2.1 Strategy

Our asset swap with E.ON has turned us into one of the world's leading renewable energy companies. We are now an all-rounder in electricity generation at the forefront of creating a sustainable energy system. In addition, we will ensure security of supply with our flexible power plants. RWE aims to become carbon neutral by 2040. To this end, we will invest billions in wind energy, photovoltaics and storage technologies, enter the green hydrogen production business, and phase out electricity generation from coal. In doing so, we are playing our part in achieving the Paris climate goals, as officially confirmed by the independent Science Based Targets Initiative at the end of 2020.

Transformation into a specialist in sustainable power generation and energy trading. Our company has changed fundamentally over the last few years. In the past, RWE was an integrated utility, which was active along the entire energy value chain. Now, we are a company specialising in power production and energy trading that wants to drive the transformation of the energy sector, aiming for more sustainability. Our goal is carbon-neutral electricity supply that is both secure and affordable.

The road to the new RWE began in 2016 when we pooled the Renewables, Retail and Grid & Infrastructure divisions in a subsidiary called innogy and took it to the stock market. One-and-a-half years later, in early 2018, we agreed an extensive asset swap with E.ON, which was implemented in two steps. First, we sold our 76.8 % investment in innogy in September 2019 and in return received E.ON's renewable energy business, a 16.67 % stake in E.ON, and the minority interests in our nuclear power stations Gundremmingen (25 %) and Emsland (12.5 %) held by the E.ON subsidiary PreussenElektra. The second step was taken in mid-2020 and involved transferring certain innogy operations back to RWE in legal terms: the renewable energy business, the German and Czech gas storage facilities, and a 37.9 % stake in the Austrian energy utility KELAG. Now we are focusing on the integration of the acquired business with more than 4,000 employees into the RWE organisation.

New segment structure introduced in 2020. In our financial reporting for 2020, we present the RWE Group in a new structure. We no longer state 'innogy – continuing operations' and 'acquired E.ON operations' separately as they have become integral parts of the RWE Group. Our main business, electricity generation, is now broken down by energy source, whereas energy trading is still presented separately. This results in the following five segments: (1) Offshore Wind, (2) Onshore Wind / Solar, (3) Hydro / Biomass / Gas, (4) Supply & Trading and (5) Coal / Nuclear. Segments (1) to (4) represent our core business. This is where we want to grow. In (5), we have pooled our German electricity generation from lignite, hard coal and nuclear fuel, which will lose importance due to exit roadmaps established by the state. Figures for 2019 have been adapted to the new segment structure retroactively to enable comparability.

The segments are made up of the following activities:

- Offshore Wind: Our business involving offshore wind is subsumed here. It is overseen by our Group company RWE Renewables.
- Onshore Wind / Solar: This is the segment in which we pool our onshore wind, solar power and battery storage activities. Here again, operating responsibility lies with RWE Renewables.
- Hydro / Biomass / Gas: This segment encompasses our run-of-river, pumped storage, biomass and gas power stations. It also includes the Dutch Amer 9 and Eemshaven hard coal power plants, which we are increasingly co-firing with biomass, as well as the project management and engineering services specialist RWE Technology International. These activities are overseen by RWE Generation. In addition, this company has been responsible for the design and implementation of RWE's hydrogen strategy since the beginning of 2021. The 37.9 % stake in the Austrian energy utility KELAG previously held by innogy is also assigned to Hydro / Biomass / Gas.

- Supply & Trading: This is where we report proprietary trading of energy commodities. The segment is managed by RWE Supply & Trading, which also acts as an intermediary for gas, supplies key accounts with energy, and undertakes a number of additional trading-related activities. The German and Czech gas storage facilities which we received from innogy also form part of this segment.

- Coal / Nuclear: Our German electricity generation from lignite, hard coal, and nuclear fuel as well as our lignite production in the Rhenish mining region to the west of Cologne are subsumed in this segment. This is also where we report our investments in Dutch nuclear power plant operator EPZ (30 %) and Germany-based URANIT (50 %), which holds a 33 % stake in uranium enrichment specialist Urenco. The aforementioned activities and investments are assigned to our Group companies RWE Power (lignite and nuclear) and RWE Generation (hard coal).

Group companies with cross-segment tasks such as the Group holding company RWE AG are stated as part of the core business under 'other, consolidation'. This also applies to our stakes of 25.1 % in German transmission system operator Amprion and 15 % in E.ON. However, we recognise the dividends we receive from E.ON in the financial result. Furthermore, 'other, consolidation' contains consolidation effects.

Our goal by 2040: RWE will become carbon neutral. As one of the world's leading energy companies, we shoulder special responsibility for the implementation of the emission reduction targets in the energy sector. The European Union aims to be carbon neutral by 2050. Our objective is to achieve the same goal by 2040, and we have already made good progress on this path. We reduced our annual carbon dioxide emissions from electricity production by 62 % from 2012 to 2020. By 2030, we plan to have lowered them by at least 75 %. The phaseout of electricity generation from coal will play a central role. Further elements of our emissions reduction strategy are the rapid expansion of zero-carbon renewable energy, increased utilisation of storage technologies and the use of carbon-neutral fuel to produce electricity. In doing so, we are acting in line with the Paris climate goals, as recently confirmed by the Transition Pathway Initiative and the Science Based Targets initiative. Our brand appearance demonstrates how seriously we take our environmental responsibility. RWE's new purpose, 'Our energy for a sustainable life', is an expression of the determination of the Group and its approximately 20,000 employees to ensure a sustainable energy system.

The new RWE: a world leading renewable energy company. The transaction with E.ON has turned us into a world-leading producer of electricity from renewable sources. We want to expand this business rapidly. By the end of 2020, we already had renewable energy assets with a total capacity of 10.8 GW, with 9.2 GW attributable to wind and 0.2 GW to photovoltaics. These figures reflect the generation capacity allocable to us on a prorated basis, i. e. in accordance with the stakes that we hold. In addition to existing assets, we have a wide portfolio of growth projects in various stages of development. Here again, the focus is on wind, followed by solar PV. On top of being environmentally friendly, renewable energy also enables stable and attractive returns. Electricity production from renewables is clearly already our strongest income generator. In the past fiscal year, it already accounted for about half of our adjusted EBITDA.

Fast growth in wind and solar power. We want to grow our wind and solar capacity to over 13 GW (pro-rata) by the end of 2022. We plan to make over €1.5 billion in net investments to this end every year. Reinvesting proceeds from sales of investments will actually cause the gross expenditure to be much higher. In August 2020, we expanded our financial headroom by increasing our capital by €2 billion.

Whenever we tackle wind or solar projects, we want to cover the entire value chain from development to construction and operation. Geographically, we are focusing on markets in Europe, North America and the Asia-Pacific region. As of the balance-sheet date, our largest construction project was the UK North Sea wind farm Triton Knoll with a total installed capacity of 857 MW, which is scheduled to have taken all its turbines online by 2022. We are also building huge onshore wind farms, e. g. Nysäter in Sweden with a capacity of 475 MW, which is expected to be completed in 2021. Moreover, we want to commission our Limondale solar farm in New South Wales, Australia, this year, too. With an installed capacity of 249 MW, it will be one of the most powerful installations of its kind in the country.

Thanks to our sizeable project pipeline, we firmly believe that we will make good progress in the expansion of renewable energy over the long term. One advantage in this respect in addition to the project experience and technical expertise of our teams is RWE's established position in core markets such as Germany, the United Kingdom and the USA. Existing production sites provide points of entry and synergistic potential for new build projects. For instance, last year we concluded agreements for lease which allow us to utilise areas in the immediate vicinity of four existing UK offshore wind farms to develop expansion projects. However, we also intend to grow in new markets. In 2020, we acquired a large number of onshore wind projects from Nordex in France, a country with attractive subsidy conditions in which we were hardly present before. Furthermore, we are preparing to enter the Japanese, Taiwanese and South Korean markets where we want to implement offshore wind projects together with local partners.

High-capacity storage: prerequisite for 100 % electricity generation from renewables. Electricity generation from wind and solar power greatly depends on the weather, time of day and season. Sometimes, power produced from renewable sources only covers a fraction of demand, and at other times, it exceeds local needs to such an extent that production actually has to be throttled. Consequently, storage technologies are increasingly coming to the fore as renewable energy continues to be expanded. They usually do not yet meet the technical and economic requirements for securing supply in the long term. But we are working on changing the situation. RWE has been involved in the development, construction and operation of battery storage systems for several years now. We operate such a unit in the town of Herdecke in the Ruhr area with a storage capacity of 7 MWh, making it one of the biggest in Germany. We are rolling out our largest battery project to date in Hickory Park, which is located in the south of the US state of Georgia. The site will be home to a 196 MW solar farm coupled to an 80 MWh battery storage system. This combination will enable electricity feeds into the local grid to be optimised, significantly improving the solar array's yield. We want to launch further projects of this type. Concurrently, we are exploring innovative electrochemical storage methods. We have presented two research and development undertakings dedicated to this goal on page 32. Besides electrochemical storage, power-to-gas technologies can also make a substantial contribution to security of supply. They use electricity generated by carbon-neutral methods to produce hydrogen by electrolysis, which can later be used to generate electricity when needed.

Carbon-neutral processes: a target for all sectors. Reducing emissions in the electricity sector – as intended by the EU – is not the end of the road to achieving carbon neutrality. Three quarters of European demand for energy is still being met with oil, coal and gas. But that is set to change. Electrification, in other words switching energy consumption to electricity produced by carbon-neutral methods, e. g. the use of heat pumps instead of oil and gas heating systems, also enables significant emission reductions in the manufacturing, heat and transportation sectors. Further advantages of electrification include boosting efficiency. For example, an electric vehicle is capable of using about 95 % of available energy, compared to the mere 30 % achieved by internal combustion engines. And the higher efficiency of electricity-based applications drives down the energy requirement. By contrast, demand for electricity generated by zero-carbon techniques – our most important product – will increase steadily as electrification progresses.

Hydrogen: integral component of the energy transition. The economy can only be decarbonised completely if solutions are also found for applications where direct electrification is not an option. Examples of this are the production of steel and fertilisers as well as aviation and shipping. In the near future, these areas offer the greatest potential for utilising hydrogen produced by zero-carbon methods. RWE intends to spur the expansion of the hydrogen economy, especially in Germany, the Netherlands, and the United Kingdom. In pursuit of this goal, we will work along the entire value chain, from green electricity generation and hydrogen production by electrolysis to hydrogen trading and storage and the conclusion of commercially optimised supply agreements with major industrial customers. In the last two years, we have forged numerous partnerships with businesses and research institutes seeking to co-operate with us to create nationwide hydrogen infrastructure. Examples of this are the German GET H2 and AquaVentus initiatives and the Dutch Eemshydrogen and NortH2 ventures, on which we report in detail on pages 31 et seq. Further information on this topic can be found at www.rwe.com/hydrogen.

Conventional electricity generation: growing significance of gas as a source of energy. Building the storage infrastructure required for a nationwide supply of green electricity is a task that will take decades, not years to accomplish. Therefore, power stations capable of offsetting fluctuating wind and solar power production will remain necessary for the foreseeable future. With our conventional generation capacity, we are making an indispensable contribution to the reliable and tailored supply of electricity in our core markets Germany, the Benelux region, and the United Kingdom. Our gas-fired power stations, most of which are state-of-the-art, are especially well suited to partner with renewable energy because they emit little carbon dioxide and can react quickly to load fluctuations in the grid. Another advantage of gas-fired power stations is that they can be retrofitted to run on zero-carbon fuel, e. g. green hydrogen.

In terms of generation capacity, gas is already our main conventional source of energy, and its share of our power plant portfolio is expected to increase further. Currently, however, new builds are usually uneconomical, unless they receive guaranteed payments under the German Combined Heat and Power Act or as a result of invitations to tender from the network operators. Only recently, in November 2020, did we qualify in such an auction for the construction of a 300 MW grid stabilisation unit at the Biblis site. We are also considering buying existing gas-fired power stations. For instance, we acquired the 382 MW King's Lynn station in the east of England in early 2020.

Conversely, coal and nuclear power stations will increasingly lose importance within our generation portfolio. In Germany, nuclear energy is subject to a phaseout roadmap, which stipulates a latest possible shutdown date for every single plant. Two RWE nuclear power stations are still online: Gundremmingen C and Emsland. We have permission to operate these assets until the end of 2021 and the end of 2022, respectively, after which we will shut them down. Thereafter, our nuclear operations will focus on dismantling our stations safely and efficiently. In addition, we are doing everything we can to ensure the continued use of the nuclear power plant sites, as demonstrated by the aforementioned grid stabilisation system in Biblis.

The option of using coal as a source of energy will also vanish in the foreseeable future. All relevant RWE core markets have firm legal exit dates. The United Kingdom has set its sights on the earliest exit year, which is 2024. Aberthaw B, the last RWE hard coal-fired power plant in operation there, was shut down early in March 2020.

In the Netherlands it will be forbidden to generate electricity from coal from 2029 onwards. For older assets, the ban comes into effect five years earlier. This has grave consequences for our Amer 9 (631 MW) and Eemshaven (1,580 MW) power plants, which were initially designed to run on hard coal only. Thanks to the state's support, we co-fire biomass in both these stations now. By the end of last year, this fuel accounted for 80 % of generated capacity in Amer 9 and 15 % in Eemshaven. To continue operating the stations, we would have to increase these shares to 100 % by the end of 2024 at Amer 9 and 2029 at Eemshaven. This is possible technically, but so far state subsidies have only covered the additional cost of achieved levels of biomass co-firing, amounting to 80 % and 15 % for the two stations, respectively. To date, there have been no prospects of an increase in these funds.

In Germany, in mid-2020 the Lower and Upper Houses of Parliament passed the Coal Phaseout Act, on which we report in detail on pages 37 et seq. The new law envisages gradually switching off all of the country's coal power plants by 2038. The Act contains a detailed exit roadmap for Germany's lignite-fired power stations, whereas shutdowns of hard coal power plants will be decided via auctions. In the first few years, all the lignite capacity reductions will be implemented by RWE. At the end of 2020, we shut down the first 300 MW unit in the Rhenish lignite mining region. We will take a further 2.5 GW of generation capacity offline in 2021 / 2022, and just operate our three state-of-the-art 1,000 MW blocks from 2030 onwards. Subject to approval from the European Commission, the German government will pay us €2.6 billion in compensation for our early exit from lignite. However, the financial burden we will actually incur is much higher than this. We nevertheless believe the Coal Phaseout Act is acceptable, as it provides planning certainty for our lignite business.

To further limit our exposure to economic risks in coal-fired power generation and make faster progress en route to becoming carbon neutral, we entered the Ibbenbüren B and Westfalen E power stations in the first hard coal shutdown auction held by the German Network Agency (see page 44). Both stations won a remuneration contract and stopped operating at the end of 2020. On condition that the German Network Agency approves the closure of the two power plants, we will not produce electricity from hard coal in Germany any longer.

The coal phaseout poses major social and operational challenges, mainly relating to our lignite business. For example, we have to end our opencast mining activities in Hambach early, while maintaining Hambach Forest, which will be extremely expensive. Furthermore, we are forced to implement major layoffs. The state will provide subsidies for the affected employees, including an adjustment allowance. However, we will also pay for some of the redundancy measures ourselves. The Rhenish lignite mining area will be subjected to fundamental structural change. We intend to play our part in shaping this change and help to ensure that the energy industry continues to have a major role in the region. Some recultivation land is very well suited for the expansion of renewable energy. Three RWE wind farms are already located there. We also intend to continue developing our power plant sites. For example, there are plans to build an innovation, technology and commercial park in Frimmersdorf and the surrounding area. At the Weisweiler site, within the scope of an EU project, we are looking into the possibility of capturing geothermal heat, which could be fed into the district heating network of the greater Aachen area. In addition, we will thoroughly explore Power-to-Gas technology at the Niederaussem Innovation Centre. Since 2013, our research and development activities at the Centre have involved producing fuel and feedstock for the chemical industry from hydrogen and carbon dioxide obtained by electrolysis.

Supply & Trading: commercial hub for the generation business. Energy trading is part of RWE's core business. It forms the economic link between the elements of our value chain, the regional markets and the various energy commodities. It is overseen by the Group company RWE Supply & Trading, which focuses on trading electricity, gas, coal, oil, biomass, and CO_2 certificates. RWE Supply & Trading mainly conducts these activities from Europe as well as via subsidiaries in New York, Singapore, Beijing and Tokyo. Another of the Group company's activities consists of marketing the electricity from RWE power stations and procuring the fuel and emission allowances required to produce it. The objective here is to limit price risks. On top of that, RWE Supply & Trading is in charge of the commercial optimisation of our power plant dispatch, the earnings of which go to our generation companies. Companies outside of the RWE Group can also benefit from the expertise of our trading business. They are offered a wide range of products and services, running the gamut from traditional energy supply contracts and comprehensive energy management solutions to sophisticated risk management concepts.

Intermediary trading and storage of gas harbour additional earnings potential. Another string to RWE Supply & Trading's bow is the gas business. This is an area in which the company aims to establish itself as a leading European intermediary. The company already supplies gas to numerous companies inside and outside of the RWE Group. To this end, it enters into long-term supply agreements with producers, organises gas transportation by booking pipelines and optimises the timing of deliveries using leased gas storage facilities. The greater the size and diversification of the procurement and supply portfolios, the greater the chances to commercially optimise them. RWE Supply & Trading also concludes transactions involving liquefied natural gas (LNG). The main objective is to take advantage of differences in price between regional gas markets which are not connected via pipelines.

As part of the asset swap with E.ON, we received the gas storage facilities of our former subsidiary innogy: five in Germany with a total capacity of 1.6 billion cubic metres and six in the Czech Republic with a volume of 2.7 billion cubic metres. We report income from the management of these assets in the Supply & Trading segment. For regulatory reasons, we have to keep the storage business legally independent of our gas trading and gas sales activities. The owners and operators of these storage facilities are the Group companies RWE Gas Storage West and RWE Gas Storage CZ, which offer their market participants storage services at reasonable non-discriminatory conditions. Their customers use the storage to profit from sudden and seasonal changes in gas prices. However, only small margins can currently be achieved in the storage business. This holds true especially for the German market, which is characterised by excess capacity. However, we are confident that the need for storage and achievable margins will rise over the medium term, in part due to increasing demand for power plant gas. The use of our facilities to store hydrogen offers additional earnings potential in the long run.

Attractive investment portfolio increases financial strength. RWE's business operations are supplemented by a portfolio of investments in energy companies, which we believe will be a reliable source of substantial income. These are primarily the stakes in Amprion (25.1 %), KELAG (37.9 %) and E.ON (15 %). Our interest in E.ON is solely of financial importance to us. We are currently using this investment and our claim for compensation for the early exit from lignite against the federal government to fund the mining provisions. Conversely, we have strategic goals in respect of our stake in KELAG. RWE and KELAG's co-shareholder, the Austrian state of Carinthia, have a partnership aiming, among other things, to strengthen the company's role as a centre of excellence for run-of-river power stations.

RWE AG's management system. Ensuring sustainable growth in shareholder value is at the heart of our business policy. To manage the Group's activities, RWE AG deploys a groupwide planning and controlling system, which ensures that resources are used efficiently, and provides timely, detailed insight into the current and prospective development of the company's assets, financial position and net earnings. Based on the targets set by the Executive Board and management's expectations regarding the development of the business, once a year we formulate our medium-term plan, in which we forecast the development of key financial indicators. This plan contains the budget figures for the following fiscal year and planned figures for the years thereafter. The Executive Board submits the plan to the Supervisory Board, which reviews and approves it. During the fiscal year, we produce internal forecasts based on the budget. The Executive Boards of RWE AG and the main operating companies meet regularly to analyse the interim and annual financial statements and update the forecasts. In the event that the forecast figures deviate significantly from the budget figures, the underlying reasons are analysed and countermeasures are taken if necessary. We also immediately notify the capital market if published forecasts need to be modified.

Major key performance indicators used in managing our business are adjusted EBITDA, adjusted EBIT, adjusted net income, capital expenditure, and net debt. EBITDA is defined as earnings before interest, taxes, depreciation and amortisation. In order to improve its explanatory power in relation to the development of ordinary activities, we remove non-operating or aperiodic effects: capital gains or losses, temporary effects from the fair valuation of derivatives, impairments and other material special items that are shown in the non-operating result. Subtracting operating depreciation and amortisation from adjusted EBITDA yields adjusted EBIT. Adjusted net income is another key operating indicator for us. We arrive at this figure by correcting net income to exclude the non-operating result, income from discontinued operations as well as material special items in the financial result and in the income attributable to non-controlling interests. In addition, instead of the actual tax rate, which reflects one-off effects, we apply a rate of 15 %, which is oriented towards the expected average tax burden of the coming years.

We primarily use the internal rate of return for evaluating the attractiveness of investment projects. The Group's financial position is analysed using cash flows from operating activities, amongst other things. We also attach special importance to the development of free cash flow. It is the result of deducting capital expenditure from cash flows from operating activities and adding proceeds from divestments and asset disposals to them. Net debt is another indicator of RWE's financial strength. It is calculated by adding provisions for pensions and similar obligations, for nuclear waste management, and for the dismantling of wind farms to RWE's net financial position. Conversely, provisions for mining damage and the financial assets used to cover them are disregarded. In managing our indebtedness, we orientate ourselves towards the leverage factor, the ratio of net debt to adjusted EBITDA in our core business.

Sustainability management – more than just reducing emissions. We can only succeed over the long term if we ensure society's acceptance by embracing our corporate responsibility (CR). General consensus equates this with matters relating to the environment, society and governance (ESG), meaning that CR goes far beyond the reduction of greenhouse gas emissions. To optimise our assessment of the expectations which society has of us, we constantly seek to engage in dialogue with stakeholder groups. These are primarily shareholders, financial partners, employees, politicians, associations, non-government organisations and civic initiatives. The stimulus we receive by interacting with our stakeholders helps us to determine the focal points of our ESG activities. Matters of great importance to us in addition to reducing our emissions include the health of our staff, biodiversity at our sites, the diversity of our workforce and the attractiveness of RWE as an employer. We set ourselves specific goals in respect of numerous such issues, measure the degree to which we achieve them using KPIs, and make the results transparent to the public. The degree to which ESG targets are achieved also has a major effect on the remuneration of the Executive Board of RWE AG.

Further information on our ESG goals and accomplishments can be found in our Sustainability Report and in the Group's separate Non-financial Report in accordance with Section 315b, Paragraph 3 of the German Commercial Code. For fiscal 2020, these reports will be available in April 2021 and accessible at www.rwe.com/en/responsibility-and-sustainability. We also report on the assessment by independent rating agencies of our sustainability strategy and its implementation on our website. For further details, go to www.rwe.com/en/ratings-and-rankings.

2.2 Innovation

How can wind farms be built in deep waters? What can we do to ensure a carbon-neutral supply of electricity during lulls in the wind and periods of darkness? What options are there to make environmentally sensible use of carbon dioxide? We at RWE want to provide convincing answers to such questions. Last year, we worked with numerous partners in industry and science to launch or forge ahead with more than 200 innovation projects. Most of our ventures were primarily dedicated to achieving one goal: master the challenges of the energy transition with innovative solutions.

Research and development at RWE: solutions for a sustainable energy system. RWE is innovative in many ways. We are motivated both by a desire to remain competitive in an ever-changing environment as well as a passion to be a driving force of this change. With the help of our innovation projects, we are looking to develop solutions that help us advance the utilisation of renewable energy, expand electricity storage, become involved in large-scale hydrogen production, and help build a circular economy in which sensible use is made of carbon dioxide.

Our more than 900 patents and patent applications, based on about 250 inventions, are testimony to the importance we ascribe to research and development (R&D). Last year, we worked on 205 R&D projects. Around 390 of our staff were solely dedicated to these activities or contributed to them in addition to performing their normal tasks. In such ventures, we often work with other companies or research institutions, meaning we generally only bear a portion of the project costs. This is reflected in the RWE Group's operating R&D spending which in 2020 amounted to €20 million (previous year: €21 million).

