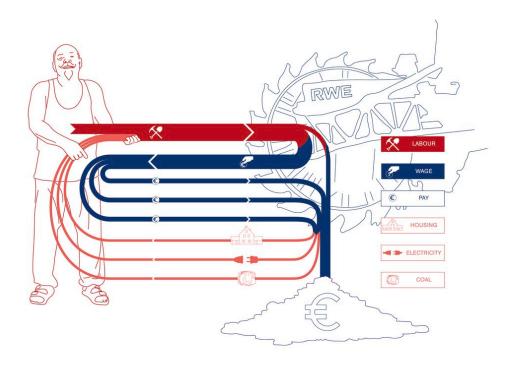
Multinational companies are not only profiting from fossil dependency but also from a transformation of our energy supply towards renewables. We ask ourselves: what could be a just energy transition? And how is it possible, considering the dependencies on multinationals to include everyone in the calculation?



The inhabitants of Morschenich, a fictional group picture

The relocation of Morschenich opened up the possibility for an energy transition. The residents moved and not only could build new houses, but also a new pellet district heating system. However, the multinational corporation RWE is still in place, expanding its influence and making the inhabitants dependent, as we have seen in the new village—not even talking about the people and the resources that were left behind. Thus, we argue that Morschenich-Neu is a failed transition. Rather than being a transition, the place is an example of a transformation of the mode of heating in the grip of a single company. Seen under this lens Morschenich is not an exceptional example, but a case where entanglement with a monopolised company becomes obvious to learn from.

So, we ask ourselves: What could be a just energy transition?

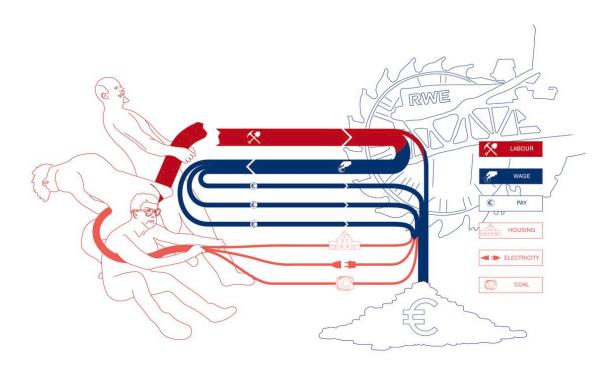


Interdependence of Wolfgang, a coal mine worker, and RWE

We are part of companies' bodies, as workers, consumers, and as their infrastructure.

Be it Wolfgang, who was working for RWE and to whom they can sell the coal.

Be it Frau Kaiser, who is—as part of the community of Morschenich-Neu—purchasing the energy the Stadtwerke is providing, on the plots RWE provided. Or be it the municipalities, who are not only directed by the financial interests of RWE's monopoly in the region but who also decide to let RWE control them.



The inhabitants of Merzenich taking back control collectively

If we acknowledge, to be part of the body of RWE, we may also realise that RWE as well is dependent on the people who are part of the exact same economic mechanism. What if the workers of RWE would strike? What if the inhabitants of Morschenich-Neu collectively decided to move to another energy system? Or what if the municipal shareholders—who are owning 23 percent of the company—would sell their shares and break the monopoly of the company by starting their own local energy provision? However, all of these questions asked are not possible as an individual but linked to a common action to take place. Like sharing a blanket we can stand together and organise our own energy provision.

ACKNOWLEDGEMENTS

We are thanking all interviewees who took the time to speak to us, invite us into their homes and show us their mode of heating. Special thanks to Wolfgang and Mrs. Kaiser from whose stories we drew lots of new insights. Additionally, we want to thank the local experts from the municipality of Merzenich and all experts on heating for sending us valuable material.

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