On the following pages we present a small selection of our current innovation projects. They illustrate the range of challenges we are facing in light of the energy transition and demonstrate the creativity with which we are tackling these issues.

How we are using new technologies for offshore wind expansion. We rank among the world's leading companies in offshore wind power and are looking for ways to expand our reach. The aim of some of our current R&D projects is to identify the most competitive floating foundation technologies. This would enable us to venture into entirely new wind power territories.

The foundations of offshore wind farms are typically built on the seabed. True to the principle: the deeper the water, the more robust the structure needs to be in order to withstand the elements. This necessitates more building materials, which, in turn, causes project costs to rise. Therefore, wind turbines are generally only profitable in waters with a maximum depth of 60 metres. However, in order to harness the potential of wind energy more effectively, companies are working on concepts for floating wind turbines. They are mounted on a float made of steel or concrete, which is secured to the seabed using mooring lines and anchors. This opens up the possibility of deploying wind turbines in deeper waters, e.g. off the coasts of Asia, the Americas or the Mediterranean region as well as in parts of the North Sea. According to WindEurope, the European wind industry association, in about 80% of all sea areas where wind speeds are suitable for electricity generation, the ocean is simply too deep for conventional foundation designs. We are currently involved in demonstration projects for three different types of floating foundations with the objective of identifying the most viable of these technologies.

One of the three demonstration projects we are working on is **TetraSpar**. It consists of a tubular steel support structure which is kept stable in the water by a keel. As the support structure has a modular design, its individual parts can be prefabricated at different locations, which is cost-effective. We are working on this project with Shell, Stiesdal Offshore Technologies from Denmark, and Japanese power utility TEPCO. We finished assembling the first TetraSpar base in the Danish port of Grenaa in October 2020. It was placed in storage for the winter and is scheduled to be launched in the spring of 2021. We will then mount

a 3.6 MW wind turbine on the float at the quayside, after which tugboats will take the entire structure to the test site ten kilometres off the Norwegian coast near Stavanger, where it will be attached to the seabed 200 metres below by means of three anchor chains and then connected to the grid via a cable. Power generation is scheduled to start in the summer of 2021. The floating turbine will be equipped with a large number of sensors to measure whether its behaviour in real-life conditions is in line with our predictions based on calculations and tests.

The second project is **DemoSATH**, in which we are working with the Spanish company Saitec Offshore Technologies on the development and construction of a floating platform for a 2 MW wind turbine in the sea near Bilbao, in northern Spain. The project is based on Saitec's SATH (swinging around twin hull) technology using a catamaran-like float made of pre-cast, post-tensioned concrete elements. The floating platform can freely rotate around a single point of mooring, depending on wind and wave directions. The DemoSATH prototype including its turbine will be assembled on a quayside in the port of Bilbao, before being towed to its mooring point at a test site in the Atlantic, two kilometres from the Basque coast, where the water is around 85 metres deep. The floating platform will be held in place using hybrid mooring lines consisting of chains and synthetic fibre ropes. In the project schedule, three-and-a-half years are allocated for planning, construction and test operation. After some delays due to COVID-19, the wind turbine is expected to go into service in summer 2022.

In the third project, **New England Aqua Ventus**, we are collaborating with the University of Maine and Diamond Offshore Wind, a subsidiary of Mitsubishi Corporation. The aim is to deploy a 10 MW floating wind unit in the Gulf of Maine along the eastern coastline of the U.S. by the end of 2023. The unit will feature the University of Maine's patented floating hull technology consisting of modular concrete components with glued joints – a technique that is also used in bridge building. The floating platform weighs approximately 10,000 metric tons with its base approximately 20 metres below sea level. The project focuses on evaluating the floating technology in regard to environmental factors and analysing how offshore wind can coexist with ocean shipping. The project is in the development stage. This year, we plan to select a turbine and start negotiations with construction companies.

How we intend to harvest high-altitude winds. For several years, RWE has been exploring how to harness the fairly strong and steady high-altitude winds to produce electricity. Airborne wind energy (AWE) systems offer huge potential for applications in this area. AWE systems consist of a flying device, a tether and a ground station. The flying device is usually a version of a power kite, such as that used for kite surfing, or a fixed-wing construct similar to that of a small aircraft. They can both operate at heights of up to 500 metres. Power is generated as the device manoeuvres crosswind. This is done either in the sky using onboard turbines or on the ground as the tether unwinds a winch which drives a generator.

As part of a collaborative venture with SkySails Power, we acquired an AWE system rated at up to 200 kW from the Hamburg-based company and want to operate it during a three-year research and development period. Concurrently, we are developing a test site for AWE systems in Ireland with a view to testing further prototypes and concepts, including a 150 kW unit from our Dutch partner Ampyx Power. The EU has committed to fund this project. We are confident that the new technology will establish itself as a useful supplement to traditional wind energy generation methods as AWE systems have advantages over conventional wind turbines in terms of material usage, maintenance requirements, capacity utilisation, noise emissions and casting shadows. Furthermore, they can be used flexibly at various locations. Based on our assessment, commercial operation of MW-class airborne wind energy systems will be possible in the coming decade.

How we are forging ahead with green hydrogen production. The more electricity generation switches to the wind and sun as energy sources, the more important energy storage becomes in order to ensure the availability of electricity when needed, independent of the weather. Two alternatives exist to provide power storage to the necessary scale: high-capacity batteries and hydrogen produced from green energy, which can be converted back to electricity on demand. The added advantage of hydrogen from zero-carbon techniques lies in its versatility: it can be used not only to store electricity but also to decarbonise industrial processes and modes of transport which cannot be electrified. We are involved in current initiatives for the expansion of hydrogen infrastructure focusing on these hydrogen applications. RWE is working on a large number of hydrogen projects in Germany, the Netherlands and the United Kingdom. The following passages present four projects that could contribute to the northwestern German / Dutch region turning into a hydrogen hub. We also report on this and further major hydrogen undertakings at www.rwe.com/hydrogen.

One of the first hydrogen initiatives spanning several industries in Germany is **GET H2**. In addition to RWE, BASF, BP, Evonik, Nowega, OGE, ThyssenGas and Uniper, a host of additional companies and scientific institutions are participating in the project. GET H2 covers the entire hydrogen value chain, from production and transport to usage. The long-term objective is to build a nationwide hydrogen infrastructure in Germany. Under the initiative, we have joined forces with several partners to launch the GET H2 Nukleus project. RWE's role is to install and operate an electrolyser at our Lingen power plant site, with which we can use electricity from wind farms to split water into hydrogen and oxygen. The planned capacity is 100 MW. This would make the unit much bigger than any other in operation in Germany. It is envisaged that the green hydrogen will be transported via repurposed gas pipelines to the northern Ruhr area where it can be used by refineries and chemical parks. Production and transport of this hydrogen could begin as early as the end of 2023. This would lay the cornerstone for gradually expanding public hydrogen infrastructure. In addition, the project partners aim to make electrolysis technology ready for mass production by using it in large-scale plants, thereby reducing the future cost of green hydrogen production.

Another initiative harbouring substantial potential is **AquaVentus**. The idea behind it is to produce hydrogen offshore using electricity from offshore wind farms and transport it via pipelines to onshore demand hotspots. The island of Heligoland, which is situated in the German North Sea, acts as a hub to which the hydrogen produced by offshore wind turbines is transported through pipelines. The Port of Heligoland is already a logistical centre for the operation of offshore wind farms. Initially, the hydrogen will only be used to meet the island's needs. Once production volume increases, the hydrogen will be forwarded to the mainland, first via tanker and then via a pipeline. Our partners in AquaVentus include Gascade, Gasunie, Shell and Siemens. A pilot project is being conducted to build two 14 MW wind turbines in the coastal waters of Heligoland and integrate an electrolyser in each of their bases. If the project stays on schedule, the turbines could start operation in 2026. In the long run, electrolysers with a total capacity of 10 GW could be installed in the North Sea through to 2035. This would be enough to produce up to 1 million metric tons of green hydrogen every year.

One of our most important hydrogen projects outside Germany is **Eemshydrogen**, based at our Eemshaven power plant site in the Netherlands. This is the projected home of an electrolyser powered by electricity from our neighbouring Westereems onshore wind farm. The plant's initial capacity has been set at 50 MW, although future increases in local wind power capacity and hydrogen demand could enable capacity to be ramped up gradually. We intend to transport the hydrogen via repurposed gas pipelines, store it in a salt cavern if necessary, and then deliver it to major customers. Talks with companies participating in the development of hydrogen infrastructure and with potential off-takers in the nearby Delfzijl industrial cluster are already underway. Current plans envisage the electrolyser being commissioned in 2024.

NortH2 is another project planned in the north of the Netherlands. The objective is to turn the region into a hub for supplying northwestern Europe with green hydrogen. A system consisting of offshore wind farms, electrolysers, gas storage facilities and pipelines is expected to be set up for this purpose. NortH2 was launched in early 2020 by Gasunie, Groningen Seaports and Shell. Equinor and RWE started contributing their expertise to the

undertaking in December. The partners plan to build 4 GW of electricity generation and electrolysis capacity by 2030, pushing up this figure to over 10 GW by 2040. The end game is therefore of a similar order of magnitude as the German neighbour project AquaVentus. A feasibility study will clarify whether the NortH2 project can be carried out as planned. If the study has a positive outcome, the partners intend to start developing the project in the second half of 2021.

How we plan to use batteries to ensure grid stability. Alongside hydrogen technology, electrochemical storage is an indispensable building block of climate-friendly energy supply. We have operated a 7 MWh battery storage facility next to the Herdecke pumped-storage power plant on the Ruhr river since the beginning of 2018. Three freight containers, equipped with a total of 552 battery modules, serve as the beating heart of the unit. Drawing on experience gained, we have initiated further battery storage projects, two of which we will present below.

Panta.rhei is the first such project: at the new RWE campus in Essen, we have been developing a redox flow battery since May 2020. What is unique to this technology is that it stores electric energy in chemical compounds that are dissolved in a liquid. This explains why it is also referred to as a 'liquid battery'. Our pilot plant has a storage capacity of 390 kWh. When fully charged, it can deliver 120 kW for more than three hours. We plan to harness its full potential this year. We expect to gain valuable experience from the Panta.rhei project that will help us operate redox flow batteries reliably. Our test facility will initially be used in the balancing power market to stabilise the grid. This is because batteries can react to changes in grid frequency within a matter of seconds. If the test facility proves itself, we will investigate further applications. For instance, we could use liquid batteries in the electricity wholesale market and take advantage of differences in price resulting from fluctuations in feed-ins of wind and solar power, for example.

In our second battery project – **Lazarus** – we are seeking to leverage an especially affordable and sustainable storage solution with pre-used lithium-ion batteries from electric vehicles. The advantage in this respect is that these 'second-life batteries' can be sourced affordably and often still have more than 70 % of their original storage capacity. Extending their life also makes sense from an ecological standpoint, given the greenhouse gasses emitted during their production. Our long-term plan is to combine a number of these batteries to form a large-scale storage system. Since August 2020, we have been working with a partner from the automotive sector on a pilot plant which we intend to use in the balancing power market. This presents us with the technical challenge of managing the variety of degradation levels in second-life batteries. In Project Lazarus, we will explore how to operate our system reliably despite this.

How we are turning carbon dioxide into fuel. A complete decarbonisation of industrial processes will be all but impossible in the coming decades. So whether Europe meets its target of carbon neutrality by the middle of the century will essentially depend on how we deal with the carbon dioxide that is unavoidably emitted during manufacturing processes. One option is to store the carbon dioxide below ground, preventing it from entering the atmosphere. However, the more sensible alternative is capturing the carbon dioxide, e. g., by combining it with green hydrogen and turning it into chemical products such as plastics. We have been working on eco-friendly ways to use carbon dioxide for over ten years now. Our research is based on the carbon dioxide from our pilot plant at the Niederaussem Innovation Centre in the Rhenish coal mining region. Together with BASF and Linde, we have been developing one of the world's leading technologies for what is known as CO_2 scrubbing. This technique is used to separate carbon dioxide from the flue gas of a power station or chemical plant, before liquefying it and making it available for recycling. Our CO_2 scrubbing demonstration unit has already proven its capabilities during years of extensive testing. Since 2009, it has completed more than 85,000 operating hours, achieving carbon capture rates of up to 98 %. We use the carbon dioxide to produce

synthetic fuels and raw materials that can be used by the chemical industry, replacing fossil fuels such as oil or natural gas. The resulting fuels and materials therefore hold great potential for industry and transport. Together with partners, we have already launched half a dozen projects to convert carbon dioxide. All have been approved for funding by either the EU or the German Ministry of Economic Affairs and Energy (BMWi), among others. Two of these projects, MefCO_2 and ALIGN-CCUS, have already successfully run their course, providing us with the foundation for a series of new R&D initiatives due to start in 2021.

In the **MefCO_2** project (methanol fuel from carbon dioxide) we have produced methanol using carbon dioxide and hydrogen. The hydrogen, in turn, was produced by electrolysis using water and electricity. A wide variety of chemical products are based on methanol, one of the most commonly manufactured chemicals in the world. The clear liquid can also act as a long-term storage medium for hydrogen. We are leveraging this discovery to power a factory vehicle, for example. We equipped the electric car with an additional fuel cell in order to increase its range and be able to charge while driving. Here, methanol is used as a hydrogen source. The fuel cell charges the vehicle battery with the energy released when the hydrogen reacts with oxygen and pure water is produced. In the future, we want to explore additional ways of using methanol as a fuel.

A total of 30 industrial enterprises and research institutions from five European countries were involved in **ALIGN-CCUS**. The German Ministry of Economic Affairs and Energy (BMWi) and the European Union committed funds to the project. With ALIGN-CCUS, we have demonstrated how an entire value chain, from capturing and using carbon dioxide to storing it, can be designed. For this purpose, we converted carbon dioxide and hydrogen into dimethyl ether (DME). DME is a liquefied gas, similar to propane or LPG (autogas) and is used as a hairspray propellant, for example. DME, just like LPG, can be used to power cars. It burns like diesel but is low in both soot and nitrogen oxide, making it a cleaner option. The deciding factor here is that we also produce the necessary hydrogen ourselves – from water and green electricity. In Niederaussem, we commissioned a pilot plant in early 2020, allowing us to produce 50 kilogrammes of DME a day using carbon dioxide and hydrogen. We initially used the DME as fuel for a suitably converted diesel generator to produce peak-load electricity.

After completion of ALIGN-CCUS in November 2020, the pilot plant remained in operation. We now use it for the **TAKE-OFF** project, which was launched in early 2021 and is also backed by the EU. We are working with nine partners from six countries on TAKE-OFF. The aim is to keep developing the available technology to produce aviation fuel based on DME and methanol. In our **NRW-Revier-Power-to-BioJetFuel** project, we are also researching whether we can use existing methods on an industrial scale to produce eco-friendly aviation fuel from hydrogen and carbon dioxide. We assume that politicians are more likely to promote the use of green kerosene for aviation before green diesel for trucks and ships. This should make the results of this project interesting from an economic point of view.

Detailed information on these projects and our other R&D ventures can be found at www.rwe.com/innovations.

2.3 Business environment

Energy policy continues to centre on climate protection. The EU intends to enshrine an ambitious emission reduction goal for 2030 in law. At the end of 2020, the European Council announced that it was in favour of scaling back greenhouse gas emissions by at least 55 % compared to 1990. The EU aims to spur the creation of a more environmentally compatible economy. One goal is to better couple the electricity, heat, transportation and manufacturing sectors while also creating a European hydrogen economy. The European Commission has specified in strategy papers how this can be accomplished. A foundation has also been laid for increased climate protection in our home market, Germany. In mid-2020, policymakers established the legal framework for phasing out coal-fired electricity generation. This has given us increased planning certainty for our lignite business. We also welcome the state's assistance in cushioning the social impact of necessary redundancies.

Political environment

Europe seeks to become carbon neutral by 2050. In March 2020, the European Commission presented a draft for a European climate law. It was the first legislative proposal for the implementation of the EU's Green Deal, which the President of the European Commission Ursula von der Leyen had declared to be of the utmost priority during her five-year term in office (see page 42 of the 2019 Annual Report). The objective is to make the EU goal of carbon neutrality by 2050 legally binding. EU institutions and member states would then be obliged to establish a framework for reducing net greenhouse gas emissions to zero by the middle of the century. By 2023, the Commission will conduct an initial assessment and announce whether EU and national measures are mutually compatible and fit for purpose. A similar evaluation of the EU's progress is planned for every five years thereafter.

The legislative initiative also paves the way for raising the 2030 target for reducing greenhouse gas emissions. The previous goal was to reduce greenhouse gas emissions by 40 % compared to 1990. The March 2020 draft law proposed a decline of 50 % to 55 %, subject to a comprehensive impact assessment. Once the results of the assessment were published in September, the Commission set the target at no lower than 55 %. However, the European Parliament did not feel that the measures went far enough. In early October, a majority of delegates voted for a 60 % decrease of greenhouse gas emissions. Also in October, the European Council also gave the go-ahead for the climate law, although it initially omitted the interim goal for 2030. At the EU Summit in December, the heads of state and government agreed on a reduction of at least 55 %. Representatives of the Council and Parliament must now decide which target is ultimately adopted during formal trilogue meetings, in which the Commission is also involved. The negotiations had not been concluded when this review of operations was prepared (early March 2021).

The climate law will serve as the foundation for the Green Deal, which envisages far-reaching reforms to industry, energy supply, transport and agriculture. To this end, the European Commission is planning comprehensive legislative changes and a number of different programmes in order to provide for the accelerated expansion of renewable energy, a new strategy for the industrial sector, import barriers for goods produced using processes that are harmful to the climate, and a strategy for clean transportation, among other things. Regions which are most affected by these policy measures will be supported by way of a Just Transition Fund. The EU is also planning to reform the European Emissions Trading System and, in doing so, will probably considerably reduce the number of certificates placed on the market. The extent of the reduction is likely to depend on the emissions reduction target agreed upon by the Council and the Parliament

EU creates sustainability classification system for economic activity. In June 2020, the European Parliament and the Council of Ministers introduced the Taxonomy Regulation as a tool to help determine when to classify economic activity as sustainable. Players on the financial market, e. g. investment funds, labelling a financial product environmentally sustainable, will have to report the share of green investments in their portfolio as defined by the Regulation. Businesses will also be faced with stricter disclosure requirements. Companies obliged to prepare non-financial reports will have to provide more detailed information on the sustainability of their business activities. The EU hopes that the increased transparency will provide stimulus for investments that make a contribution to the Green Deal. The Taxonomy Regulation entered into force on 12 July 2020. As it is a central piece of legislation, there is no need to translate it into national law. The publication duties apply from 2022 onwards. However, the European Commission is yet to specify the criteria for determining the economic activities meeting the sustainability principles set out in the Regulation.

EU seeks to integrate energy system and drive expansion of hydrogen economy. In July 2020, the European Commission published strategy papers on coupling the electricity, heat, transport and manufacturing sectors (integration of the energy system) and on hydrogen. They contained a variety of goals and measures aimed at enabling the EU to achieve its target of carbon neutrality by 2050, as set out under the Green Deal. The European Commission's strategy to integrate the energy system aims to harness potential emission reductions and increase efficiency. An integrated system envisages a world in which vehicles are powered by solar panels, homes are heated by district heating from factories, and manufacturing plants are operated with hydrogen produced with offshore wind energy, to list a few examples. The European Commission sees increasing the share of electricity in final energy consumption as being key to sector coupling, i. e. increasing utilisation of heat pumps and electric vehicles, for example. Sectors which are likely to struggle with electrification will see a push for clean fuels, such as green hydrogen. To this end, the Commission intends to develop a new classification and certification system for zero and low-carbon fuels. In addition, it is planning support programmes and comprehensive adjustments to the European regulatory framework.

In an integrated energy system, hydrogen can be used to support the decarbonisation of industry, transport, power generation and buildings in Europe. The EU's hydrogen strategy addresses how to unlock this potential by way of investment, regulation, market creation, and innovation. The primary goal is to develop a green hydrogen economy, which largely sources its hydrogen electrolytically using renewable energy. By 2024, 6 GW of electrolysis capacity is envisaged, which would enable up to 1 million metric tons of green hydrogen to be produced per year. The Commission's roadmap seeks to make green hydrogen a core component of the integrated energy system by as early as 2030. Then the EU should have electrolysers with a total capacity of at least 40 GW, with annual production reaching up to 10 million metric tons of hydrogen. The EU expects green hydrogen production technologies to have matured by this point, allowing for large-scale rollout over the following two decades. In order to give this additional momentum, the Commission founded the European Clean Hydrogen Alliance, a body comprised of representatives from industry, national and local public authorities, civil society and the European Investment Bank. RWE is a member of the alliance, which has been tasked with driving investments to expand hydrogen infrastructure, among other things.

German government adopts national hydrogen strategy. The German government published its hydrogen plans in June 2020 – one month ahead of the EU. Germany's national hydrogen strategy affirms the country's intent to establish hydrogen technologies as core elements of the energy transition and to create the necessary regulatory framework to ensure large-scale rollout. The plan is to build a strong home market in Germany and to focus on green hydrogen, produced using renewable electricity, with the strategy paper stating that only this option is truly sustainable in the long term. The German government envisages electrolysers with a total capacity of 5 GW being built for the production of green hydrogen by 2030, in addition to the required generation assets, with offshore wind playing a major role. The objective is to have 10 GW of electrolysis capacity by 2040 at the latest. The large-scale rollout of hydrogen technology in Germany will be supported with €7 billion in subsidies. It is envisaged that an additional €2 billion will be set aside for international partnerships. The federal government also intends to give electricity used to produce green hydrogen preferential treatment in terms of taxes, levies and surcharges. This electricity has

already been exempted from the surcharges under the Renewable Energy Act and the Combined Heat and Power Act as well as the offshore grid apportionment as part of the reform of the Renewable Energy Act, on which we report below.

German government establishes more favourable subsidy conditions for renewables. In December 2020, the German Upper House and Lower House passed a reform of the German Renewable Energy Act, which entered into force on 1 January 2021. According to the law, all electricity generation in Germany must become carbon-neutral by 2050. The target for 2030 is for renewables to account for 65 % of electricity consumption. To facilitate this, legislators have set new expansion targets: they envisage photovoltaic and onshore wind capacities growing to 100 GW and 71 GW by 2030, corresponding to a rise of around 85 % and 30 %. The law provides for a number of regulations, many with a focus on making the operation of solar panels more attractive. The amendment also brings improvements for wind farms. For example, operators of new wind farms will be able to give local communities a share of the electricity revenue in order to increase local value added and thus raise acceptance. Old wind turbines, which have come to the end of their 20-year subsidy period, will receive a follow-up subsidy until 2022, subject to certain conditions. However, this measure still needs to be approved by the European Commission under state aid law. In order to reduce the strain on electricity consumers, the legislator is limiting the renewable energy surcharge to 6.5 cents / kWh for 2021 and 6.0 cents / kWh for 2022. The government will fund the shortfall from its budget. As mentioned above, electricity used to produce green hydrogen will be exempt from the renewable energy levy and further surcharges in the future.

In November 2020, the Lower and Upper Houses of Parliament passed two further laws to drive the expansion of renewable energy: the Offshore Wind Energy Act and the Investment Acceleration Act. The first of the two laws envisages the 2030 expansion target for offshore wind power increasing from 15 GW to 20 GW, with this figure rising to 40 GW by 2040. The tendering model will remain largely unchanged. In Germany, wind farms are subsidised via premiums. If the market price realised by the operators for their electricity is below a reference figure, the premium offsets the difference. The reference price is determined on the basis of a competitive tender process, in which participants with the lowest bids are selected. One important change is that permissible bids are now subject to higher ceilings. The upper limit will be set at €73 / MWh in 2021 and at €64 / MWh and €62 / MWh in the two following years, respectively. If the cap had not been raised, the maximum allowable bid in the next call for tenders would have been limited to the lowest successful bid in the previous auction of 2018, which was €0. In addition, moving forward, developers of wind energy projects will pay a higher penalty if they fail to make a final investment decision 24 months before the grid connection completion date. This lowers the likelihood of speculative zero-subsidy bids, fuelled by positive market forecasts.

The Investment Acceleration Act, passed in tandem with the Offshore Wind Energy Act, aims to decrease administrative and legal barriers to infrastructure expansion. It includes changes to court proceedings as well as environmental and general administrative procedures, including regional planning procedures. In accordance with the law, objections and actions for annulment by third parties disputing the approval of an onshore wind turbine with a total height of more than 50 metres no longer have a suspensive effect – allowing projects to progress. Furthermore, legal disputes concerning onshore wind farms of this size can now be fast-tracked through an expedited appeals process. The law provides for higher administrative courts to have jurisdiction in the first instance.

UK government publishes energy white paper for climate protection. In December 2020, the UK government published its energy white paper, setting out how it envisages the country's future climate protection trajectory. The UK is intent on achieving net zero emissions by 2050. The paper contains a variety of measures to pave the way for this vision. Particular focus has been given to offshore wind expansion: the UK government aims to quadruple capacity to a total of 40 GW by 2030. It further envisages a rise of climate-friendly hydrogen production capacity to 5 GW by the same year. A national scheme focused on achieving the climate targets for 2050 will replace the EU Emissions Trading System. Projects for capturing and storing or using carbon dioxide are to receive £1 billion in funding over the course of the decade.

Poland establishes support scheme for offshore wind. The Polish government has created the legal framework for subsidies for wind farms in the Baltic Sea, with the Parliament passing an appropriate law in January 2021. Poland intends to increase the share of renewables in electricity generation from 14 % in 2019 to 32 % in 2030. At the moment, there are no wind farms off the coast of Poland. However, turbines with a total capacity of 10.9 GW are due to be in development or in operation by as early as 2027. The law envisages a start phase, which will initially subsidise wind farms with a total capacity of 5.9 GW. Plant operators will be awarded contracts for difference which guarantee a fixed payment for 100,000 full load hours in generation, with a maximum subsidy period of 25 years. If the market price falls below the guaranteed remuneration, the state pays the difference. If it exceeds the specified sum, the operators are obliged to make a payment. In the first phase, the subsidies are set administratively. Companies have until the end of March 2021 to apply for them. After the start phase, the wind farms subsidised through contracts for difference will be determined in auctions. Tenders for up to 2.5 GW are planned for both 2025 and 2027. RWE is currently developing the FEW Baltic II offshore wind project in Poland. This project involves building a wind farm with an installed capacity of 350 MW on Słupsk Bank. FEW Baltic II satisfies the requirements for participating in the first phase of the offshore wind subsidy scheme.

US government improves funding conditions for renewables. In the USA, policymakers have increased the tax incentives for investments in renewable energy assets. Additionally, deadlines for incentive claims have been extended to protect investors from financial losses from construction delays due to the coronavirus. In the United States, renewable energy projects are subsidised using a two-pronged approach: production tax credits (PTCs) or investment tax credits (ITCs). PTCs grant a tax benefit per unit of electricity for a period of ten years. ITCs are based on the value of the investment. RWE's onshore wind turbines are typically subsidised with PTCs. Projects launched in 2016 / 2017 would have needed to be completed in 2020 / 2021 – i. e. four years later – in order to be eligible for the full subsidy. In light of the coronavirus pandemic, the US government extended this deadline by a year. RWE also benefits from this as there were delays in the completion of a number of wind farms due to COVID-19. In addition, the US government also decided to extend ITC subsidies for solar investments. New plants, which go into construction in 2021 or 2022, will be granted an investment tax credit of 26 % of the total investment. For plants going into construction in 2023, this figure drops to 22 %. More favourable funding conditions have now also been introduced for offshore wind: projects set to begin construction before 2026 qualify for an ITC of 30 % of the total investment.

German Upper and Lower House adopt regulatory framework for German coal phaseout. On 3 July 2020, the German Upper House and Lower House passed the law on the reduction and termination of coal-fired power generation and on the amendment of other legislation (Coal Phaseout Act). The law is based on recommendations published by the government's Growth, Structural Change and Employment Commission in January 2019. It provides for a gradual exit from electricity generation from coal by 2038. The Act also contains provisions for the continuous monitoring of security of supply and the introduction of adjustment allowances for older employees working in the coal sector as well as an authorisation clause, which enables the federal government to provide electricity consumers with financial relief if the coal phaseout leads to an increase in electricity prices. In addition, the legislator extended and refined the subsidisation of combined heat and power plants. The objective is to encourage retrofits of coal-fired power stations for more climate-friendly electricity generation.

Legislators have now also established a phaseout roadmap for lignite power plants. RWE will bear the brunt of initial capacity reductions. We decommissioned the first 300 MW block in the Rhenish lignite mining region, Niederaussem D, at the end of 2020. This year, we will take three further 300 MW assets off the grid, with one 300 MW block and two 600 MW units scheduled for 2022. The Neurath and Niederaussem sites will be most heavily affected by these plans, along with Weisweiler, albeit to a small extent. Furthermore, in 2022, we will discontinue briquette production in Frechen and, in turn, the operation of 120 MW in electricity generation capacity. Thereafter, we will shut down the remaining capacities at our Weisweiler power station: one 300 MW unit (2025) and two 600 MW blocks (2028 and 2029). The Inden opencast mine, which exclusively supplies Weisweiler with lignite, will then also be decommissioned. We will shut down our last two 600 MW stations in late 2029, one of which will remain on standby for four years to ensure security of supply. From 2030 onwards, this leaves only our three state-of-the-art lignite blocks at 1,000 MW apiece on the market.

The closures will have considerable consequences for the opencast mines. More than half the approved volume of lignite reserves will remain in the ground and Hambach Forest will be preserved. Of our three opencast mines in the Rhenish lignite mining region – Inden, Hambach and Garzweiler – we will only operate the last in the list from 2030 onwards to supply the remaining assets with fuel. Accordingly, the energy industry's need for the Garzweiler II opencast mine to remain operational has been enshrined in law via a clause added to the Coal Phaseout Act.

The lignite phaseout will place a huge financial burden on our company. In accordance with the law, we will therefore receive compensation in the amount of €2.6 billion, to be paid out in equal instalments over a 15-year period. However, the damage we will actually incur will clearly exceed this figure. Our claim for compensation from the state and the majority of our expected losses have already been accounted for in our 2019 consolidated financial statements (see page 43 of the 2019 Annual Report). Intended recipients of state compensation in addition to RWE include the employees affected by the layoffs. Among other things, the Coal Phaseout Act provides for adjustment allowances and compensation for any disadvantages in relation to statutory pensions. These will be covered by the state. Furthermore, a coal phaseout collective agreement we signed with the German Unified Services Trade Union (ver.di) and the German Mining, Chemicals and Energy Trade Union (IG BCE) in August 2020 contains provisions that determine what RWE has to do above and beyond the state measures.

The lignite phaseout is flanked by a public law contract between the state and the lignite producers. The contract contains a large number of regulations, which relate in particular to the implementation of the closures and compensation. This contract will serve to protect the companies' interests, which, in return, will not assert any further claims in relation to the lignite phaseout. Once approved by the Upper House, the contract was signed in early 2021. However, the compensations still require approval by the EU under state aid law. Irrespective of this, RWE has begun to implement the statutory phaseout plan.

The hard coal phaseout is also set out in detail in the new law. At which point each individual power plant will be taken off the grid and how much their operators will be compensated is determined in an auction process. The law envisages annual tenders from 2020 to 2027. Operator bids will be subject to specific caps which are set to be lowered from €165,000 to €89,000 / MW during the aforementioned period. From 2027 onwards, the law provides for closures without compensation. If the tenders do not result in enough capacity being decommissioned, starting in 2024, power plant operators will be ordered to shut down stations without compensation. RWE participated in the first auction, which was held in the second half of 2020. Our last two German hard coal power plants – Ibbenbüren B (794 MW) and Westfalen E (764 MW) – placed winning bids. The stations stopped operating in late 2020 (see page 44).

German government seeks to provide coal regions with up to €40 billion in subsidies. On 3 July, the Upper and Lower Houses of Parliament passed the Structural Development Act, which applies to coal mining regions. The law envisages the federal government providing up to €14 billion in financial support to the lignite mining regions for investments of particular importance through to 2038. Of these funds, 37 % will go to the Rhenish coal mining region, in which we are active, with 43 % and 20 % going to the Lausitzer and Central German coal mining areas, respectively. The funds can be used by the states, e. g. to invest

in industrial infrastructure and public transport. The government intends to flank this by supporting the regions through its own measures. A total of €26 billion has been budgeted for this and earmarked for measures such as the expansion of the rail and road networks as well as the creation of research hubs.

German government to overhaul compensation for nuclear phaseout. In September 2020, the German Constitutional Court found that the compensation regulations in the German nuclear phaseout plan introduced in 2018 had not entered into force. The Court thus ruled in favour of an appeal submitted by Vattenfall. The proceedings dealt with the 16th amendment to the German Nuclear Energy Act, which specified the approach to compensating RWE, Vattenfall, E.ON and EnBW for certain financial losses due to the expedited nuclear phaseout. The phaseout had been enshrined in law in 2011 following the Fukushima nuclear disaster. This was the second exit law after 2000. In 2010, the government had extended the lifetimes of nuclear power stations. After the reactor incident, it reversed the extension and imposed stricter conditions on the exit. In December 2016, the Constitutional Court ruled that the power station operators have to be compensated for certain losses due to the second nuclear phaseout and tasked the state with making the necessary legislative arrangements by mid-2018. Compensation claims were thus ruled admissible for generation contingents that had been approved in the first nuclear phaseout in 2000, but which could no longer be used due to the decommissioning deadlines introduced in 2011, and for investments that were now worthless and that the power plant operators had undertaken based on the lifetime extension introduced in 2010. The state intended to implement these instructions by way of the 16th amendment to the German Nuclear Energy Act. However, according to the most recent Constitutional Court ruling, the amendment never entered into force due to formal errors. Additionally, the Court also found that individual provisions, which were dedicated to compensation for unusable generation contingents and which could prove detrimental to the affected companies, were unconstitutional. In accordance with the ruling of the highest court, the legislator is obliged to rewrite the compensation regulations. The German government began talks with the nuclear power plant operators on this subject at the beginning of 2021 (also see page 46).

Market environment

Economic output drops in all of RWE's core markets. According to preliminary estimates, global economic output dropped by 4 % in 2020 compared to the previous year. The coronavirus pandemic and the associated lockdown measures caused many countries' gross domestic product (GDP) to slump drastically. Economic experts estimate a GDP decline of about 7 % for the Eurozone. Economic output was not as adversely affected in Germany and the Netherlands, our most important markets within the currency union. Estimates here vary between – 5 % and – 4 %. The USA is likely to have experienced a similar decline. However, the United Kingdom has been hit much harder by the pandemic: based on available data, UK GDP probably shrank by about 10 %.

German electricity consumption down by an estimated 4 %. Decreased economic output has also meant lower demand for energy. According to the German Association of Energy and Water Industries (BDEW), German electricity consumption in the past fiscal year was down 4 % on 2019. Other RWE core markets have also been on the decline. Experts put the downturn at 2 % for the Netherlands, 6 % for the UK and 3 % for the USA. This development was largely attributable to restrictions to industrial output due to COVID-19. The mild weather also had a minor impact, as less electricity was needed for heating.

Better wind conditions in northern and central Europe. Utilisation and profitability of renewable assets are largely weather-dependent. This is why wind speeds are extremely important to us. In 2020, these were generally higher than the long-term average and often up on 2019 at our production sites in northern Europe, the United Kingdom, and the Netherlands. An opposite trend was witnessed in the south of Europe and of the southern states of the USA. By and large, wind conditions in Germany, Poland and large parts of the USA were normal, with notable changes over 2019 being an exception to the rule.

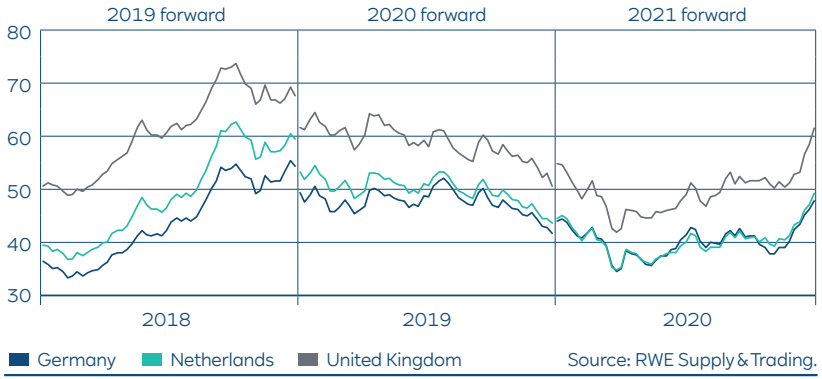
Average RWE wind farm utilisation in 2020	Onshore	Offshore
%		
Germany	20	40
United Kingdom	34	42
Netherlands	30	–
Poland	29	–
Spain	23	–
Italy	21	–
Sweden	33	56
USA	33	–

Weather-driven collapse of natural gas spot prices. The utilisation and earnings of our conventional power plants are heavily dependent on how fuel and emission allowance prices develop. Natural gas, our most important tradable energy source, was characterised by an extremely low price level in the year under review. Quotations at the Dutch Title Transfer Facility (TTF), Continental Europe's lead market, dropped as low as €3 / MWh in the first half of the year, but were able to regain considerable ground during the rest of the year. However, the 2020 average of €9 / MWh was notably lower overall than the previous year's (€14 / MWh). The decrease in demand for heating gas due to the mild winter of 2019 / 2020 and the commensurately high storage levels at the beginning of the year played a significant role. Later on, the corona-induced decline in industrial and commercial gas consumption affected the price trend. Forward trading prices also dropped. In the year under review, the 2021 TTF forward cost €13 / MWh on average. By way of comparison, in 2019, the 2020 forward traded at €18 / MWh.

Declining demand curbs hard coal prices. Hard coal used in power plants (steam coal) also became notably cheaper: deliveries to ARA ports (ARA = Amsterdam, Rotterdam, Antwerp) including freight and insurance were settled for an average of US$50 / metric ton (€45) in 2020, as opposed to US$61 / metric ton the year prior. The decline is mainly due to a drop in demand: coal-fired power stations have most recently been underutilised in Europe. The unusually low gas prices, which made gas much more competitive as an energy source than coal, came to bear. Decreased energy demand due to the coronavirus pandemic also caused hard coal usage to contract. Many market participants assume that the market environment for coal-fired power plants will remain challenging, not least due to the relatively high carbon emissions associated with these stations and the correlated cost disadvantages. This assessment was reflected in the development of hard coal forward prices: in the year under review, the 2021 forward (API 2 Index) was quoted at an average of US$58 / metric ton (€51). This is US$12 less than was paid for the 2020 forward in 2019.

Despite COVID-19, CO_2 emission allowance prices hit record high. An important price factor for fossil fuel-fired power plants is the procurement of CO_2 emission allowances. A European Union Allowance (EUA), entitling the holder to emit one metric ton of carbon dioxide, was traded at an average of €25 in 2020. The reference figure for 2019 was also €25. These prices relate to contracts for delivery that mature in December of the following year. At times, certificate prices dropped substantially due to the coronavirus pandemic. In March 2020, they fell to below €16. Decreased industrial output weighed on prices as it resulted in reduced carbon dioxide emissions, driving down demand for emission allowances. Over the rest of the year, prices rose to a record €33 in December. The materialising economic recovery came to bear here. The EU initiative to raise the climate target for 2030 also played a role, as it stipulates that the EU significantly reduce the number of emission allowances put on the market. Many participants in emissions trading therefore expect a further shortage of available EUAs, despite the economy's continued carbon dioxide reductions.

One-year forward prices of base-load electricity on the wholesale market
€ / MWh (average weekly figures)



Source: RWE Supply & Trading.

Significant decline in wholesale electricity prices. The drop in hard coal and natural gas prices shaped the trajectory of the wholesale electricity markets last year. The decrease in demand for energy triggered by the coronavirus pandemic was another influential factor. In 2020, base-load electricity traded for an average of €30 / MWh on the German spot market as opposed to €38 / MWh in the prior year. In the UK and the Netherlands, spot prices declined from £43 to £35 / MWh (€40) and from €41 to €32 / MWh, respectively. Electricity prices on the forward markets were higher than spot prices. Compared to 2019, however, they were also marked by a significant decline. The 2021 base-load forward cost €40 / MWh on average. The comparable figure for the previous year was €48. One-year forward prices declined from £52 to £44 / MWh (€49) in the UK and from €50 to €40 / MWh in the Netherlands.

2020 electricity forward sales: margins slightly higher year on year. In order to mitigate the risk of short-term sales and price fluctuations, we sell most of our generation forward and hedge the prices for the necessary fuel and emission allowances. Electricity revenue for the period under review was thus greatly defined by the conditions of the forward contracts for 2020, which were concluded in previous years. As we had begun conducting such forward sales quite early for electricity production in our lignite and nuclear plants, which are mainly used to cover base load needs, we were able to achieve higher prices and margins on average for 2020 than for 2019. Sales of electricity from our hard coal and gas-fired stations were subject to a shorter lead time. Here realised prices also rose, but opposing effects were more notable due to the pre-2020 hike in CO_2 emission allowance prices. Whereas margins realised for our gas-fired power plants on the forward market were higher overall than in 2019, margins for our hard coal-fired power stations stagnated at a low level.

2.4 Major events

We passed further milestones last year. In mid-2020, we completed the asset swap with E.ON, which has transformed us into a leading renewable energy company. We also made major inroads in the expansion of our wind and solar capacity. To gain even more traction in this area, we conducted a capital increase and acquired the European development business of Nordex. Furthermore, we discontinued our electricity generation from hard coal in Germany and the UK. In doing so, we have proven that our climate protection measures go far beyond what is required by law. In the following, we present the material events that occurred in 2020 and the beginning of 2021. We have focused on transactions that have not been commented on in detail elsewhere in the review of operations.

Events in the fiscal year

Asset swap with E.ON finalised: RWE takes ownership of innogy's renewable energy business. At the end of June, we successfully completed our asset swap with E.ON, marking one of the biggest transactions in German industrial history. The swap was agreed in early 2018 and implemented in two steps once the legal requirements had been met. First, we sold our 76.8 % stake in innogy, in exchange for which we received E.ON's renewable energy business, a 16.67 % shareholding in E.ON and the non-controlling interests in our Gundremmingen (25 %) and Emsland (12.5 %) nuclear power plants from E.ON subsidiary PreussenElektra. These transfers took place shortly after the asset swap was approved by the European Commission in September 2019. The second step, which took effect at the end of the day on 30 June 2020, involved E.ON returning parts of the innogy portfolio to us, i. e. the renewable energy business, the German and Czech gas storage facilities and a 37.9 % stake in Austrian power utility KELAG. We had recorded these activities in our Group figures before they were transferred back to us, as they were already assigned to us commercially. Now they belong to RWE also in legal terms.

As part of the asset swap, we transferred our 49 % interest in Slovak power utility VSE to E.ON. We had taken over the VSE shareholding from innogy in 2019 in order to sell it to E.ON later on at the same conditions. However, this was subject to the approval of the Slovak government. We received state clearance in mid-2020, enabling the transaction to be completed in August. The price of the stake in VSE had been considered in 2019 when settling the payment claims arising from the asset swap with E.ON.

In December 2020, it was contractually agreed that we would receive from E.ON a 20 % stake in the UK offshore wind farm Rampion, which had not initially been considered in implementing the asset swap. This will increase our stake in the 400 MW wind farm to 50.1 %, making us the majority owner. We had already received a 30.1 % interest from E.ON in September 2019. We expect to complete the acquisition in 2021. The Rampion wind farm is located off the coast of Sussex and has been operating commercially since 2018.

RWE increases financial headroom for renewable energy projects by increasing equity by €2 billion. On 18 / 19 August, we issued 61.5 million new RWE shares to institutional investors, thereby increasing RWE AG's capital stock by 10 %. The shares were placed by way of accelerated book building under exclusion of subscription rights. Based on the issue price of €32.55 per share, we achieved gross proceeds of approximately €2 billion. We intend to use these funds to speed up the expansion of renewable energy. The capital increase caused the number of RWE shares to rise to 676.2 million. The new and old stock confer the same rights. Despite the increase in the number of shares, the Executive Board of RWE AG maintains its dividend target. Together with the Supervisory Board, it plans to propose a dividend of €0.85 per share for the past fiscal year to the Annual General Meeting on 28 April 2021.

RWE acquires European wind and solar projects from Nordex. In November, RWE purchased the European project development business of wind turbine manufacturer Nordex for €396 million. We received a project pipeline of new onshore wind and solar farms with a total installed capacity of 2.7 GW. A total of 1.9 GW is located in France, with further ventures in Spain, Sweden and Poland. At the end of 2020, a final investment decision was reached for four projects in the pipeline, which will result in 76 MW of generation capacity. Thanks to the Nordex transaction, we have added over 70 employees to our headcount, mostly in France, who will develop further projects for RWE in the future.

RWE concludes agreements for lease to expand four UK offshore wind farms. Together with project partners, we set the stage for an expansion of four wind farms off the coast of the UK. We concluded agreements for lease with The Crown Estate, the authority in charge of managing the assets of the British monarch. These contracts allow us to use further areas neighbouring the Gwynt y Môr (576 MW), Greater Gabbard (504 MW), Galloper (353 MW) and Rampion (400 MW) wind farms. This enables existing capacity to be doubled. Including capacity from the remaining seabed option at Rampion, this could lead to 2.6 GW in additional generation capacity. Based on the shareholding ratios, half of this is allocable to RWE. Now our goal is to develop these projects rapidly. We expect the approval procedure to take between three and five years. Thereafter, we will participate in auctions for state subsidy contracts and – should we submit a winning bid – we will make the final investment decisions. The new wind farms could then be commissioned towards the end of the decade.

Go-ahead for construction of Kaskasi wind farm in the North Sea. In March 2020, RWE made the final investment decision to build the Kaskasi wind farm in the German North Sea. It will be located 35 kilometres north of the island of Heligoland. Altogether, its 38 turbines will have an installed capacity of 342 MW, enough to power approximately 400,000 homes. Offshore construction work is scheduled to start in 2021. Based on our current planning, Kaskasi should be fully online by as early as 2022. A novel vibration technique will be used to install the foundations 18 to 25 metres under water. This new method reduces noise emissions that can affect marine fauna and shortens construction time. Another advantage is that Kaskasi will be located between our Nordsee Ost and Amrumbank wind farms, enabling operation and maintenance synergies to be leveraged.

US wind farms with a net capacity of over 700 MW begin commercial operation. In the fiscal year that just ended, we commissioned four large-scale onshore wind farms with a total installed capacity of 719 MW in the USA. Peyton Creek (151 MW) was the first to go online. The Texan wind farm was commissioned in March. Although construction work was delayed by Tropical Storm Imelda, the wind farm managed to go online on schedule. Half a year later, in September 2020, Cranell (220 MW), also located in Texas, went into commercial operation. Cranell experienced slight delays due to the corona crisis. Despite the pandemic, Boiling Springs (Oklahoma, 148 MW) and Raymond East (Texas, 200 MW) were completed before year-end. However, project completion for Scioto Ridge (Ohio, 250 MW), Cassadaga (New York State, 126 MW) and Raymond West (Texas, 240 MW) was delayed to 2021.

RWE sells stake in Humber Gateway wind farm in the North Sea and four wind farms in Texas. To increase our financial strength and improve the balance of our generation portfolio, we sold shares in wind farms in the United Kingdom and the USA. In December, UK investor Greencoat took a 49 % interest in our Humber Gateway (219 MW) wind farm located off the coast of East Yorkshire in the North Sea. Humber Gateway has officially been online since 2015, and we remain the majority owner (51 %) and operator of the wind farm. Also in December, we agreed to divest stakes in our Texan onshore wind farms Stella (201 MW), Cranell (220 MW), Raymond East (200 MW) and Raymond West (240 MW). The buyers are a subsidiary of Canadian energy utility Algonquin Power & Utilities and Greencoat. These two companies will take interests of 51 % and 24 % in the wind farms, respectively. With the exception of the Raymond West transaction, these sales were completed in early 2021. As we will only retain 25 % ownership of the US wind farms, we will stop consolidating them fully and instead account for them using the equity method. RWE will remain the operator.

RWE sells small hydro stations to KELAG. Austrian energy utility KELAG will purchase a generation portfolio comprising 19 small hydroelectric power plants in France and Portugal from us. A corresponding agreement was signed in December 2020. The portfolio has an installed capacity of 65 MW, including several wind turbines with a combined capacity of 3 MW. The capacity figures are prorated, meaning that they reflect capacity in line with the shareholding ratios. The sale is scheduled to be completed this year. KELAG is a leading hydroelectric power producer and RWE holds a 37.9 % stake in the company.

State-of-the-art gas-fired power plant acquired in the east of England. Early in 2020, we cemented our position as a leading generator of electricity from gas in the UK. In February 2020, we bought the King's Lynn gas-fired power station in Norfolk (eastern England) from British energy utility Centrica for the equivalent of €113 million. The station has a net installed capacity of 382 MW and boasts a high efficiency of 57 %. Its operating mode can be adapted flexibly in response to demand. A capacity market contract secures fixed payments for King's Lynn from October 2020 to September 2035. Recently, the power plant was modernised extensively, which included equipping it with a new gas turbine.

Go-ahead to build a grid stabilisation plant at the Biblis site. Germany will be home to a new RWE gas power station. We won the invitation to tender by transmission system operator (TSO) Amprion for the construction and operation of a grid stabilisation plant at the Biblis site. The station will have a capacity of 300 MW and is scheduled to be commissioned no later than October 2022. It will not be available to the open market, instead operating only on request from the TSO. Its sole purpose will be to help stabilise power grid frequency, making a contribution to security of supply.

RWE stops producing electricity from hard coal in Germany. With our early exit from hard coal-fired electricity generation in Germany, we have taken a major step towards improving our carbon footprint. The stage for this was set in the second half of 2020 when we won remuneration contracts for Unit B (794 MW) in Ibbenbüren and Unit E (764 MW) at the Westfalen site in Hamm in the first nationwide shutdown auction for hard coal power plants. Therefore, since 1 January 2021 we may no longer market electricity from our last two German hard coal power stations. We secured compensation of €216 million in the auction. We will shut down the units as soon as the relevant transmission system operators confirm that they are not needed to maintain grid stability. Including Niederaussem Block D (297 MW), which was decommissioned at the end of 2020, we are thus taking a total of 1.9 GW offline right at the beginning of the German coal phaseout. A collective agreement ensures that the shutdowns will be conducted in a socially acceptable manner.

The hard coal auction called for bids to win state subsidies to decommission 4 GW of power plant capacity. The deadline for submitting bids was 1 September 2020. Those requesting the lowest compensatory payment per metric ton of carbon dioxide avoided won contracts. The auction was significantly oversubscribed, and eleven assets with a combined capacity of as much as 4.8 GW submitted winning bids. The invitation to tender was the first of a series of hard coal auctions through which the German Network Agency is implementing the legally mandated coal phaseout. As we were successful with both our German hard coal-fired power stations in the first round, there is no need for us to participate in further auctions.

Welsh Aberthaw B hard coal power plant shut down. We have also stopped generating electricity from hard coal in the United Kingdom. The last station in which we used this fuel, Aberthaw B in Wales, was officially decommissioned at the end of March 2020. The station consisted of three units with a total net capacity of 1,560 MW. Its British capacity market obligations through to the end of September 2021 were transferred to third-party stations or other units within RWE's power plant fleet. Aberthaw B went into operation in 1971 and has thus contributed to security of supply in the United Kingdom for nearly half a century.

RWE successful in British capacity market auctions. In the first quarter of 2020, three auctions were held for the British capacity market, some of the outcomes of which will have a significant impact on the earnings of our power stations. The first round of bids, which took place at the end of January, related to the delivery period from 1 October 2022 to 30 September 2023. RWE power plants qualified for capacity payments for a total secured capacity of 6.5 GW. During the aforementioned period, these stations will be remunerated for being online and thereby contributing to security of supply. However, at £6.44 / kW (plus inflation adjustment), the capacity payment established in the bidding procedure was much lower than in similar auctions in earlier years.

At the beginning of February, a second auction was held, which related to the delivery period from 1 October 2020 to 30 September 2021. An earlier auction for this period had already taken place in December 2016, at which RWE stations with a total capacity of 8.0 GW (including Aberthaw) qualified for a payment of £22.50 / kW. The recent auction was held to close remaining capacity gaps. Therefore, RWE only entered a small asset, which did not submit a successful bid.

In the third auction, for the period from 1 October 2023 to 30 September 2024, which took place in early March, remuneration was secured for 6.5 GW of RWE generation capacity. The stations will receive a payment of £15.97 / kW (plus inflation adjustment).

Capacity auctions have been held in Great Britain since 2014. The government's objective is to ensure that a sufficient amount of generation capacity is available to the national market. In November 2018, the British capacity market had to be suspended for about a year, because the approval it had been granted under subsidy law was declared null and void by the Court of the European Union. After renewed clearance from Brussels in October 2019, capacity payments were resumed and the postponed auctions were held. In January 2020, we received approximately €50 million in retroactive payments for 2018 and about €180 million for 2019. In our income statement, we had already recognised these cash inflows with an effect on fiscal 2019.

Wood pellet manufacturer Georgia Biomass sold to Enviva Partners. At the end of July, we sold Georgia Biomass Holding to US-based Enviva Partners. The agreed price was US$175 million. Georgia Biomass operates a large-scale plant in Waycross, Georgia, which manufactures wood pellets for industrial use. The plant's most recent annual production output totalled 800,000 metric tons. Our disposal of Georgia Biomass is in line with our new strategic orientation. We no longer consider wood pellet production as one of our core businesses. The buyer Enviva Partners, based in Bethesda, Maryland, ranks among the world's leading producers of this fuel.

Six-month interruption of generation from biomass in Eemshaven due to fire. We were unable to produce electricity from biomass in the Dutch power station Eemshaven from mid-May to mid-November 2020 due to fire damage. The two units ran solely on hard coal during this period. The fire broke out in a biomass supply unit. No one was injured. The fire affected our earnings by a low to medium double-digit million euro amount. The interruption of generation from biomass resulted in a commensurate reduction in the state subsidy we receive for co-firing this fuel. Moreover, we incurred costs for the storage of biomass stocks which we had purchased forward early on.

Markus Krebber becomes CEO of RWE AG in May 2021 – Michael Müller and Zvezdana Seeger on board since November 2020. Last year, the Supervisory Board of RWE AG reached personnel decisions that will ensure the company's continued success. In July, it passed a resolution to give Markus Krebber (48) another term on the Executive Board (through to 30 June 2026) and appoint him CEO in the near future. He will succeed Rolf Martin Schmitz (63), whose contract will expire, as CEO with effect from 1 May 2021. The Supervisory Board is confident that this will ensure that the Group maintains its strategic orientation. Markus Krebber has been the CFO of RWE AG since 2016. Together with Rolf Martin Schmitz, he has succeeded in transforming RWE into a leading renewable energy company.

Zvezdana Seeger (56) and Michael Müller (49) will be Markus Krebber's fellow members on the Executive Board of RWE AG. The Supervisory Board appointed the two executives to the corporate body with effect from 1 November 2020. Before joining RWE, Zvezdana Seeger, who holds a degree in economics, was a member of the Management Board of DB Privat- und Firmenkundenbank AG and COO of Deutsche Bank AG's Private and Corporate Business Unit. At RWE AG, she holds the human resources and IT offices and is also the company's Labour Director. Michael Müller has held managerial positions at RWE since 2005. The most recent posts held by the engineering post-doctorate and economist were those of Managing Director and CFO of the subsidiary RWE Supply & Trading GmbH. Michael Müller is responsible for finance, taxes and business services at RWE AG. He will succeed Markus Krebber as Chief Financial Officer when Mr. Krebber takes over as Chief Executive Officer from Mr. Schmitz. Michael Müller will continue to hold his positions at RWE Supply & Trading concurrently until 30 April 2021.

More detailed information on the members of the Executive Board of RWE AG can be found at www.rwe.com/en/management-board-and-supervisory-board and on pages 9 et seq. of this report.

Events after the close of the fiscal year

RWE wins rights to develop new offshore wind power sites in English North Sea. At an auction held in February 2021, RWE secured the rights to develop 3,000 MW of offshore wind capacity across two neighbouring locations in the English North Sea. In return, we will pay an annual option fee of £82,552 / MW (plus inflation adjustment) until we make a final investment decision. The sites are situated on Dogger Bank in a shallow region of the North Sea. RWE is already developing Sofia, a further offshore wind project, in the vicinity. First, all the new sites will be subjected to a Plan-Level Habitats Regulations Assessment (HRA). Given a positive result, we will start developing the project and paying the option fee. As soon as the necessary permits have been obtained, we can participate in a subsidy auction for a contract for difference, after which we can make a final investment decision. Then the option fee will be replaced by a much lower lease payment. If the project progresses on schedule, the new wind farms could be commissioned towards the end of the decade. Under The Crown Estate's auction at the beginning of the year, development rights were won for a total of six offshore sites on which wind farms with a capacity of up to 7,980 MW can be built. Some of the participants also securing option rights submitted much higher bids than us. RWE will pay the lowest annual average option fee per megawatt among all successful bidders.

Considerable drop in earnings due to the worst cold wave in Texas in over a century. In February 2021, an extraordinary cold front in parts of the USA caused substantial supply outages. Winter storms and icy rain forced some RWE wind farms to go offline for several days. We had sold forward a portion of the generation of these assets and therefore had to buy electricity in order to meet our supply obligations. Due to the tight supply situation and statutory price regulations, we had to pay up to US$9,000 / MWh for these purchases. This weighed on earnings in the Onshore Wind / Solar segment by a low to medium triple-digit million euro amount.

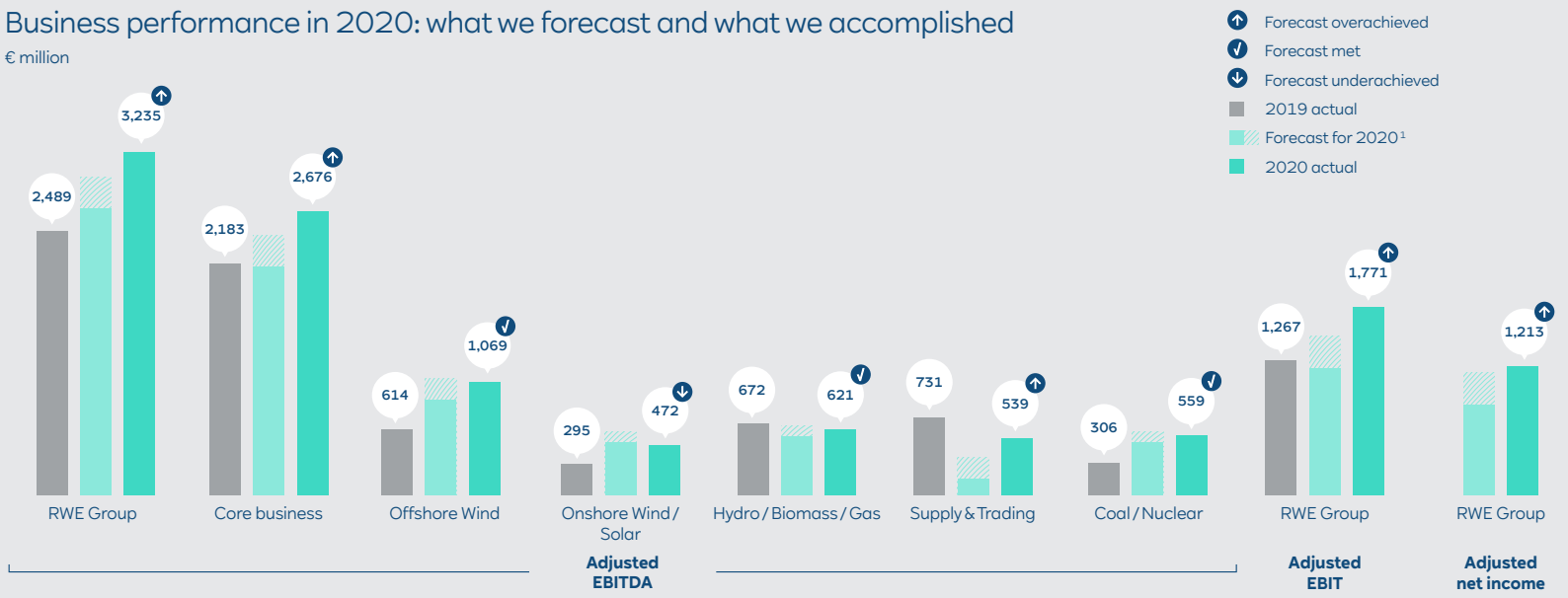
German government and power plant operators agree on compensation for nuclear phaseout. In March 2021, the German government and the country's nuclear power station operators reached an agreement on the compensation due for the accelerated nuclear phaseout. The talks were initiated because the German Constitutional Court declared the original statutory compensation regulations null and void (see page 39). As regards RWE, this relates to unusable generation contingents of 25.9 million MWh and stranded investments of about €40 million. The government has indicated that it will pay €33.22 / MWh as compensation for the electricity contingents. Furthermore, the agreement envisages that we will be reimbursed for half of the stranded investments. We accept this solution. However, it is yet to be written into law and a public law contract between the government and power plant operators. It also needs to be reviewed by the European Commission for compliance with subsidy law. The agreement with the government did not affect the Group's financial statements.

2.5 Business performance

Despite the corona crisis, 2020 was a successful fiscal year for us. RWE achieved adjusted EBITDA of €3.2 billion, which exceeded the guided range. This was primarily thanks to a very good trading performance. In addition, favourable weather conditions enabled high utilisation of our wind farms. The pandemic only had a limited impact on our earnings: it caused slight delays in wind projects and losses in our securities portfolio. Positive development was displayed not only by our earnings, but also by our carbon footprint: RWE's CO_2 emissions recorded another significant decline. Last year, they were already 62 % below the 2012 level.

Business performance in 2020: what we forecast and what we accomplished

€ million



1 See pages 94 et seq. of the 2019 Annual Report. The hatched portion reflects the forecast range.

Power generation	Renewables		Pumped storage, batteries		Gas		Lignite		Hard coal		Nuclear		Total[1]	
GWh	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019
Offshore Wind	7,009	4,116	–	–	–	–	–	–	–	–	–	–	7,009	4,116
Onshore Wind / Solar	16,762	8,056	–	–	–	–	–	–	–	–	–	–	16,762	8,056
Hydro / Biomass / Gas	5,910	4,202	2,060	1,760	49,414	50,564	–	–	3,584	9,466	–	–	61,178	66,103
of which:														
Germany[2]	1,737	2,026	2,060	1,760	8,576	7,836	–	–	–	–	–	–	12,583	11,733
United Kingdom	460	577	–	–	25,250	33,482	–	–	–	654	–	–	25,710	34,713
Netherlands	3,679	1,599	–	–	11,307	6,564	–	–	3,584	8,812	–	–	18,570	16,975
Turkey	–	–	–	–	4,281	2,682	–	–	–	–	–	–	4,281	2,682
Coal / Nuclear[2]	19	12	–	–	726	224	36,649	48,249	3,791	4,734	20,682	21,233	61,826	74,890
RWE Group	**29,700**	**16,386**	**2,060**	**1,760**	**50,140**	**50,788**	**36,649**	**48,249**	**7,375**	**14,200**	**20,682**	**21,233**	**146,775**	**153,165**

1 Including production volumes not attributable to any of the energy sources mentioned (e. g. electricity from oil-fired power stations).
2 Including electricity from generation assets not owned by RWE that we can deploy at our discretion on the basis of long-term use agreements. These purchases amounted to 2,157 GWh (previous year: 1,829 GWh) in the Hydro / Biomass / Gas segment and 1,009 GWh (previous year: 1,791 GWh) in the Coal / Nuclear segment.

Electricity production 4 % down on prior year. In the fiscal year that just came to a close, the RWE Group produced 146,775 GWh of electricity, of which 20 % was generated from renewables, i. e. wind, sun and biomass. Natural gas accounted for a share of 34 %. Lignite and hard coal continued to lose significance, contributing 25 % and 5 % to our power production. The portion attributable to nuclear fuel was 14 %.

Our electricity generation dropped by 4 % compared to the previous year. The most significant declines were recorded by our hard coal and lignite power stations. One contributing factor was that gas, the energy source competing with coal, was occasionally much cheaper and therefore more attractive than in the previous year. Furthermore, the corona crisis and substantial amounts of wind power put on the system reduced demand for conventionally generated electricity. Due to the latter circumstance, less use was made of our British gas-fired power stations than in 2019. Our electricity generation from gas grew elsewhere; in Germany this was partly driven by said decline in the price of gas. In addition, in the Netherlands, Claus C resumed operations after being offline for several years because it was not profitable. More use was also made of our gas-fired power plant in Denizli, Turkey. One of the reasons was that the large share of local electricity supply customarily accounted for by hydropower experienced a weather-induced drop.

The contribution of renewable energy to our electricity generation rose considerably. This was mainly because the operations transferred from E.ON to RWE in September 2019 were considered in our figures for a full twelve months for the first time. In addition, we benefited

from favourable wind conditions and the commissioning of new onshore wind farms. The fact that our Dutch hard coal-fired power stations Amer 9 and Eemshaven are now increasingly run on biomass also had a positive impact. However, biomass usage in Eemshaven was interrupted from May to November 2020 due to fire damage.

In addition to our in-house generation, we procure electricity from suppliers outside of the Group. In the year being reviewed, these purchases totalled 53,940 GWh (previous year: 46,476 GWh). In-house generation and power purchases combined for 200,715 GWh (previous year: 199,641 GWh).

Power generation from renewables	Offshore Wind		Onshore Wind		Solar		Hydro		Biomass		Total	
GWh	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019
Germany	2,082	1,299	1,168	1,106	3	1	1,674	1,856	4	46	4,931	4,308
United Kingdom	4,690	2,755	2,134	1,278	–	–	118	193	342	383	7,284	4,609
Netherlands	–	–	768	702	7	–	14	18	3,665	1,581	4,454	2,301
Poland	–	–	997	733	1	1	–	–	–	–	998	734
Spain	–	–	890	1,047	51	–	29	20	–	–	970	1,067
Italy	–	–	882	406	–	–	–	–	–	–	882	406
Sweden	237	62	339	106	–	–	–	–	–	–	576	168
USA	–	–	9,059	2,564	271	35	–	–	–	–	9,330	2,599
Rest of the world	–	–	30	28	99	2	146	164	–	–	275	194
RWE Group	**7,009**	**4,116**	**16,267**	**7,970**	**432**	**39**	**1,981**	**2,251**	**4,011**	**2,010**	**29,700**	**16,386**

Lower generation capacity due to coal power plant closures. At the end of 2020, we had a total installed power production capacity of 40.7 GW, giving us a leading market position in Europe. This figure includes electricity from generation assets not owned by us that we can deploy at our discretion on the basis of long-term agreements. Conversely, we no longer consider our five German lignite blocks, which are in legally mandated security standby and will be shut down for good, a process that will start in 2021 and end in 2023. We have adjusted the prior-year figures accordingly.

Our generation capacity dropped by 0.7 GW last year, above all due to the German coal phaseout. As set out on page 44, the Ibbenbüren B (794 MW) and Westfalen E (764 MW) hard coal-fired power plants were decommissioned at the end of 2020. They are scheduled to be shut down in 2021 and were therefore excluded from the capacity figures as of the balance-sheet date. The Niederaussem D lignite block (297 MW) was also shut down at the end of the year. Conversely, we added a gas-fired power plant to our fleet through the acquisition of King's Lynn (382 MW) in the east of England. We increased production capacity from renewables by 1 GW primarily by completing four large-scale onshore wind farms in the USA (see page 43). The conversion of the Dutch Amer 9 and Eemshaven hard coal-fired power stations for increased biomass co-firing also contributed to the rise in renewable energy capacity. This led to a commensurate decline in the share of generation from these assets attributable to hard coal.

In terms of generation capacity, gas is our main energy source, accounting for a share of 35 % at the close of 2020. Renewables are in second place, with a share of 25 %. At the end of 2020, our wind turbines had a total installed capacity of 8.5 GW, of which 6.6 GW were onshore and 1.9 GW were offshore. This makes wind our most important source of renewable energy, followed by biomass (0.8 GW), hydropower (0.6 GW) and solar (0.2 GW).

The geographic focus of our generation business is Germany, where 51 % of our installed capacity is located. The United Kingdom and the Netherlands follow, accounting for shares of 23 % and 14 %, respectively. As a result of the acquisition of E.ON's renewable energy business in September 2019, the USA has become our fourth most important generation market. More than half of our onshore wind turbines are situated there, most of which are in Texas.

Installed capacity[1]	Renewables	Pumped storage, batteries	Gas	Lignite	Hard coal	Nuclear	Total[2]	
As of 31 December 2020, MW							2020	2019
Offshore Wind	1,918	–	–	–	–	–	1,918	1,918
Onshore Wind / Solar	6,858	20	–	–	–	–	6,877	6,063
Hydro / Biomass / Gas	1,366	2,336	13,901		1,474		19,369	19,080
of which:								
Germany[3]	432	2,336	3,807	–	–	–	6,614	6,583
United Kingdom	137	–	6,984	–	–	–	7,374	7,118
Netherlands / Belgium	748	–	2,323	–	1,474	–	4,545	4,519
Turkey	–	–	787	–	–	–	787	787
Coal / Nuclear[3]	7	–	400	8,548	783	2,770	12,535	14,352
RWE Group[4]	**10,148**	**2,358**	**14,301**	**8,548**	**2,257**	**2,770**	**40,702**	**41,415**

1 Assets scheduled for decommissioning are excluded from the capacity overview once they stop producing electricity. They include our five lignite units in legally mandated security standby (1,448 MW) which have therefore been excluded from the figures for 2020 and 2019. The Ibbenbüren B and Westfalen E hard coal-fired power stations stopped being included at the end of 2020. The commercial rounding of certain figures can result in inaccurate sum totals.
2 Including capacity not attributable to any of the energy sources mentioned (e. g. oil-fired power stations).
3 Including capacity of generation assets not owned by RWE that we can deploy at our discretion on the basis of long-term use agreements. At the end of 2020, these assets accounted for a net installed capacity of 2,211 MW in the Hydro / Biomass / Gas segment and 783 MW in the Coal / Nuclear segment.
4 Including insignificant capacity at RWE Supply & Trading.

Installed capacity based on renewables[1]	Offshore wind	Onshore wind	Solar	Hydro	Biomass	Total	
As of 31 December 2020, MW						2020	2019
Germany	598	666	3	432	–	1,698	1,706
United Kingdom	1,272	707	–	82	55	2,117	2,115
Netherlands	–	268	–	11	737	1,016	855
Poland	–	385	1	–	–	386	386
Spain	–	447	45	12	–	504	459
Italy	–	475	–	–	–	475	475
Sweden	48	116	–	–	–	164	164
USA	–	3,543	125	–	–	3,668	2,949
Rest of the world	–	10	47	65	–	122	71
RWE Group	**1,918**	**6,616**	**220**	**602**	**792**	**10,148**	**9,180**

1 The commercial rounding of certain figures can result in inaccurate sum totals.

Significant decline in CO_2 emissions. Last year, our power stations emitted 68.9 million metric tons of carbon dioxide. This was 19.2 million metric tons, or 22%, less than in 2019. The main reason for the drop was the substantial reduction in electricity generation from lignite and hard coal last year. We posted a decrease not only in our absolute but also our specific emissions, i. e. carbon dioxide per megawatt hour of electricity generated, which fell from 0.58 to 0.47 metric tons.

We need emission allowances for nearly all our carbon dioxide emissions. We normally purchase the certificates on the forward market. Western European countries allocate free emission allowances to energy companies only in exceptional cases. In the year being reviewed, we were only able to cover 1.1 million metric tons of carbon dioxide with such state allocations.

CO_2 emissions Million metric tons	2020	2019	+/–
Hydro / Biomass / Gas	21.2	26.3	– 5.1
of which:			
Germany[1]	3.5	3.3	0.2
United Kingdom	9.1	12.9	– 3.8
Netherlands	7.0	9.1	– 2.1
Turkey	1.6	1.0	0.6
Coal / Nuclear	47.7	61.8	– 14.1
RWE Group	**68.9**	**88.1**	**– 19.2**

1 Including CO_2 emissions of power stations not owned by RWE that we can deploy at our discretion on the basis of long-term use agreements. In 2020, these stations emitted a total of 1.1 million metric tons of CO_2 (previous year: 1.3 million metric tons).

51.4 million metric tons of lignite produced. Our generation companies procure the fuel they need either directly on the market or via RWE Supply & Trading, except for lignite, which we source from proprietary opencast mines. In our Rhenish mining area west of Cologne, we produced 51.4 million metric tons of lignite last year. This was 13.4 million metric tons less than in the preceding year, owing to the lower utilisation of our power plants. We used the lion's share, or 41.8 million metric tons, of lignite to generate electricity. The remainder was employed in the manufacture of refined products (e. g. lignite powder, hearth furnace coke and briquettes) and, to a limited extent, to generate process steam and district heat.

External sales volume: marginal gain for electricity; accounting effect reduces gas sales. Last year, we sold 194,465 GWh of electricity and 36,463 GWh of gas, compared to 191,973 GWh and 56,640 GWh in 2019. These transactions were largely effected by the Supply & Trading segment. We sold slightly more of our main product, electricity. Supply volumes at RWE Renewables rose considerably, but RWE Supply & Trading sold much less electricity from RWE power stations externally. Our gas deliveries decreased by 36 %. The main reason was that we started recording gas sales by RWE Supply & Trading in the Czech Republic as pure trading transactions on 1 July 2019, eliminating them from sales volume and revenue.

External revenue € million	2020	2019	+/–
Offshore Wind	332	85	247
Onshore Wind / Solar	1,855	1,265	590
Hydro / Biomass / Gas	1,056	1,200	– 144
Supply & Trading	9,597	9,554	43
Other	9	6	3
Core business	**12,849**	**12,110**	**739**
Coal / Nuclear	839	1,015	– 176
RWE Group (excluding natural gas tax / electricity tax)	**13,688**	**13,125**	**563**
Natural gas tax / electricity tax	208	152	56
RWE Group	**13,896**	**13,277**	**619**

External revenue slightly up on 2019. Our revenue from customers outside of the Group totalled €13,688 million (excluding natural gas tax and electricity tax), 4 % more than in the prior year. Our electricity revenue recorded an increase of 14 % to €11,701 million, clearly exceeding sales growth. Two effects came to bear here: we realised higher market prices for the electricity generation of our conventional power stations than in 2019 and we benefited from the shift in our production to electricity from renewables, for which we usually receive payments exceeding the market level. Conversely, our gas revenue dropped by 54 % to €534 million. The aforementioned change in the recognition of revenue in the Czech Republic was the main reason. In addition, lower gas prices came to bear.

External revenue by product[1] € million	2020	2019	+/–
Electricity revenue	**11,701**	**10,250**	**1,451**
of which:			
Offshore Wind	332	85	247
Onshore Wind / Solar	1,676	943	733
Hydro / Biomass / Gas	684	671	13
Supply & Trading	8,775	8,259	516
Other	1	1	–
Core business	**11,468**	**9,959**	**1,509**
Coal / Nuclear	233	291	–58
Gas revenue	**534**	**1,156**	**–622**
of which:			
Hydro / Biomass / Gas	5	22	–17
Supply & Trading	529	1,134	–605
Core business	**534**	**1,156**	**–622**
Other revenue	**1,453**	**1,719**	**–266**
RWE Group (excluding natural gas tax / electricity tax)	**13,688**	**13,125**	**563**

1 Some prior-year figures adjusted.

Sustainable investors are increasingly interested in the portion of total RWE Group revenue accounted for by coal-fired generation and other coal products. In the fiscal year that just ended, this share was 23 %.

Adjusted EBITDA € million	2020	2019	+/–
Offshore Wind	1,069	614	455
Onshore Wind / Solar	472	295	177
Hydro / Biomass / Gas	621	672	–51
Supply & Trading	539	731	–192
Other, consolidation	–25	–129	104
Core business	**2,676**	**2,183**	**493**
Coal / Nuclear	559	306	253
RWE Group	**3,235**	**2,489**	**746**

Adjusted EBITDA 30 % up year on year. Our adjusted earnings before interest, taxes, depreciation and amortisation (adjusted EBITDA) amounted to €3,235 million. We thus overachieved the March 2020 outlook we published on pages 94 et seq. of the 2019 Annual Report, which envisaged a range of €2,700 million to €3,000 million. Adjusted EBITDA from our core business, which we had projected to be between €2,150 million and €2,450 million, also clearly exceeded expectations, totalling €2,676 million. This was primarily due to energy trading, which recorded another very strong result following the exceptional performance in 2019. Adjusted EBITDA achieved by the RWE Group posted 30 % year-on-year growth. This was mainly because the operations transferred from E.ON to RWE in September 2019 were considered in the consolidated financial statements for a full twelve months for the first time. The increased utilisation of our wind farms also made a contribution to the rise in earnings.

The following developments were observed in the segments:

- Offshore Wind: Here, adjusted EBITDA totalled €1,069 million. Our guidance envisaged a figure between €900 million and €1,100 million. Compared to 2019, we posted an increase of 74 %. This was a result of the inclusion of E.ON's renewable energy business in our figures for a full year for the first time. Improved wind conditions also had a positive effect. They played a role in our closing the fiscal year at the upper end of the forecast range.

- Onshore Wind / Solar: Adjusted EBITDA recorded by this segment amounted to €472 million, falling short of the expected range of €500 million to €600 million. Corona-induced delays in commissioning new wind farms came to bear here. Therefore, these assets were unable to make the expected contribution to earnings in 2020. The negative effect of the corona crisis on electricity market prices also led to unplanned earnings shortfalls. This affected wind farms, the generation of which we cannot sell at firm conditions and which are therefore exposed to market risks. Relative to the previous year, adjusted EBITDA improved by 60 %, predominantly due to the first full-year inclusion of the renewable energy business we received from E.ON. In addition, we benefited from the commissioning of new generation capacity.

- Hydro / Biomass / Gas: In this segment, adjusted EBITDA came in at €621 million. We had forecast a figure between €550 million and €650 million. Earnings were down 8 % compared to 2019. One reason for this was lower income from participating in the British capacity market, which was suspended for about a year pursuant to a high court decision in November 2018. Following the resumption of capacity payments, earnings for 2019 included back payments for 2018. In the Netherlands, the economic situation of the Eemshaven power station deteriorated, whereas the Claus C gas-fired power plant made a stronger contribution to earnings after having been mothballed for several years. Our income from the commercial optimisation of power plant dispatch was lower than in 2019, but higher than planned. This was the main reason why the segment's adjusted EBITDA was at the upper end of the forecast range.

- Supply & Trading: Our performance in the trading business was much better than expected. Accordingly, at €539 million, adjusted segment EBITDA was clearly above the forecast range of €150 million to €350 million. Despite this, we were unable to match the earnings achieved in the previous year (€731 million) which benefited from an exceptionally strong trading performance. Our gas business also displayed very satisfactory development which, however, was not quite as good as in 2019.

- Coal / Nuclear: Adjusted EBITDA recorded here amounted to €559 million, which was within the anticipated range of €500 million to €600 million. This represents 83 % growth compared to the preceding year. The main reason for this was that we realised higher wholesale prices for electricity generated by our lignite-fired and nuclear power plants than in 2019. We had already sold forward nearly all of the production of these stations in earlier years. Another positive effect came from our acquisition in September 2019 of E.ON's minority interests in the Gundremmingen and Emsland nuclear power plants.

Adjusted EBIT € million	2020	2019	+/–
Offshore Wind	697	377	320
Onshore Wind / Solar	86	59	27
Hydro / Biomass / Gas	283	342	–59
Supply & Trading	496	691	–195
Other, consolidation	–25	–128	103
Core business	**1,537**	**1,341**	**196**
Coal / Nuclear	234	–74	308
RWE Group	**1,771**	**1,267**	**504**

Adjusted EBIT 40 % up on prior year. The RWE Group's adjusted EBIT rose by 40 % to €1,771 million, clearly exceeding the forecast range of €1,200 million to €1,500 million. This growth was driven by the same factors benefiting adjusted EBITDA. The difference between these two key figures is that operating depreciation and amortisation, which amounted to €1,464 million in 2020 compared to €1,222 million in the previous year, is considered in adjusted EBIT, but not in adjusted EBITDA.

Reconciliation to net income € million	2020	2019	+/–
Adjusted EBITDA	**3,235**	**2,489**	**746**
Operating depreciation, amortisation and impairment losses	–1,464	–1,222	–242
Adjusted EBIT	**1,771**	**1,267**	**504**
Non-operating result	–121	–1,081	960
Financial result	–454	–938	484
Income from continuing operations before taxes	**1,196**	**–752**	**1,948**
Taxes on income	–363	92	–455
Income from continuing operations	**833**	**–660**	**1,493**
Income from discontinued operations	221	9,816	–9,595
Income	**1,054**	**9,156**	**–8,102**
of which:			
Non-controlling interests	59	643	–584
RWE AG hybrid capital investors' interest	–	15	–15
Net income / income attributable to RWE AG shareholders	**995**	**8,498**	**–7,503**

Reconciliation to net income: exceptional effects overshadow operating development.
The reconciliation from adjusted EBIT to net income was greatly affected by one-off effects. Substantial income from the valuation of derivatives was counterbalanced by impairments of a similar order recognised for coal-fired power plants and opencast mines. Unlike in the preceding year, the positive exceptional effect of the asset swap with E.ON did not play a role in the reporting year: in 2019 the sale of innogy's grid and retail businesses and the stake in Czech gas network operator innogy Grid Holding (IGH) led to a deconsolidation gain of €8.3 billion. There was no similar effect in 2020. Accordingly, net income was significantly below the high level achieved in the prior year.

Non-operating result € million	2020	2019	+/–
Disposal result	13	48	–35
Effect on income from the valuation of derivatives and inventories	1,886	81	1,805
Other	–2,020	–1,210	–810
Non-operating result	**–121**	**–1,081**	**960**

The non-operating result, in which we recognise certain factors which are not related to operations or the period being reviewed, improved by €960 million to –€121 million in the past fiscal year. Its components were as follows:

- At €13 million, income from the disposal of investments and assets was immaterial (previous year: €48 million). It largely resulted from the sale of US wood pellet producer Georgia Biomass (see page 45).

- At €1,886 million, the effects of the valuation of derivatives and inventories on earnings were unusually high, after totalling €81 million in the preceding year. However, such effects are only temporary and are due in part to the fact that, pursuant to IFRS, financial instruments used to hedge price risks are accounted for at fair value at the corresponding balance-sheet date, whereas the hedged underlying transactions are only recognised as a profit or loss when they are realised.

- In the 'other' line item, we reported a loss of €2,020 million (previous year: €1,210 million). This was mainly caused by €1.8 billion in impairments recognised for power plants and opencast mines in reaction to the German coal phaseout and deteriorated market prospects. We completely wrote off our German Ibbenbüren B and Westfalen E hard coal-fired power stations, which won decommissioning remuneration contracts in an auction held by the German Network Agency. The compensation claim of €216 million obtained in the bidding process was also recognised with an effect on income. The impairments also related to our lignite business and our Dutch power stations.

Financial result € million	2020	2019	+/–
Interest income	283	185	98
of which: E.ON dividend	182	–	182
Interest expenses	–296	–258	–38
Net interest	**–13**	**–73**	**60**
Interest accretion to non-current provisions	–255	–881	626
of which: interest accretion to mining provisions	–186	–581	395
Other financial result	–186	16	–202
Financial result	**–454**	**–938**	**484**

Our financial result totalled – €454 million, exceeding the year-earlier figure by €484 million. Its components changed as follows:

- Net interest improved by €60 million to – €13 million because, for the first time, we received a dividend from the stake in E.ON we acquired in 2019, which currently amounts to 15 %. However, we also registered higher interest charges. This was in part due to the first full-year consideration of E.ON's renewable energy business, which caused us to recognise higher expenses for financing onshore wind farms in the USA. Moreover, there was a rise in costs incurred to hedge currencies for business activities outside of the Eurozone.

- The interest accretion to non-current provisions reduced income by €255 million. In the previous year, the decline was much more substantial (€881 million). In 2019, we significantly lowered the real discount rate applied when calculating our mining provisions. This led to an increase in the present value of the obligations, which was in part recognised as an expense in the interest accretion.

- The other financial result dropped by €202 million to – €186 million. We suffered losses on our portfolio of securities due to the turmoil on the capital markets caused by the coronavirus pandemic, having achieved gains in the previous year. In addition, unfavourable development of interest and currency exchange rates had a negative effect on income from financial transactions.

Before taxes, our continuing operations posted income of €1,196 million (previous year: – €752 million). Taxes on income amounted to €363 million, corresponding to an effective tax rate of 30 %. In light of RWE's tax gains, this is a fairly high number. The amortisation of deferred tax assets was the main reason for this. A counteracting effect on the tax rate stemmed from a reduction of our tax risk provision. After taxes, our continuing operations achieved income of €833 million (previous year: – €660 million).

Income from discontinued operations amounted to €221 million. It stemmed from the stake in Slovak energy utility VSE, which we acquired from innogy in 2019 and transferred to E.ON in August 2020 (see page 42). This figure includes the deconsolidation gain of €154 million. In the previous year, this item included the earnings from all of the discontinued innogy operations. We sold them in September 2019, except for VSE. The deconsolidation gain (€8,258 million) caused income from discontinued operations to be exceptionally high (€9,816 million).

Non-controlling interests in income declined by €584 million to €59 million. This was due to the sale of our stake in innogy (76.8 %) in September 2019. Since then, there has been no more income attributable to minority shareholders of the innogy Group.

The portion of earnings attributable to RWE hybrid capital investors was zero (previous year: €15 million). Our only hybrid bond classified as equity pursuant to IFRS was redeemed in March 2019. RWE's remaining hybrid capital is classified as debt, and the interest on it is recognised in the financial result.

The RWE Group's net income amounted to €995 million (previous year: €8,498 million). This resulted in earnings per share of €1.56 (previous year: €13.82). An average of 637.3 million RWE shares were outstanding in the reporting year. This figure was higher than in 2019 (614.7 million) due to the capital increase of August 2020.

Reconciliation to adjusted net income € million	Original figures	Adjustment	Adjusted figures
Adjusted EBIT	**1,771**	**–**	**1,771**
Non-operating result	–121	121	–
Financial result	–454	139	–315
Income from continuing operations before taxes	**1,196**	**260**	**1,456**
Taxes on income	–363	145	–218
Income from continuing operations	**833**	**405**	**1,238**
Income from discontinued operations	221	–221	–
Income	**1,054**	**184**	**1,238**
of which:			
Non-controlling interests	59	–34	25
Net income / income attributable to RWE AG shareholders	**995**	**218**	**1,213**

Adjusted net income higher than expected. Adjusted net income amounted to €1,213 million. Due to the unexpectedly positive operating earnings, it exceeded the guided range of €850 million to €1,150 million. We calculate adjusted net income by deducting from net income according to IFRS the non-operating result, income from discontinued operations as well as major special items in the financial result and in income attributable to other shareholders. Instead of the actual tax rate, we use a rate of 15 %, in line with the average tax burden expected in coming years. We did not state adjusted net income for 2019 because this figure would have been of limited informational value due to the significant one-off effects of the asset swap with E.ON.

Capital expenditure on property, plant and equipment and on intangible assets[1] € million	2020	2019	+/–
Offshore Wind	756	492	264
Onshore Wind / Solar	1,154	752	402
Hydro / Biomass / Gas	153	212	–59
Supply & Trading	43	29	14
Other, consolidation	–	–3	3
Core business	**2,106**	**1,482**	**624**
Coal / Nuclear	183	281	–98
RWE Group[2]	**2,285**	**1,767**	**518**

1 Table only shows cash investments. Prior-year figures restated accordingly.
2 Including a – €4 million (2020) and €4 million (2019) consolidation effect between the core business and the Coal / Nuclear segment.

Capital expenditure on financial assets[1] € million	2020	2019	+/–
Offshore Wind	520	–	520
Onshore Wind / Solar	408	46	362
Hydro / Biomass / Gas	115	2	113
Supply & Trading	18	68	–50
Other, consolidation	11	–112	123
Core business	**1,072**	**4**	**1,068**
Coal / Nuclear	1	–	1
RWE Group	**1,073**	**4**	**1,069**

1 Table only shows cash investments. Prior-year figures restated accordingly.

Capital expenditure substantially up on 2019. In fiscal 2020, capital expenditure amounted to €3,358 million, surpassing the year-earlier level (€1,771 million) by 90%. Unlike in the past, we now only focus on capital expenditure with an effect on cash in our financial reporting. About 85% of the funds were used in the Offshore Wind and Onshore Wind / Solar segments.

Compared to 2019, our spending on property, plant and equipment and intangible assets rose by 29% to €2,285 million. This was mainly due to the first full-year inclusion of capital expenditure in the renewable energy business received from E.ON. Last year, a substantial portion of the funds was used to build the Triton Knoll and Kaskasi wind farms in the North Sea as well as several major US onshore wind farms. Our capital spending on financial assets, which was immaterial in 2019, totalled €1,073 million in the year under review. Major expenditure items were the 20% stake we will take in the Rampion offshore wind farm in the UK, the acquisition of Nordex's European development business, and the purchase of the 382 MW King's Lynn gas-fired power station in the east of England. We have provided detailed information on these transactions on pages 42 et seqq.

Headcount marginally down year on year. As of 31 December 2020, the RWE Group had 19,498 people on its payroll, of which 14,701 were employed in Germany and 4,797 worked abroad. Part-time positions were considered in these numbers on a pro-rata basis. Personnel figures were down slightly compared to the end of 2019 (– 294). We recorded the biggest decline in the Coal / Nuclear segment, where headcount decreased by 379, to a certain extent due to partial retirement programmes. By contrast, the workforce in our core business grew by 85. Major contributing factors were the construction of the UK North Sea wind farm Triton Knoll and the acquisition of Nordex's European development business. In addition, we need more employees to continue developing the Group's IT infrastructure. This led to new hires, above all in the Supply & Trading segment. A counteracting effect came from sales of operations by our subsidiary Belectric, which specialises in developing solar farms and energy storage systems. Staff figures do not include apprentices or trainees. At the end of 2020, 750 young adults were learning a profession at RWE, compared to 701 in the previous year.

Workforce[1]	31 Dec 2020	31 Dec 2019	+/–
Offshore Wind	1,119	1,016	103
Onshore Wind / Solar	2,402	2,462	– 60
Hydro / Biomass / Gas	2,667	2,893	– 226
Supply & Trading	1,790	1,633	157
Other[2]	425	314	111
Core business	**8,403**	**8,318**	**85**
Coal / Nuclear	11,095	11.474	– 379
RWE Group	**19,498**	**19,792**	**– 294**

1 Converted to full-time positions.
2 This item exclusively comprises employees of the holding company RWE AG.

2.6 Financial position and net worth

Our financial position and net worth continued to improve in the fiscal year that just ended. The main drivers were a significant increase in cash flows from operating activities and the capital increase conducted in August 2020. Our net debt dropped to €4.4 billion despite the substantial amount of capital spent on renewable energy. By the end of the year, it was just 1.7 times higher than adjusted EBITDA of the core business. As a result, we remained well below the self-imposed upper limit of 3.0. The equity ratio also displayed positive development, rising by 1.8 percentage points to 29.1 %.

Responsibility for procuring funds. Responsibility for Group financing is pooled at RWE AG. As the parent company, RWE AG is responsible for acquiring funds from banks or the financial markets. Subsidiaries only raise debt capital directly in specific cases, for example if it is advantageous economically to make use of local credit and capital markets. RWE AG also acts as a co-ordinator when subsidiaries assume contingent liabilities. This allows us to manage and monitor financial risks centrally. Moreover, it strengthens our position when negotiating with banks, business partners, suppliers and customers.

Tools for raising debt capital. We cover a major portion of our financing needs with earnings from our operating activities. In addition, we have a wide range of tools to procure debt capital.

- Our Debt Issuance Programme (DIP) gives us latitude in raising debt capital for the long term. Our current DIP allows us to issue bonds with a total face value of €10 billion. However, RWE AG has not made any such issuances since 2015.
- We have a Commercial Paper Programme for short-term refinancing, which was updated last year. It enables us to raise funds equivalent to up to €5 billion on the money market (before update: US$5 billion). We only made moderate use of these funds in the past fiscal year. At times, a total of up to €1.2 billion in commercial paper was outstanding.
- Furthermore, we have access to a €5 billion syndicated credit line, which serves to secure liquidity. It was granted to us by a consortium of 27 international banks and consists of two tranches: one of €3 billion, which expires in April 2025, and one of €2 billion, which we have been granted through to April 2021. Each tranche can be extended for a year. We require the banks' approval for this with regard to the first tranche, but not for the second one. So far, RWE has not used the syndicated credit line.

Bond volume drops to €0.6 billion. RWE bonds with a total face value of €0.6 billion were outstanding at the end of 2020. Essentially, these were two hybrid bonds: one of €282 million with a 3.5 % coupon and one of US$317 million with a 6.625 % coupon. Due to early buybacks in October 2017, the outstanding amounts are below the issuance volumes of €550 million and US$500 million. The bonds' earliest redemption dates are in April 2025 and March 2026. A third hybrid bond with a volume of €539 million and a coupon of 2.75 % was redeemed at the first call date, in October 2020, without being replaced with new hybrid capital. It had an original face value of €700 million and was reduced by €161 million through bond buybacks in 2017.

Borrowing costs rise to 2.3 %. In 2020, the cost of debt for RWE was 2.3 %. It was calculated for our average liabilities from bonds, commercial paper and bank loans held during the year. The cost of debt was slightly higher than in the preceding year (1.4 %). This was because we refinanced our business to a lesser extent via commercial paper. The interest rates of these bonds are relatively low due to their short maturities. In the reporting year, we had less need for debt financing than in 2019, in part due to the capital increase conducted in August, which resulted in proceeds of €2.0 billion (see page 42).

Solid investment grade rating. The level of our borrowing costs partially depends on rating agencies' assessment of our creditworthiness. Moody's and Fitch make such evaluations on request from us. They both give us a credit rating of investment grade. The agency gives our long-term creditworthiness a rating of 'Baa3', which was confirmed in March 2020 after an extensive review. In addition, Moody's offered the prospect of an upgrade by raising the outlook on our rating from 'stable' to 'positive'. It explained this step by citing RWE's improved risk profile resulting from our transformation to a leading renewable energy company. Fitch rates us one grade better than Moody's: 'BBB', with a stable outlook.

Credit rating of RWE AG (as of 31 Dec 2020)	Moody's	Fitch
Non-current financial liabilities		
Senior debt	Baa3	BBB
Subordinated debt (hybrid bonds)	Ba2	BB+
Current financial liabilities	P-3	F2
Outlook	Positive	Stable

Cash flow statement[1] € million	2020	2019	+/–
Funds from operations	4,138	1,809	2,329
Change in working capital	–13	–2,786	2,773
Cash flows from operating activities of continuing operations	**4,125**	**–977**	**5,102**
Cash flows from investing activities of continuing operations	**–4,278**	**474**	**–4,752**
Cash flows from financing activities of continuing operations	**1,769**	**189**	**1,580**
Effects of changes in foreign exchange rates and other changes in value on cash and cash equivalents	–34	13	–47
Total net changes in cash and cash equivalents	**1,582**	**–301**	**1,883**
Cash flows from operating activities of continuing operations	4,125	–977	5,102
Minus capital expenditure	–3,358	–1,771	–1,587
Plus proceeds from divestitures / asset disposals	365	695	–330
Free cash flow	**1,132**	**–2,053**	**3,185**

1 All items relate solely to continuing operations.

Significantly improved operating cash flows of €4.1 billion. We generated cash flows of €4,125 million from the operating activities of our continuing operations, compared to –€977 million in the previous year. The substantial improvement was in part due to the positive development of the operating result. Added to this were effects that were reflected in the change in working capital. For example, commodity forward transactions led to substantial cash outflows in the prior year. Conversely, we achieved considerable income from such transactions in 2020.

Investing activities of continuing operations led to a cash outflow of €4,278 million. This was predominantly due to €3,358 million in capital expenditure on property, plant and equipment, which was contrasted by €365 million in proceeds from divestments. Furthermore, we made substantial purchases of securities, primarily to invest the proceeds from the capital increase temporarily. Conversely, in the previous year, we registered significant income from the sale of securities. This was one of the reasons why we received €474 million in net cash inflows from investing activities in 2019.

At €1,769 million, our cash flows from financing activities of continuing operations were much higher than the year-earlier figure (€189 million). This reflected the capital increase conducted in August, from which we received proceeds of €1,990 million. Furthermore, in the reporting year we issued slightly more financial debt than we repaid, leading to a net cash inflow of €61 million. Our dividend payments to RWE shareholders (€492 million) and minority shareholders (€30 million) had an opposite effect.

On balance, the aforementioned cash flows from operating, investing and financing activities increased our cash and cash equivalents by €1,582 million.

Cash flows from operating activities, minus capital expenditure on property, plant and equipment and intangible assets, plus proceeds from divestments and asset disposals results in free cash flow. In the year under review, free cash flow amounted to €1,132 million, clearly exceeding the negative figure recorded in the prior year (– €2,053 million). The main reason for this was the significant increase in cash inflows from operating activities.

Net debt[1] € million	31 Dec 2020	31 Dec 2019	+/–
Cash and cash equivalents	4,774	3,192	1,582
Marketable securities	4,517	3,523	994
Other financial assets	2,507	2,383	124
Financial assets	**11,798**	**9,098**	**2,700**
Bonds, other notes payable, bank debt, commercial paper	2,160	2,466	–306
Hedging of bond currency risk	31	7	24
Other financial liabilities	3,038	3,147	–109
Financial liabilities	**5,229**	**5,620**	**–391**
Minus 50 % of the hybrid capital recognised as debt	–278	–562	284
Net financial assets (including correction of hybrid capital)	**6,847**	**4,040**	**2,807**
Provisions for pensions and similar obligations	3,864	3,446	418
Surplus of plan assets over benefit obligations	–172	–153	–19
Provisions for nuclear waste management	6,451	6,723	–272
Provisions for dismantling wind farms	1,136	951	185
Net debt of continuing operations	**4,432**	**6,927**	**–2,495**
Net debt of discontinued operations	**–**	**232**	**–232**
Net debt	**4,432**	**7,159**	**–2,727**

1 New definition of net debt (see commentary on the next page); prior-year figures changed due to retroactive adjustments to the first-time consolidation of the renewable energy business acquired from E.ON in 2019.

Net debt drops to €4.4 billion. As of 31 December 2020, our net debt totalled €4,432 million. It was completely attributable to our continuing operations as we sold the stake in VSE stated as a discontinued operation in August 2020 (see page 42). We redefined net debt in 2020. It no longer contains our mining provisions, which essentially cover our obligations to recultivate opencast mining areas. The assets we use to cover these provisions are also disregarded, for instance our €2.6 billion claim for damages from the German lignite phaseout against the state. We have also presented net debt for 2019 based on the new definition for the sake of comparability.

Our net debt declined by €2,727 million compared to 31 December 2019. The main drivers were the capital increase in August, the positive free cash flow, and the deconsolidation of VSE's net debt. Profit distributions had a counteracting effect. Moreover, we registered a slight increase in provisions for pensions because the discount rates we apply when determining the net present value of the pension obligations recorded a market-induced decline. Increases in the value of plan assets, which we hold to meet the obligations, were unable to offset this. The redemption of a €539 million hybrid bond also had a debt-increasing effect. The reason for this is that in determining net debt, we classify half of the hybrid capital as equity.

Leverage factor clearly below upper limit of 3.0. One of our key management parameters is the ratio of net debt to adjusted EBITDA of the core business, also referred to as the leverage factor. This key figure is more indicative than total liabilities because it also reflects earning power and therefore our ability to meet our debt obligations. We set the upper limit for the leverage factor at 3.0 in order to secure our financial flexibility. At 1.7, we remained clearly below this threshold in the year being reviewed. Even excluding the funds from the capital increase, we would have stayed within the upper limit: the leverage factor would have been 2.4.

Drop in off-balance-sheet fuel purchase obligations. Net debt does not include our off-balance-sheet obligations, which largely stem from long-term fuel and electricity purchase agreements. As of the balance-sheet date, payment obligations from material fuel procurement contracts amounted to €23.6 billion as opposed to €27.1 billion at the end of the previous year. For power purchase agreements, they totalled €7.1 billion, on a par with 2019. These figures are based on assumptions regarding the prospective development of commodity prices. For further commentary on our off-balance-sheet obligations, please see pages 181 et seq. in the Notes.

Group balance sheet: equity ratio rises to 29.1 %. The balance-sheet total reported in the 2020 consolidated financial statements amounted to €61.7 billion as opposed to €64.0 billion in the previous year. Significant declines were recorded by other receivables and other assets (– €2.8 billion) and other liabilities (– €2.5 billion): both line items were affected by a decrease in derivatives on our books. A drop was also registered by property, plant and equipment (– €1.1 billion), with impairments recognised for power plants and opencast mines playing a central role, as reported on page 55. By contrast, we posted an increase in cash and cash equivalents (+ €1.6 billion) and marketable securities (+ €1.0 billion). The capital increase in August 2020 was a major factor. It was also the main reason why equity rose by €0.5 billion to €18.0 billion. The share of the balance-sheet total accounted for by equity (the equity ratio) was 29.1 %. This is 1.8 percentage points more than in 2019.

The Group's 2020 balance sheet recognises the Stella, Cranell, Raymond East and Raymond West US wind farms as 'assets held for sale' and 'liabilities held for sale' because we will deconsolidate these assets due to the divestments presented on page 43. In the prior year's financial statements, the stake in the Slovak power utility VSE, which we sold in August 2020, was stated in these items.

Financial position and net worth

Group balance sheet structure[1]	31 Dec 2020		31 Dec 2019	
	€ million	%	€ million	%
Assets				
Non-current assets	34,461	55.9	35,768	55.9
of which:				
Intangible assets	4,913	8.0	4,777	7.5
Property, plant and equipment	17,902	29.0	19,016	29.7
Current assets	27,207	44.1	28,241	44.1
of which:				
Trade accounts receivable	3,007	4.9	3,621	5.7
Receivables and other assets	12,530	20.3	15,311	23.9
Marketable securities	4,219	6.8	3,258	5.1
Assets held for sale	1,045	1.7	1,274	2.0
Total	**61,668**	**100.0**	**64,009**	**100.0**

	31 Dec 2020		31 Dec 2019	
	€ million	%	€ million	%
Equity and liabilities				
Equity	17,971	29.1	17,467	27.3
Non-current liabilities	27,280	44.2	26,937	42.1
of which:				
Provisions	19,470	31.6	18,937	29.6
Financial liabilities	3,951	6.4	3,924	6.1
Current liabilities	16,417	26.7	19,605	30.6
of which:				
Provisions	3,004	4.9	2,638	4.1
Financial liabilities	1,247	2.0	1,689	2.6
Trade accounts payable	2,387	3.9	2,987	4.7
Other liabilities	9,240	15.0	11,781	18.4
Liabilities held for sale	539	0.9	510	0.8
Total	**61,668**	**100.0**	**64,009**	**100.0**

1 Prior-year figures changed due to retroactive adjustments to the first-time consolidation of the renewable energy business acquired from E.ON in 2019.

2.7 Notes to the financial statements of RWE AG (holding company)

The financial statements of RWE AG primarily reflect the business performance of its subsidiaries. In sum, the profit transfers of these companies recorded a slight increase in 2020. The good earnings produced by the renewable energy business played a role, whereas RWE Supply & Trading contributed less to the bottom line than in 2019 despite a strong trading performance. At €580 million, RWE AG's net profit was higher than in the previous year. We intend to raise the dividend and therefore propose a payment of €0.85 per share to the Annual General Meeting taking place in April 2021.

Financial statements. RWE AG prepares its financial statements in compliance with the rules set out in the German Commercial Code and the German Stock Corporation Act. The financial statements are submitted to Bundesanzeiger Verlag GmbH, located in Cologne, Germany, which publishes them in the Federal Gazette. They are available on the internet at www.rwe.com/en/financial-reports.

Income statement of RWE AG (abridged) € million	2020	2019
Income from financial assets	1,114	1,758
Net interest	-72	31
Other income and expenses	-712	-1,550
Taxes on income	250	275
Net profit	**580**	**514**
Transfer to other retained earnings	-5	-22
Distributable profit	**575**	**492**

Balance sheet of RWE AG (abridged) € million	31 Dec 2020	31 Dec 2019
Assets		
Financial assets	20,524	20,628
Accounts receivable from affiliated companies	2,094	10,233
Other accounts receivable and other assets	519	6,056
Marketable securities and cash and cash equivalents	6,664	2,929
Total assets	**29,801**	**39,846**
Equity and liabilities		
Equity	7,826	5,738
Provisions	1,996	2,237
Accounts payable to affiliated companies	18,905	29,213
Other liabilities	1,074	2,658
Total equity and liabilities	**29,801**	**39,846**

Assets. RWE AG had €29.8 billion in total assets as of 31 December 2020, compared to €39.8 billion in the previous year. We registered a significant decline in accounts receivable from and payable to affiliated companies. This was the result of the merger of two subsidiaries. A substantial account receivable from one of them and a significant account payable to the other resulted from the asset swap with E.ON (see page 68 of the 2019 Annual Report). The merger caused the two items to net each other out. Other receivables also declined considerably. This is because E.ON transferred parts of the innogy business back to RWE in legal terms in mid-2020, eliminating the associated claims we had against E.ON. The increase in the marketable securities and cash and cash equivalents on our books

had a counteracting effect on the total assets. The capital increase we conducted in August, which led to proceeds of €2.0 billion, came to bear here. In addition, RWE AG subsidiaries generated higher operating cash flows, which they transferred to the Group parent. Therefore, RWE AG's equity rose to €7.8 billion (previous year: €5.7 billion). The equity ratio increased from 14.4 % to 26.3 %.

Financial position. RWE AG is set up solidly in economic terms and has a number of financing tools at its disposal that it can use flexibly. This is reflected in our credit ratings, which are investment grade. A detailed presentation of RWE's financial position and financing activity in the year under review can be found on pages 59 et seqq.

Earnings position. RWE AG's earnings position improved slightly compared to 2019. The main items on the income statement developed as follows:

- Income from financial assets dropped by €644 million to €1,114 million. This was due to lower income from investments and write-downs of financial assets. By contrast, profit transfers from subsidiaries were slightly up year on year in part due to the increase in income at RWE Renewables and the first dividend we received from our 15 % stake in E.ON held by a subsidiary of RWE AG. A counteracting effect resulted from RWE Supply & Trading closing the reporting year with income down on the previous one despite a very good trading performance.

- Net interest deteriorated by €103 million to – €72 million. This was mainly due to a decline in capital gains from the management of fund assets used to cover our pension obligations.

- The 'other income and expenses' line item improved by €838 million to – €712 million. This is because a substantial impairment was recognised for financial accounts receivable from a Dutch subsidiary in 2019 as the framework conditions for electricity generation from hard coal had become less favourable. The remainder was written off in 2020, but the burden on earnings was much smaller than in the preceding year. Conversely, there was a slight increase in expenses for IT projects at RWE AG.

- In the year under review, we recorded tax income of €250 million (previous year: €275 million), largely because we reduced our tax risk provision.

- The presented earnings figures led to net profit of €580 million. This represents an increase of €66 million compared to 2019.

- The distributable profit of €575 million corresponds to the planned payment of a dividend of €0.85 per share to our shareholders.

Outlook for 2021. RWE AG's earnings prospects will largely depend on the business performance of its subsidiaries. Our current assessment makes us confident of being able to achieve a net profit in 2021 that is slightly higher than in 2020.

Corporate governance declaration in accordance with Section 289f and Section 315d of the German Commercial Code. On 15 February 2021, the Executive Board and the Supervisory Board of RWE AG issued a corporate governance declaration in accordance with Section 289f and Section 315d of the German Commercial Code. The declaration contains the Corporate Governance Report and has been published at www.rwe.com/corporate-governance-declaration.

2.8 Outlook

We expect to maintain our good earnings position in 2021. However, we will probably close the year significantly down on the previous one in our core business. In February, extreme weather conditions in Texas brought several wind farms to a standstill and led to substantial losses due to power purchases. Furthermore, we do not anticipate income from energy trading to be as high as in 2020. Outside of our core business, we will benefit from higher margins of our lignite and nuclear power stations. In sum, we expect the Group to post adjusted EBITDA of between €2,650 million and €3,050 million. In light of the favourable medium and long-term earnings prospects of our core business, the Executive Board of RWE AG aims for a slightly increased dividend of €0.90 for fiscal 2021.

Experts predict strong economic recovery. Despite extended lockdown measures and the slow progress in controlling the coronavirus pandemic, most economic research institutes expect the economy to record a significant recovery in 2021. Current forecasts have the average rise in global economic output amounting to 5 %. Estimates for the Eurozone are of a similar order. Based on expert opinions, Germany and the Netherlands may well post a gain of about 4 %. UK prospects partially depend on whether the country can maintain its close economic ties with the EU after Brexit. If so, a 5 % rise in GDP should be feasible in the United Kingdom. Growth of approximately 4 % has been forecast for the USA.

Power consumption expected to rise. Our expectations regarding this year's electricity usage are based on the above economic outlooks. A significant resurgence of the economy will lead to increased demand for electricity. However, energy savings are expected to have a dampening effect. We currently anticipate demand for electricity in RWE's core markets Germany, the Netherlands, the United Kingdom and the USA to be 2 % to 4 % up on 2020 levels.

Electricity production for 2021 largely sold forward. The future development of electricity prices will depend on a number of factors that are nearly impossible to predict. At any rate, this would only have a limited impact on this year's power plant margins as we have sold forward most of our electricity generation for 2021 and secured the prices of the required fuel and emissions allowances. These transactions have been concluded up to three years forward. Therefore, the realised electricity prices can differ significantly from the current market quotations. We sold forward the electricity produced by our German lignite-fired and nuclear power stations with long lead times. In doing so, we realised higher prices for 2021 than for 2020.

Changed recognition of tax benefits in the USA. As of the start of fiscal 2021, we changed the accounting treatment of tax benefits we receive for US wind and solar projects. As set out on page 37, renewable energy is subsidised via tax credits in the USA. Furthermore, plant operators can benefit from accelerated depreciation, referred to as tax benefits. We previously recognised them in taxes on income. By contrast, we consider the benefits of tax credits in other operating income. For the sake of consistency, we will take this approach to tax benefits as well. This drives up adjusted EBITDA. To ensure comparability, we will restate the figures for 2020 accordingly in our financial reporting for fiscal 2021.

Forecast € million	2020 actual[1]	Outlook for 2021
Adjusted EBITDA	3,287	2,650–3,050
of which:		
Core business	2,728	1,800–2,200
of which:		
Offshore Wind	1,069	1,050–1,250
Onshore Wind / Solar	524	50–250
Hydro / Biomass / Gas	621	500–600
Supply & Trading	539	150–350
Coal / Nuclear	559	800–900
Adjusted EBIT	1,823	1,150–1,550
Adjusted net income	1,257	750–1,100

1 Some figures restated due to a change in the recognition of tax benefits in the USA (see commentary on the previous page).

2021 adjusted EBITDA forecast of €2,650 million to €3,050 million. We expect to maintain our good earnings position in 2021. However, we will probably close the year down on 2020 in part owing to losses in the Onshore Wind / Solar segment caused by the extreme weather in Texas at the beginning of the year. In addition, we anticipate a decline in earnings from energy trading after the very strong performance in 2020. This will be contrasted by improved margins on electricity forward sales from which we will benefit outside of the core business in the Coal / Nuclear segment. The RWE Group anticipates adjusted EBITDA for 2021 to total between €2,650 million and €3,050 million. Last year's figure including tax benefits stood at €3,287 million. We forecast the adjusted EBITDA of our core business to total between €1,800 million and €2,200 million (last year: 2,728 million). With expected operating depreciation and amortisation of about €1,500 million, the Group's adjusted EBIT should be within the range of €1,150 million to €1,550 million (last year: €1,823 million). We anticipate adjusted net income, which excludes material special items, of €750 million to €1,100 million compared to €1,257 million last year (see page 57 for a definition of this key figure).

Our outlook broken down by segment is as follows:

- Offshore Wind: Here, adjusted EBITDA is expected to total between €1,050 million and €1,250 million (last year: €1,069 million). The commissioning of the first turbines of the Triton Knoll wind farm in 2021 will have a positive effect. In addition, we anticipate being able to fully consolidate the Rampion UK offshore wind farm during the year. As mentioned on page 42, we agreed with E.ON that we would increase our stake in the wind farm by 20 % to 50.1 %. However, new project developments will likely result in added costs. Moreover, if wind conditions normalise, utilisation of our UK offshore wind farms is expected to drop.

- Onshore Wind / Solar: Adjusted EBITDA posted by this segment will probably total between €50 million and €250 million, closing down on last year's level, which amounted to €524 million including tax benefits. This is primarily due to the impact on earnings of the state of emergency caused by the weather in February in the USA. As set out on page 46, production outages caused by winter storms and icy rain required us to make short-term electricity purchases at extremely high prices. The resulting losses total a low to medium triple-digit million euro amount. We expect the commissioning of new wind and solar farms to have a positive impact on earnings. Furthermore, the sale of stakes in the Stella, Cranell, Raymond East and Raymond West onshore wind farms will lead to a capital gain. This will be contrasted by higher expenses incurred to develop growth projects.

- Hydro / Biomass / Gas: We expect this segment to achieve adjusted EBITDA of €500 million to €600 million for fiscal 2021. Compared to last year's figure (€621 million) this represents a decline. One of the reasons is that income from the commercial optimisation of power plant dispatch will probably be below the high level registered in 2020. Moreover, we will not benefit from the contribution to earnings previously made by wood pellet manufacturer Georgia Biomass, which we sold in July 2020. However, the curtailment of earnings last year from fire damage to the Eemshaven power station will not recur.

- Supply & Trading: In the long run, we anticipate annual average adjusted EBITDA here to be in the order of €250 million. We expect a figure in the range of €150 million to €350 million for 2021. This would be much lower than the very high earnings posted last year (€539 million).

- Coal / Nuclear: Adjusted EBITDA in this segment is expected to total between €800 million and €900 million (last year: €559 million). The significant year-on-year growth will result from higher margins on forward sales of our electricity generation. However, we anticipate additional costs from the implementation of the German coal phaseout.

Capital expenditure on property, plant and equipment markedly up on previous year. Capital expenditure on property, plant and equipment and intangible assets is estimated to be much higher than in 2020 (€2,285 million). A substantial amount of funds will be spent on the construction of the offshore wind farms Triton Knoll in the UK North Sea and Kaskasi near Heligoland, Germany. In addition, if we reach a positive investment decision on Sofia, we will start building the wind farm off the coast of east England. Other focal points of investment are onshore wind and solar projects in the USA and Europe. We plan to spend €200 million to €300 million outside of the core business in the Coal / Nuclear segment. These funds will primarily be used to maintain our power plants and opencast mines.

Net debt not to exceed three times adjusted EBITDA. One of our key management parameters is the ratio of net debt to adjusted EBITDA of the core business, also referred to as the leverage factor. This key figure is more indicative than total liabilities because it also reflects earning power and therefore our ability to meet our debt obligations. We set the upper limit for the leverage factor at 3.0, which we intend to comply with over the long term. We expect to be able to satisfy this requirement for fiscal 2021. However, the leverage factor may well be higher than in 2020.

Dividend for fiscal 2021. The Executive Board aims to pay a dividend of €0.90 per share for fiscal 2021. This represents an increase of €0.05 relative to the dividend proposal for 2020. The reason for the planned increase are the bright medium and long-term earnings prospects of our core business.

2.9 Development of risks and opportunities

RWE's risk exposure has improved steadily over the last few years. The main driver is our transformation into a leading provider of electricity from renewables. The high share of regulated income in this business makes us more profitable as well as more crisis-resistant. Furthermore, we benefit from the fact that the German coal phaseout has finally been given a firm legal framework, which gives us planning certainty in our lignite business. Despite the coronavirus pandemic, we classify our current risks no higher than 'medium'. We assess and manage our risks using our proven risk management system, which we present in detail in this chapter.

Distribution of risk management tasks at RWE. Responsibility for Group risk management lies with the parent company RWE AG. Its Executive Board monitors and manages the Group's overall risk. In addition, it determines the general risk appetite of RWE and defines upper limits for single risk positions. At the level below the Executive Board, the Controlling & Risk Management Department has the task of applying and constantly refining the risk management system. It derives detailed limits for the individual business fields and operating units from the risk caps set by the Executive Board. Its tasks also include checking the identified risks for completeness and plausibility and aggregating them. In so doing, it receives support from the Risk Management Committee, which is composed of the heads of the following five RWE AG departments: Controlling & Risk Management (Chair), Finance & Credit Risk, Accounting, Legal & Insurance, and Corporate Business Development. The Controlling & Risk Management Department provides the Executive Board and the Supervisory Board of RWE AG with regular reports on the company's risk exposure.

A number of additional organisational units and committees have been entrusted with risk management tasks:

- Financial risks and credit risks are managed by the Finance & Credit Risk Department of RWE AG.
- The Accounting Department ensures that financial reporting is free of material misstatements. It has an accounting-related internal control system for this purpose. A committee consisting of officers from Accounting and other departments of relevance to accounting assists in securing the quality of financial reporting. More detailed information can be found on page 78.
- The Internal Audit & Compliance Department monitors compliance with RWE's Code of Conduct. Its primary objective is to prevent corruption. It reports to the CEO of RWE AG or, if members of the Executive Board are affected, directly to the Chair of the Supervisory Board and the Chair of the Audit Committee.
- Risks from changes in commodity prices are monitored by RWE Supply & Trading in so far as they relate to the conventional electricity generation, energy trading and gas businesses. Where these risks relate to the renewable energy business, they are managed by RWE Renewables.
- Strategies to limit market risks in conventional electricity generation must be approved by the Commodity Management Committee. This expert panel consists of the CFO of RWE AG, members of the Board of Directors of RWE Supply & Trading and a representative of the Controlling & Risk Management Department.

- We also have a committee tasked with mitigating market risks associated with the renewable energy business. The Renewables Commodity Management Committee consists of the CFO of RWE AG, members of the management of RWE Renewables and a representative of the Controlling & Risk Management Department.

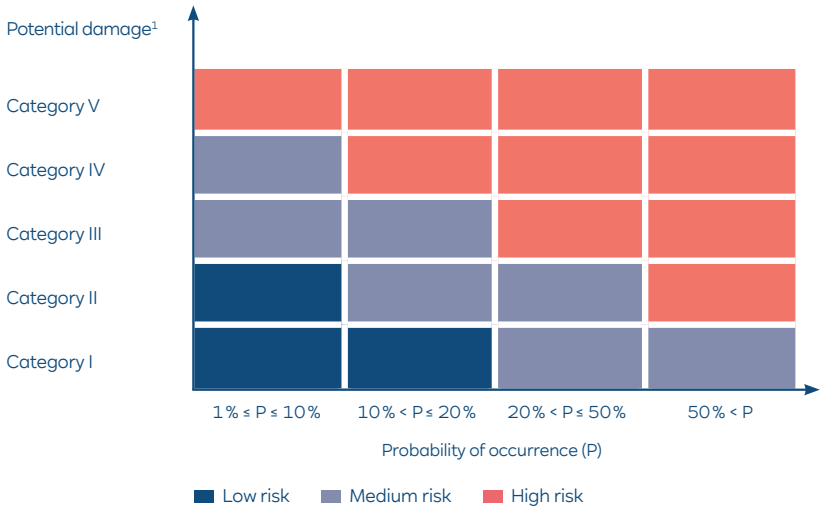
- The strategic guidelines for the management of financial assets (including the funds held by RWE Pensionstreuhand e. V.) are determined by the Asset Management Committee. The following individuals belong to it: the CFO of RWE AG, the Managing Director in charge of finance at RWE Supply & Trading, the heads of the following departments: Finance & Credit Risk, Investor Relations, Portfolio Management / Mergers & Acquisitions and – from the last department in the list – the head of Financial Asset Management.

Under the expert management of the aforementioned organisational units, RWE AG and its operating subsidiaries are responsible for identifying risks early, assessing them correctly and managing them in compliance with corporate standards. Internal Audit regularly assesses the quality and functionality of our risk management system. Last year, our internal audit system was reviewed by an external auditor in accordance with the IDW PS 983 standard and certified to the standard.

Risk identification and assessment. Risks and opportunities are defined as negative or positive deviations from expected figures. Their management is an integral and continuous part of operating processes. We assess risks every six months, using a bottom-up analysis. We also monitor risk exposure between the regular survey dates. The Executive Board of RWE AG is immediately notified of any material changes. Our executive and supervisory bodies are updated on the Group's risks once a quarter.

Our risk analysis normally covers the three-year horizon of our medium-term plan, but can extend beyond that in individual cases. We measure the potential damage based on the possible effects on net income, net debt and equity. In doing so, we take hedges into account. We define the potential damage as the deviation from the budgeted figure in question, aggregated over the three-year planning horizon.

RWE AG risk matrix



Potential damage[1] € million	**Earnings risks** Potential impact on net income (X)	**Indebtedness / equity risks** Potential impact on net debt and equity (Y)
Category V	8,000 ≤ X	8,000 ≤ Y
Category IV	1,500 ≤ X < 8,000	4,000 ≤ Y < 8,000
Category III	600 ≤ X < 1,500	2,000 ≤ Y < 4,000
Category II	300 ≤ X < 600	1,000 ≤ Y < 2,000
Category I	X < 300	Y < 1,000

1 Aggregated over the three-year medium-term plan (2021 to 2023).

We display the material risks using a matrix (see chart on the preceding page) in which they are categorised by potential damage and probability of occurrence. Risks that share the same cause are aggregated to a single risk if possible. To clearly assign them to the matrix fields, we have established thresholds for net income, net debt and equity, which are oriented towards the RWE Group's ability to bear risks. They are presented in the table below the matrix. Depending on their position in the matrix, we distinguish between low, medium and high risks. Based on this systematic risk identification, we determine whether there is a need for action and initiate measures to mitigate the risks if necessary.

Main risks for the RWE Group. Depending on their causes, our risks can be classified into seven classes, which are shown in the table on the right. The highest individual risk determines the classification of the risk of the entire risk class. The highest classification of our risks is currently 'medium'. By contrast, in the previous year, we had identified a high regulatory risk because of the uncertainty regarding the conditions of the German coal phaseout. The Coal Phaseout Act passed in mid-2020 and the public law contract between the government and the affected lignite companies have created a clear legal framework. However, the legally mandated compensation for the early closure of lignite assets is subject to state-aid approval by the European Commission. As the compensation envisaged for us is much lower than our actual financial burden, we are confident that the compensatory payments will not be classified as unlawful aid. Increased political pressure on our lignite business and the further acceleration of Germany's coal phaseout can generally not be ruled out.

Regulatory unpredictability has decreased in general, but the coronavirus pandemic has introduced a new cause for uncertainty. We modelled the potential consequences of COVID-19 for RWE in an analysis of scenarios in March 2020 and updated the findings in November. We are exposed to the risk of new build projects being delayed and a significant drop in economic output depressing electricity prices. Both these developments were already witnessed in 2020. Negative price effects would not only impact on our conventional power stations, but also on those wind farms, the entire or partial generation of which is not sold at firm conditions, causing them to also bear a market risk. The risk of having to recognise impairments due to corona-induced declines in margins is recorded in the 'other risks' class, which we therefore reclassified from 'low' to 'medium'.

Risk classes	Classification of the highest single risk	
	31 Dec 2020	31 Dec 2019
Market risks	Medium	Medium
Regulatory and political risks	Medium	High
Legal risks	Low	Low
Operational risks	Medium	Medium
Financial risks	Medium	Medium
Creditworthiness of business partners	Medium	Medium
Other risks	Medium	Low

As set out earlier, the focus of the risk analysis described in this chapter lies on the three-year horizon of our medium-term plan. The Task Force on Climate-related Financial Disclosures (TCFD), a panel of experts, recommended in 2017 that companies consider time horizons that go far above and beyond this when identifying and assessing climate-related risks. RWE implements the TCFD proposals. We explain how we do this in our 2020 Sustainability Report, which will be published in April 2021 and will then be available at www.rwe.com/sustainability-report.

In this section, we provide commentary on the main risks and opportunities we have identified for this and the next two years and explain what measures have been taken to counter the threat of negative developments.

- **Market risks.** In most of the countries in which we are active the energy sector is characterised by the free formation of prices. Declines in quotations on wholesale electricity markets can cause generation assets to become less profitable. This also relates to renewable energy assets that are not subsidised with fixed feed-in payments. Negative price developments can cause us to recognise impairments, which are also recorded as market risks with certain exceptions.

  Power and gas purchase agreements with conditions that do not depend on the development of wholesale prices expose us to the risk of having to pay more for the product than we can earn when selling it. This may force us to form provisions to cover this risk. We have identified such a risk inherent in the two contracts we concluded to purchase electricity from the Datteln 4 hard coal-fired power plant in 2005 and 2006. Operated by German energy group Uniper, the station was commissioned in the summer of 2020, ten years later than planned. We were unsuccessful in taking legal recourse against the continuation of the agreements. We are currently negotiating certain contractual conditions with Uniper and considering taking further legal steps. Our long-term gas purchase agreement with Russian energy group Gazprom sets dates for regular reviews, during which we can negotiate contractual changes depending on market conditions. In the past, this has enabled us to mitigate our earnings risk exposure from the contract. It cannot be ruled out that the results of future reviews fall short of our expectations. Vice versa, however, we also stand the chance of enforcing conditions that are more favourable than anticipated.

  We assess the price risks to which we are exposed on the procurement and supply markets taking account of current forward prices and expected volatility. For our power plants, we limit the risks by selling most of the electricity forward and securing the prices of the fuel and CO_2 emission allowances needed for its generation. We also use financial instruments to hedge our commodity positions. In the consolidated financial statements, such instruments, including those serving the purpose of reducing interest and currency risks, are usually presented through the statement of on-balance-sheet hedges. More detailed information on this can be found on page 118 in the Notes.

RWE Supply & Trading plays a central role when it comes to managing commodity price risks. It functions as the Group's interface to the global wholesale markets for electricity and energy commodities. On behalf of our power plant companies, RWE Supply & Trading markets large portions of our generation position and purchases the fuel and CO_2 certificates needed to produce electricity. Since RWE Supply & Trading acts as the internal transaction partner it is easier for us to limit the risks associated with price volatility on energy markets. However, the trading transactions are not exclusively intended to reduce risks. In compliance with risk thresholds, the company also takes commodity positions to achieve a profit.

Our risk management system for energy trading is firmly aligned with best practice as applied to the trading businesses of banks. As part of this, transactions with third parties are concluded only if the associated risks are within approved limits. There are guidelines governing the treatment of commodity price risks and associated credit risks. Our subsidiaries constantly monitor their commodity positions. Risks associated with trades conducted by RWE Supply & Trading for its own account are monitored daily.

The Value at Risk (VaR) is of central importance for risk measurement in trading and finance. It specifies the maximum loss from a risk position not exceeded with a predetermined probability over a predefined period of time. RWE's VaR figures are generally based on a confidence interval of 95 % and an observation period of one day. This means that, with a probability of 95 %, the daily loss will not exceed the VaR.

The VaR for the price risks of commodity positions in the trading business of RWE Supply & Trading must remain below a certain daily limit. The maximum allowable amount in the fiscal year that just ended was €40 million. The actual daily maximum was €32 million and the average for the year was €18 million. In addition, limits derived from the aforementioned VaR thresholds have been set for every trading desk. Furthermore, we develop extreme scenarios and factor them into stress tests, determine their impact on earnings, and take countermeasures if we deem the risks to be too high.

The management of our gas portfolio and the liquefied natural gas (LNG) business is pooled in a dedicated organisational unit at RWE Supply & Trading. Last year, the VaR cap for these activities was €14 million. The headroom actually utilised was €12 million. The average VaR for the year was €6 million.

We also apply the VaR concept to measure the extent to which the commodity price risks that we are exposed to outside the trading business can affect the RWE Group's adjusted EBITDA. To this end, we calculate the overall risk for the Group on the basis of the commodity risk positions of the individual companies; this overall risk mainly stems from power generation. The majority of our generation position is already hedged for 2021. Opportunities for additional profits arise, because we are able to flexibly adapt our power plant deployment to short-term market developments.

In the UK generation business, our earnings not only depend on the development of the price of electricity, fuel and emission allowances, but also on the level of the payments we receive for participating in the national capacity market. The payments are determined in annual auctions and fluctuate depending on supply and demand (see page 45).

We are also exposed to market risks in the gas storage business. As set out on page 27, the realisable margins depend significantly on the volatility of gas prices. If the short-term and seasonal price differences are large, they can be taken advantage of to generate substantial income. If they are insignificant, then so is the income. The German gas storage business is currently characterised by overcapacity and significant pressure on margins. However, we are confident that market conditions will improve in the long run. Should they deteriorate, we may have to recognise impairment losses for our storage facilities.

Our biggest market risks remain unchanged in the 'medium' category.

- **Regulatory and political risks.** Ambitious emission reduction targets have caused the governments in our core markets to intervene in the energy sector repeatedly. The most recent example of this is Germany's Coal Phaseout Act, on which we have commented on page 37et seq. It envisages gradually reducing coal-fired electricity generation to zero by 2038. In exchange for closing our lignite assets early, we will receive €2.6 billion in compensation. The damage we will actually suffer is much higher. Nevertheless, we find this statutory regulation to be acceptable, because it gives us more planning certainty for our lignite business. We now classify our regulatory and political risks as 'medium' instead of 'high'. The compensatory payments for the exit from the lignite business are subject to approval under EU state aid law. Despite the new legislation, it cannot be ruled out that policymakers continue to increase pressure on the lignite sector, for instance by introducing CO_2 price floors or establishing extremely restrictive emission limits. In addition, more ambitious climate targets for 2030 could make the next federal government accelerate the coal phaseout.

The coal phaseout in the Netherlands was enshrined in law in 2019. The country's exit roadmap prohibits power plants built in the 1990s from using coal from no later than 2025 onwards. For younger stations, the ban starts in 2030. This means that our Amer 9 and Eemshaven power plants will have to stop coal-based generation at the end of 2024 and 2029, respectively. Unlike in Germany, it is not envisaged that we will receive compensation for this. We mitigated our risk exposure from coal-based generation early on by converting Amer 9 and Eemshaven to biomass co-firing. We are receiving state subsidies for the investment outlay and the added cost of procuring fuel. However, the subsidies fall clearly short of covering the additional cost of converting the stations to 100 % biomass utilisation. The legally mandated coal phaseout could thus force us to close the stations early. Therefore, we believe that our ownership rights have been violated. As the government has not offered us compensation for our financial disadvantages, in February 2021 we initiated arbitration proceedings under the Energy Charter Agreement against the Netherlands before the International Centre for Settlement of Investment Disputes in Washington, USA.

We are also exposed to risks in the field of nuclear energy, albeit to a much lesser extent than in the past. Since we made contributions to the German nuclear energy fund in the middle of 2017, the state has assumed complete responsibility for the interim and final storage of our radioactive waste. We are still exposed to cost risks associated with disposal tasks which remain within our remit. For example, it cannot be ruled out that the dismantling of nuclear power stations will be more expensive than estimated and we will therefore have to top-up our provisions for this. However, we also see the opportunity to leverage synergies and cut costs.

Although the renewable energy business is characterised by fairly stable framework conditions and wide public acceptance, imponderables exist in this area as well. Adjustments to state subsidy schemes may result in reductions in payments and new projects losing their appeal. This can lead to investment undertakings being broken off. It is also conceivable that firmly pledged state payments may be cut retrospectively. In the dialogue we maintain with policymakers, we point out that companies which invest in building sustainable, climate-friendly energy infrastructure need reliable framework conditions.

Even in the present regulatory environment, we are exposed to risks associated with, for instance, approvals when building and operating production facilities. This particularly affects our opencast mines, power stations and wind farms. The danger here is that approvals are granted late or not at all and that granted approvals are withdrawn temporarily or for good.

Certain statutory regulations to which we must adhere can be interpreted in various ways and are therefore in need of legal clarification. One example is the regulation which exempts us from paying an apportionment under the Renewable Energy Act (EEG) for electricity that we consume ourselves in our German power stations and opencast mines. However, the legal situation surrounding the regulation is vague, for example with regard to the EEG exemption of leased assets. There is a danger that the options to benefit from the regulation may be limited by the Germany's highest court and that back payments may even have to be made for previous years.

Despite the aforementioned imponderables, the overall assessment of our regulatory and political risks has improved from 'high' to 'medium'. The main reason for this is the establishment of a clear framework for the German coal phaseout.

- **Legal risks.** Individual RWE Group companies are involved in litigation and arbitration proceedings due to their operations or M&A transactions. Out-of-court claims have been filed against some of them. Furthermore, Group companies are directly involved in various procedures with public authorities or are at least affected by their outcomes. To the extent necessary, we have accrued provisions for possible losses resulting from pending proceedings before ordinary courts and arbitration courts.

  Risks may also result from exemptions and warranties that we granted in connection with the sale of assets. Exemptions ensure that the seller covers the risks that are identified within the scope of due diligence, the probability of occurrence of which is, however, uncertain. In contrast, warranties cover risks that are unknown at the time of sale. These hedging instruments are standard procedure in sales of companies and equity holdings.

  We currently have low exposure to legal risks. This assessment did not change compared to the previous year.

- **Operational risks.** RWE operates technologically complex, interconnected production facilities such as conventional power stations and wind farms. Damage and outages can weigh heavily on earnings, as recently demonstrated by the severe cold snap in the US state of Texas (see page 46). When production facilities are built and modernised, delays and cost increases can occur, for example due to accidents, material defects, late deliveries, unfavourable weather conditions or time-consuming approval processes. In such cases, there is a danger that the plants become more expensive and they contribute to earnings later than planned. Furthermore, delays of renewable energy projects can be disadvantageous to the level of subsidies they receive. We counter the described risks through diligent plant and project management as well as high safety standards. We also regularly maintain our facilities and take out insurance policies if economically viable.

In the past fiscal year, some construction schedules could not be adhered to, in part due to the coronavirus pandemic. This primarily affected onshore wind projects in the USA, exposing us to the risk of a reduction in tax credits for assets that could not be commissioned by the end of 2020. However, in view of the unusual circumstances, the US government extended the deadlines, enabling wind farms that are completed in 2021 to receive the full subsidy (see page 37). Due to our dependence on suppliers, however, projects may incur further delays. So far, the coronavirus pandemic has only had a minor impact on the operation of our assets. Thanks to comprehensive preventive measures and forward-looking emergency plans, we were able to keep all major operational processes up and running. In light of the successful development of vaccinations, we are confident that the spread of the infection will soon come under control. We will keep our safety measures in place as long as necessary.

The shift of our power production to renewable energy sources like the wind and sun increases the impact of the weather on our business. For example, extended lulls can cause generation volumes and earnings of wind farms to fall significantly behind targets in certain fiscal years. We limit the effects of the weather on the Group's income in part through the geographic diversification of our business. This increases the likelihood of unfavourable meteorological conditions at one site being offset by favourable ones at another.

RWE has ambitious goals in relation to renewable energy and has increased its investment budgets significantly. We try to ensure that our new-build projects and acquisitions satisfy our return requirements. Nevertheless, we cannot rule out that income achieved through our projects falls short of expectations or prices paid for acquisitions prove to be too high retrospectively. Mounting competition in the renewable energy business in particular can be detrimental to project income. We prepare our investment decisions by conducting extensive analyses to try and map the financial and strategic effects as realistically as possible before taking investment decisions. Moreover, RWE has specific accountability provisions and approval processes in place to prepare and implement the decisions.

Our business processes are supported by secure data processing systems. Nevertheless, we cannot rule out a lack of availability of IT infrastructure or a breach in data security. Our high security standards are designed to prevent this. In addition, we regularly invest in hardware and software upgrades.

Despite corona-induced imponderables, as in the previous year, our operational risks are classified as 'medium'.

- **Financial risks.** Changes in key financial indicators such as interest rates, foreign exchange rates, securities prices and rates of inflation can have a major impact on our net worth and earnings.

  We are exposed to various interest rate risks. For example, rises in interest rates can lead to reductions in the prices of the securities we hold. This primarily relates to fixed-interest bonds. Last year, the VaR for the interest rate-related price risk of capital investments was €3.9 million on average at RWE AG.

  Moreover, increases in interest rates cause our financing costs to rise. We measure this risk using the Cash Flow at Risk (CFaR), applying a confidence level of 95 % and a holding period of one year. The average CFaR at RWE AG in 2020 was €25.0 million.

  Furthermore, market interest rates have an effect on our provisions, as they are the point of reference for the discount rates used for determining the net present values of obligations. This means that, all other things being equal, provisions rise when market interest rates fall and vice versa. On pages 154 et seqq. of the Notes, we present the effects of changes in interest rates on the net present values of our pension obligations and on the nuclear and mining provisions.

In addition to interest rates, the general price level also affects the amount of provisions. Rising inflation can force us to make a considerable upward adjustment to the present value of the obligations. Price increases are particularly detrimental when they are above average in sectors from which we procure products and services for nuclear waste disposal and recultivating opencast mine areas.

We are exposed to foreign exchange risks primarily owing to our business activities in the UK and the USA. Furthermore, energy commodities such as coal and oil are traded in US dollars. Companies which are overseen by RWE AG have their currency risks managed by the parent company. RWE AG aggregates the risks to a net financial position for each currency and hedges it if necessary. We calculated an average VaR for RWE AG's foreign currency position in 2020 of €1.2 million.

The securities we hold in our portfolio typically include shares. We currently hold a 15 % stake in E.ON, which had a fair value of €3.6 billion at the end of 2020. Therefore, changes in the quotation of the E.ON share can affect our financial strength significantly.

Risks and opportunities from changes in the price of securities are controlled by a professional fund management system. Range of action, responsibilities and controls are set out in internal guidelines which the Group companies are obliged to adhere to when concluding financial transactions. All financial transactions are recorded using special software and are monitored by RWE AG.

Collateral pledged for forward transactions also harbours a risk. The amount of collateral depends on the extent to which the contractually agreed prices deviate from market quotations as of the respective cut-off date. These differences can be substantial. In recent times, the market prices of energy commodities, e. g. CO_2 emission allowances, have fluctuated significantly, due in part to the coronavirus pandemic. Changes of this degree can lead to substantial short-term cash outflows, but can also present the opportunity to receive substantial collateral from contracting parties, resulting in a temporary increase in equity.

The conditions at which we can finance our business on the debt capital market are in part dependent on the credit ratings we receive from international rating agencies. As set out on page 60, Moody's and Fitch place our creditworthiness in the investment grade category. If the agencies lower our credit rating, we may incur additional costs if we have to raise debt capital. This would probably also increase the liquidity requirement when pledging collateral for forward transactions. However, we believe that such a scenario is unlikely. Both rating agencies are of the opinion that RWE has become more financially stable as a result of its transformation into a leading renewable energy company. Moody's upgraded our rating outlook to 'positive' in March 2020, which makes us believe that we stand a chance of receiving a more favourable credit rating.

The assessment of our creditworthiness by rating agencies, banks and capital investors depends in part on the level of our net debt. Our goal is to ensure that it does not exceed three times the adjusted EBITDA of our core business. Due to our extensive investments in expanding renewable energy, net debt could temporarily be above budget. This primarily affects fiscal years with cash inflows from operating activities or sales of stakes in projects that are below average. Nevertheless, we are confident that we can maintain our indebtedness within the target range. The additional financial headroom achieved through the capital increase in August 2020 is helpful in this respect.

We classify our financial risks as 'medium'. This assessment has not changed since last year.

- **Creditworthiness of business partners.** Our business relations with key accounts, suppliers, trading partners and financial institutions expose us to credit risks. Therefore, we track the creditworthiness of our partners closely and assess their credit standing based on internal and external ratings, both before and during the business relationship. Transactions that exceed a certain size and all trading transactions are subject to credit limits, which we determine before the transaction is concluded and adjust if necessary, for instance in the event of a change in the business partner's creditworthiness. At times, we request cash collateral or bank guarantees. In the trading and financing business, credit

risks and the utilisation of the limits are measured daily. We agree on collateral when concluding over-the-counter trading transactions. Furthermore, we enter into framework agreements, e. g. those of the European Federation of Energy Traders. For financial derivatives, we make use of the German master agreement for forward financial transactions or the master agreement of the International Swaps and Derivatives Association.

The coronavirus pandemic has created economic problems for many companies, potentially including business partners of RWE. This is why we are monitoring critical branches of industry more closely. Furthermore, we are extremely careful when entering into new business relationships and extending existing ones and assign customers lower credit limits where necessary. We currently do not expect any material financial losses due to corona-induced insolvencies. As in the past, our risks stemming from the creditworthiness of our business partners do not exceed the 'medium' category.

- **Other risks.** This is the class in which we record the potential effects of damage to our reputation, compliance infringements and criminal acts. The risk of a COVID-19-driven reduction in energy consumption leading to low electricity prices which, in turn, forces us to recognise impairments for generation assets has also been recorded in this category. Therefore, other risks have risen from 'low' to 'medium'.

RWE's risks and opportunities: general assessment by management. The RWE Group's risk exposure has improved significantly in the last few years. As a result of the asset swap with E.ON, which we completed successfully in 2020, we have become a leading renewable energy company. This has increased the share of stable regulated income considerably and made us more financially robust. Moreover, the gradual shift of our generation portfolio from fossil fuels to renewables also helps us to limit our political and regulatory risks. By aiming to be carbon neutral by 2040, we are demonstrating that we want to expedite the decarbonisation of the energy sector, thereby increasing our acceptance among politicians, capital lenders, customers and other stakeholder groups.

As shown by the commentary in this chapter, we no longer have any risks classified as 'high'. The German Coal Phaseout Act and the compensation claims against the federal government that it has written into law have substantially reduced the uncertainty of our lignite business. In the previous year, we had identified a major risk here. So far, RWE has only been affected by the onset of the COVID-19 pandemic to a limited extent, with the pandemic leading to delays in projects, among other things. If the virus cannot be controlled effectively in the near future, we may experience further delays. Moreover, there is a danger that the reduced economic output will result in lower electricity prices, causing our generation margins to shrink. However, we classify our pandemic-related risk exposure no higher than 'medium'. In this regard, it is proving advantageous once again that our renewable energy business gives us a strong and crisis-proof source of income. Our substantial investments in new wind and solar farms will make this pillar even stronger.

At the same time, our solid financial management ensures that RWE remains on a safe course. By analysing the effects of risks on our liquidity and pursuing a conservative financing strategy, we ensure that we can meet our payment obligations punctually. We have considerable liquid funds and great leeway in terms of debt financing, thanks to the Debt Issuance Programme, the Commercial Paper Programme and the syndicated credit line (see page 59). The capital increase conducted in August 2020 has made us more financially flexible. We budget our liquidity with foresight, based on the short, medium and long-term financing needs of our Group companies, and have a significant amount of minimum liquidity on a daily basis.

Thanks to the measures for safeguarding our financial and earning power over the long term and our comprehensive risk management system, we are confident that we can manage the current risks to RWE. At the same time, we are establishing the prerequisites for ensuring that this remains the case in the future.

Accounting-related internal control system: statements in accordance with Sec. 289, Para. 4, and Sec. 315, Para. 4 of the German Commercial Code. Our financial reporting is exposed to the risk of misrepresentations that could have a significant influence on the decisions made by their addressees. For example, stated earnings that are too high can cause capital investors to invest in a company. In RWE's Code of Conduct, we have undertaken to inform the public completely, objectively, accurately, clearly and in a timely manner, in compliance with capital market law. We use a series of tools to meet this ambition. Examples of this are our groupwide accounting policy and the high minimum standards to which we subject the IT systems used to record and process accounting-related data.

Furthermore, we use an accounting-related Internal Control System (ICS) for quality assurance purposes. The ICS aims to detect potential errors and misrepresentations that result from non-compliance with accounting standards. Designing the ICS and reviewing its effectiveness are under the responsibility of the Accounting Department of RWE AG. The department can apply groupwide rules in performing these tasks. In addition, it receives assistance from the ICS Committee, the objective of which is to ensure that the ICS is applied throughout the Group following uniform principles and meeting high ambitions in terms of correctness and transparency. The Committee consists of representatives from the Accounting, Controlling & Risk Management and Internal Audit & Compliance Departments, along with officers from the human resources, procurement, trading, finance, taxes and IT functions, which are highly relevant to accounting.

We subject the ICS to a comprehensive review every year. As a first step, we examine whether the risk situation is presented appropriately and whether suitable controls are in place for the identified risks. In a second step, we test the effectiveness of the controls. If the ICS reviews pertain to accounting-related processes, e. g., the preparation of financial statements or consolidation, they are conducted by employees from the Accounting Department. The appropriateness and effectiveness of the controls are certified by an accounting firm for processes handled by service centres on our behalf, for example invoice processing. The representatives of the finance, human resources, procurement, trading, and IT functions document whether the agreed ICS quality standards are adhered to by their respective areas. Our Internal Audit & Compliance Department is also involved in the ICS reviews. The results of the reviews are documented in a report to the Executive Board of RWE AG. The review conducted in 2020 once again demonstrated that the ICS is effective.

Within the scope of external reporting, the members of the Executive Board of RWE AG take a half-year and full-year balance-sheet oath, confirming that the prescribed accounting standards have been adhered to and that the financial statements give a true and fair view of the net worth, financial position and earnings. When in session, the Supervisory Board's Audit Committee regularly concerns itself with the effectiveness of the ICS. Once a year, the Executive Board of RWE AG submits a report on this to the Committee.

2.10 Disclosure relating to German takeover law

The following disclosure is in accordance with Section 315a, Paragraph 1 and Section 289a, Paragraph 1 of the German Commercial Code as well as with Section 176, Paragraph 1, Sentence 1 of the German Stock Corporation Act. The information relates to company-specific regulations, for example relating to adjustments to the capital structure by the Executive Board or a change of control of the company. At RWE, these provisions are in line with the standards of German listed companies.

Composition of subscribed capital. RWE AG's capital stock amounts to €1,731,123,322.88 and is divided among 676,220,048 no-par-value bearer shares. As set out on page 42, in August 2020, with the approval of the Supervisory Board, the Executive Board issued 61,474,549 new RWE shares to institutional investors in exchange for cash contributions, waiving subscription rights. This increased the capital stock by €157,374,845.44, or 10%.

Executive Board authorisation to issue new shares. The capital increase was based on an authorisation issued by the Annual General Meeting on 26 April 2018, which contains the following main provisions:

The Executive Board is authorised to increase the company's capital stock, subject to the Supervisory Board's approval, by up to €314,749,693.44 until 25 April 2023, through the issuance of up to 122,949,099 new bearer shares in return for contributions in cash or in kind (authorised capital). This authorisation may be exercised in full or in part, or once or several times for partial amounts. In principle, shareholders are entitled to subscription rights.

Subject to the approval of the Supervisory Board, the Executive Board may waive subscription rights:

- to prevent fractional amounts resulting from the subscription ratio;
- to issue shares in exchange for contributions in kind for the purposes of mergers or acquisitions of companies, parts of companies, operations, or of stakes in companies;
- in the event of a cash capital increase if the price at which the new shares are issued is not significantly lower than the price at which shares are quoted on the stock market and the portion of the capital stock accounted for by the new shares, for which subscription rights are waived, does not exceed 10% in total;
- and to offer shares to potential holders of convertible or option bonds commensurate to the rights to which they would be entitled on conversion of the bond or on exercise of the option.

The Executive Board is authorised, subject to the approval of the Supervisory Board, to determine the further details and conditions of the share issuance. In sum, the capital stock may not be increased by more than 20% through the issuance of new shares waiving subscription rights.

On 18 / 19 August 2020, RWE exercised the option of conducting a cash capital increase waiving subscription rights up to the upper limit of 10%. Half of the authorised capital, i. e. a maximum of €157,374,848, may still be used for other capital measures. This corresponds to an issuance of up to 61,474,550 RWE shares.

Shares in capital accounting for more than 10 % of voting rights. As of 31 December 2020, no holding in RWE AG exceeded 10 % of the voting rights.

Limitation of share transfers. Within the scope of RWE's employee share plan, 314,760 RWE shares were issued to staff in Germany in the financial year that just ended. The beneficiaries may only freely dispose of the shares after 31 December 2021. RWE also has employee share schemes in the United Kingdom. Participating companies are RWE Generation UK plc, RWE Technology UK Limited and RWE Supply & Trading GmbH UK Branch. In 2020, a total of 17,905 RWE shares were purchased under the UK plans. These shares are also subject to a restriction on disposal, which lasts five years from the grant date.

Appointment and dismissal of Executive Board members / amendments to the Articles of Incorporation. Executive Board members are appointed and dismissed in accordance with Sections 84 et seq. of the German Stock Corporation Act in conjunction with Section 31 of the German Co-Determination Act. Amendments to the Articles of Incorporation are made pursuant to Section 179 et seqq. of the German Stock Corporation Act in conjunction with Article 16, Paragraph 5 of the Articles of Incorporation of RWE AG. According to the aforementioned provision in the Articles of Incorporation, unless otherwise required by law or the Articles of Incorporation, the Annual General Meeting shall adopt all resolutions by a simple majority of the votes cast or – if a capital majority is required – by the simple majority of the capital stock represented when the resolution is passed. Pursuant to Article 10, Paragraph 9 of the Articles of Incorporation, the Supervisory Board is authorised to pass resolutions in favour of amendments to the Articles of Incorporation that only concern formal matters, without having a material impact on the content.

RWE AG authorisation to implement share buybacks. Furthermore, the Annual General Meeting on 26 April 2018 authorised the Executive Board of RWE AG to conduct share buybacks subject to the approval of the Supervisory Board until 25 April 2023, said buybacks accounting for up to 10 % of the capital stock as of the effective date of the resolution or as of the exercise date of the authorisation if the capital stock is lower on this date. At the Executive Board's discretion, this may be done on the stock exchange or via a public purchase offer.

Shares purchased in this way may then be cancelled. Furthermore, they may be transferred to third parties in connection with mergers or acquisitions of companies, parts of companies, operations, or of stakes in companies. The company may also use the shares to fulfil its obligations resulting from employee share schemes or settle rights arising from convertible or option bonds. In the aforementioned cases, shareholder subscription rights are waived. These authorisations may be exercised in full or in part, or once or several times for partial amounts.

Pursuant to the authorisation of 26 April 2018, the shares bought back could be sold for cash via other channels. This option no longer exists because the shares issued to conduct the capital increase count towards the upper limit of 10 % of the capital stock for which the authorisation was granted. For the same reason, it is also no longer possible to transfer repurchased shares to holders of convertible or option bonds if these bonds were issued waiving subscription rights and in exchange for cash contributions. In addition, the shares bought back cannot be used to settle subscription rights which holders of convertible or option bonds would have if they exercised the options attached to bonds in exchange for RWE shares.

Effects of a change of control on debt financing. Our debt financing instruments often contain clauses that take effect in the event of a change of control. Such a provision is in place e. g. in respect of our €5 billion syndicated credit line. It essentially has the following content: in the event of a change of control or majority at RWE, drawings are suspended until further notice. The lenders shall enter into negotiations with us on a continuation of the credit line. Should we fail to reach an agreement with the majority of them within 30 days from the change of control, the lenders may cancel the line of credit.

Change-of-control clauses also exist with regard to our bonds. The following rule applies to a senior bond maturing in 2037, a small residual amount of which remained with RWE when we transferred our senior bonds to innogy in 2016: in the event of a change of control in conjunction with a drop in RWE AG's credit rating below investment-grade status, creditors may demand immediate redemption. With regard to subordinated hybrid bonds, we have the right to cancel them within the defined change-of-control period in such cases; if this does not occur, the annual yield of the hybrid bonds increases by 500 basis points.

Consequences of a change of control for Executive Board and executive remuneration.
The current version of the German Corporate Governance Code dated 16 December 2019 recommends that no commitments to (additional) benefits be made in the event of the early termination of an employment contract by a member of the Executive Board as a result of a change of control. We adhere to this principle in all of the new employment contracts. Michael Müller and Zvezdana Seeger, who joined the Executive Board as of 1 November 2020, do not have a special right of termination or severance entitlements in the event of a change of control. The same will apply as of 1 May 2021 to Markus Krebber when he succeeds Rolf Martin Schmitz as CEO.

By contrast, the current employment contracts of Rolf Martin Schmitz and Markus Krebber still have a change-of-control clause. It gives them a special right of termination in the event that a change of control puts them at a major disadvantage. In such a case, they are free to resign for cause from their position within six months of the change of control by giving three months' notice. In addition, they can request the termination of their employment contract and receive a one-off payment. The amount of the one-off payment shall correspond to the compensation that would have been due until the end of the contractually agreed term of service, but no more than three times the total contractual annual remuneration, excluding share-based payments.

Change-of-control provisions also apply to the share-based payment of the Executive Board and executives. All performance shares granted on a preliminary basis for the fiscal year underway at the time of the change of control shall expire without replacement or compensation. Conversely, rights in connection with performance shares for past fiscal years, for which no payout has been effected yet, shall be preserved.

2.11 Remuneration report

Standards imposed on management and supervisory board compensation by the capital market have become higher. More than ever before, companies are expected to remunerate managing and monitoring bodies based on performance, while providing incentives for forward-looking sustainable action. RWE meets these demands. Nevertheless, we have refined the Executive Board remuneration system in close co-operation with investors. We will present the new rules to the 2021 Annual General Meeting for approval. The following commentary focuses on the compensation regulations for fiscal 2020.

Structure and level of Supervisory Board remuneration

The remuneration paid to the members of the Supervisory Board for fiscal 2020 was based on a resolution passed by the 2013 Annual General Meeting and is governed by the provisions of the Articles of Incorporation of RWE AG. It complies with all of the recommendations of the current version of the German Corporate Governance Code (GCGC) which was published on 16 December 2019.

The Chairman of the Supervisory Board of RWE AG receives fixed remuneration of €300,000 per fiscal year. His Deputy receives €200,000 per fiscal year. The other members of the Supervisory Board receive fixed remuneration of €100,000 and additional compensation for committee mandates according to the following rules: members of the Audit Committee receive additional remuneration of €40,000. This payment is increased to €80,000 for the Chair of this committee. With the exception of the Nomination Committee, the members of which do not receive additional remuneration, the members and the Chairs of all the other Supervisory Board committees receive an additional €20,000 and €40,000 in remuneration, respectively. Remuneration for a committee mandate is only paid if the committee is active at least once in the fiscal year.

Supervisory Board members who concurrently hold several offices in this body only receive compensation for the highest-paid position. Remuneration is prorated if a Supervisory Board member only performs a function for part of a fiscal year.

In addition to the remuneration paid, out-of-pocket expenses are refunded to the members of the Supervisory Board. Some Supervisory Board members also receive income from the exercise of Supervisory Board mandates at subsidiaries of RWE AG.

The members of the Supervisory Board imposed on themselves the obligation, subject to any commitment to relinquish their pay, to use 25 % of the total annual compensation (before taxes) to buy RWE shares and to hold them for the duration of their membership of the Supervisory Board of RWE AG. Last year, all of the members who do not relinquish their compensation met this self-imposed obligation regarding their compensation for 2019.

In total, the remuneration of the Supervisory Board (excluding the reimbursement of out-of-pocket expenses) amounted to €2,880,000 in fiscal 2020 (previous year: €3,304,000). Of this sum, €480,000 (previous year: €465,000) was remuneration paid for mandates on committees of the Supervisory Board and €100,000 (previous year: €543,000) was remuneration paid for mandates at subsidiaries of RWE AG.

In accordance with Section 113 of the German Stock Corporation Act, we will present a Supervisory Board remuneration scheme to the Annual General Meeting on 28 April 2021 for approval. We are considering proposing to the shareholders an increase in remuneration for committee work.

The remuneration of all individuals who served on the Supervisory Board in 2019 and / or 2020 is shown in the table overleaf.

Supervisory Board remuneration[1]	Fixed remuneration		Remuneration for committee offices		Remuneration for mandates at subsidiaries[2]		Total remuneration[3]	
€ '000	2020	2019	2020	2019	2020	2019	2020	2019
Dr. Werner Brandt, Chairman	300	300	–	–	–	–	300	300
Frank Bsirske, Deputy Chairman	200	200	–	–	–	143	200	343
Michael Bochinsky	100	100	40	40	–	–	140	140
Reiner Böhle (until 18 Sep 2019)	–	72	–	14	–	–	–	86
Sandra Bossemeyer	100	100	20	20	–	–	120	120
Martin Bröker	100	100	–	–	–	–	100	100
Anja Dubbert (since 27 Sep 2019)	100	26	20	1	–	–	120	27
Matthias Dürbaum (since 27 Sep 2019)	100	26	20	1	–	–	120	27
Ute Gerbaulet	100	100	–	–	–	–	100	100
Prof. Dr. Hans-Peter Keitel	100	100	20	20	–	–	120	120
Dr. h.c. Monika Kircher	100	100	40	30	–	–	140	130
Monika Krebber (until 18 Sep 2019)	–	72	–	14	–	86	–	172
Harald Louis	100	100	20	20	20	20	140	140
Dagmar Mühlenfeld	100	100	20	20	–	–	120	120
Peter Ottmann	100	100	20	20	–	–	120	120
Günther Schartz	100	100	20	20	–	–	120	120
Dr. Erhard Schipporeit	100	100	80	80	–	215	180	395
Dr. Wolfgang Schüssel	100	100	20	25	–	–	120	125
Ullrich Sierau	100	100	40	40	–	–	140	140
Ralf Sikorski	100	100	40	40	50	50	190	190
Marion Weckes	100	100	40	40	–	–	140	140
Leonhard Zubrowski	100	100	20	20	30	30	150	150
Total[3]	**2,300**	**2,296**	**480**	**465**	**100**	**543**	**2,880**	**3,304**

1 Supervisory Board members who joined or retired from the corporate body during the year receive prorated remuneration.
2 Remuneration for exercising mandates at subsidiaries is only included for periods of membership of the Supervisory Board of RWE AG.
3 The commercial rounding of certain figures can result in inaccurate sum totals.

Structure of Executive Board remuneration

Overview. The structure and level of the Executive Board's remuneration are determined by the Supervisory Board and reviewed on a regular basis to determine whether they are appropriate and in line with generally accepted principles. The remuneration system described in the following was introduced with effect from 1 October 2016. It is made up of non-performance-based and performance-based components. The former consists of the fixed salary, the pension instalment as well as fringe benefits. The performance-based components include the bonus and a share-based payment, the latter of which is a long-term component.

At its meeting on 25 June 2020, the Supervisory Board fundamentally reformed the remuneration system, in order to align it even more closely with the objectives of the company and the demands of our stakeholders. The amendments relate to various matters, including the long-term share-based payment, personal investment in RWE shares, and the financial consequences of misconduct. With a few exceptions, the old rules applied to the Executive Board's remuneration in 2020. These are described in more detail in the following. We have provided information on the major changes at the end of the chapter on page 96.

Recipients of Executive Board remuneration. In the financial year that just ended, Rolf Martin Schmitz, Markus Krebber, Michael Müller and Zvezdana Seeger received compensation for their work on the Executive Board of RWE AG.

- Rolf Martin Schmitz (63) has been a member of the Executive Board since 1 May 2009 and its Chairman since 15 October 2016. Concurrently, he was the Labour Director from May 2017 to October 2020. He will retire from the Executive Board as of 30 April 2021.

- Markus Krebber (48) was appointed to the Executive Board with effect from 1 October 2016 and has been CFO since 15 October 2016. His tenure on the Executive Board runs through to 30 June 2026, and he will assume chairmanship as of 1 May 2021.

- Michael Müller (49) was appointed to the Executive Board for an initial period of three years with effect from 1 November 2020. He will become CFO as of 1 May 2021.

- Zvezdana Seeger (56) also joined the Executive Board of RWE AG on 1 November 2020. She is the Labour Director and responsible for HR and IT. Her first tenure is also limited to three years.

Fixed compensation and pension instalments. The members of the Executive Board of RWE AG receive a fixed annual salary, which is paid in monthly instalments. As a second fixed remuneration component, they are entitled to a pension instalment for every year of service, which is determined on an individual basis. By contrast, Rolf Martin Schmitz, who belonged to the Executive Board before the pension instalment was introduced, receives a pension commitment (see page 88).

The pension instalment is paid in cash or retained in part or in full in exchange for a pension commitment of equal value. The accumulated capital may be drawn on retirement, but not before the Executive Board member turns 62. When retiring, Executive Board members can choose a one-time payment or a maximum of nine instalments. They and their surviving dependants do not receive any further benefits. Vested retirement benefits from earlier activities within the RWE Group remain unaffected by this.

Fringe benefits. Non-performance-based compensation also includes fringe benefits, primarily consisting of company cars and accident insurance premiums.

Bonus. Executive Board members receive a bonus which is based on the economic performance of the company and the degree to which they achieve their individual goals and the collective goals of the Executive Board. The starting point for calculating the individual bonus is what is referred to as the 'company bonus', which depends on the level of EBIT of relevance to remuneration in the fiscal year in question. The basis for determining this figure is adjusted EBIT (EBIT minus the non-operating result). The rules of Executive Board remuneration stipulate that the Supervisory Board may modify adjusted EBIT to make this figure more suitable for measuring management performance. Such adjustments

can relate to gains on disposals, changes in provisions, as well as impairments and their consequences. This converts adjusted EBIT to EBIT of relevance to remuneration.

The company bonus is determined as follows: the Supervisory Board sets a target as well as a floor and a ceiling for EBIT of relevance to remuneration at the beginning of every fiscal year. After the end of the fiscal year, the actual level of adjusted EBIT and EBIT of relevance to remuneration resulting from the modifications explained earlier are determined. If the latter is identical to the target, the target achievement is 100 %. In this case, the company bonus equals the contractually agreed baseline bonus. If EBIT of relevance to remuneration is exactly at the pre-defined floor, target achievement is 50 %; if it is at the ceiling, target achievement is 150 %. Between the two limits, target achievement is calculated by linear interpolation. If EBIT of relevance to remuneration is below the floor, no company bonus is paid. If the ceiling is exceeded, the maximum target achievement remains 150 %.

In addition to the company bonus, the individual performance factor determines the level of bonus paid to each Executive Board member. The performance factor depends on the achievement of: (1) individual goals, (2) general collective goals, and (3) collective goals in relation to corporate responsibility and employee motivation. The aforementioned target categories are each weighted by one-third. After the end of every fiscal year, the Supervisory Board evaluates the individual performance of the Executive Board members relative to the three aforementioned categories. In so doing, it orients itself towards the degree to which the targets set at the beginning of the year have been met. Degrees of achievement can range between 0 % and 200 %. However, the derivable performance factor is limited to between 80 % and 120 %. This means that the performance factor for an Executive Board member with a 150 % target achievement is only 120 %.

The company bonus, multiplied by the individual performance factor, results in the bonus for each Executive Board member. This is paid in full after the end of the fiscal year.

Deviating from the aforementioned rules, it was agreed that the individual performance factor for the two months of work last year of Zvezdana Seeger and Michael Müller, who joined the Executive Board as of 1 November 2020, only be determined based on the achievement of individual goals. Therefore, the collective goals in categories (2) and (3) were disregarded.

Share-based payment. Executive Board members are granted a share-based payment, which rewards the achievement of long-term goals. For fiscal 2020, this was done for the last time under the 2016 – 2020 Strategic Performance Plan (SPP). The two following criteria are used by the SPP in measuring the degree to which goals are achieved in a fiscal year: the total return of the RWE share, which is made up of the share price and the dividend (performance), and net income of relevance to remuneration. As set out earlier, major aspects of the share-based payment have been modified. The changes were implemented in the 2021 SPP, which has been in effect since the beginning of the current year. The following commentary concerns the old SPP.

The 2016 – 2020 SPP is based on performance shares with a term (vesting period) made up of the fiscal year to which they relate and the three subsequent years. At the beginning of a fiscal year, Executive Board members receive a grant letter, in which they are informed of their personal gross allocation amount. The new Executive Board members Zvezdana Seeger and Michael Müller received their allocation when they took office in November. The number of performance shares is calculated by dividing the gross grant amount by the average closing quotation of the RWE share over the last 30 days of trading on Xetra before the respective grant year. However, the allocation is provisional. The final number of fully granted performance shares to be allocated is determined after the respective grant year.

Under the 2016 – 2020 SPP, the reconciliation of the conditionally granted performance shares to the finally granted performance shares is oriented towards net income of relevance to remuneration, which is determined by making modifications to adjusted net income. The allowable modifications are governed by the SPP conditions and ensure that actual earnings can be compared to the predetermined target figures even in cases of unforeseen events such as rights issues, acquisitions, disposals and changes in regulations.

The Supervisory Board determines the target figures for net income of relevance to remuneration at the beginning of the fiscal year on the basis of the company's medium-term plan. It also establishes the ceilings and floors. Accordingly, the 2016 – 2020 SPP takes the following approach: if the actual and target figure are identical, 100 % of the conditionally granted performance shares are fully allocated. If the actual figure is exactly at the floor, 50 % of the conditionally granted performance shares are fully allocated; if it is at the ceiling, the final grant amounts to 150 %. If the actual figure is below the floor, all of the conditionally granted performance shares lapse. If the ceiling is exceeded, the maximum grant remains 150 %.

Pursuant to the 2016 – 2020 SPP, the performance shares are fully paid out in cash to the Executive Board member three years after the final grant. This means that the payment for the 2018, 2019 and 2020 tranches is still outstanding. The level of the payment depends on the performance of the RWE share. It corresponds to the final number of performance shares multiplied by the sum of the average closing Xetra quotation of the RWE share on the last 30 trading days of the vesting period and the dividends accumulated in the last three years. However, a cap applies in this case as well: even in the event of an extremely good share performance, the payment is limited to a maximum of 200 % of the initial gross grant amount.

The members of the Executive Board are obliged to reinvest 25 % of the payment (after taxes) in RWE shares. The shares must be held until at least the end of the third year after conclusion of the vesting period.

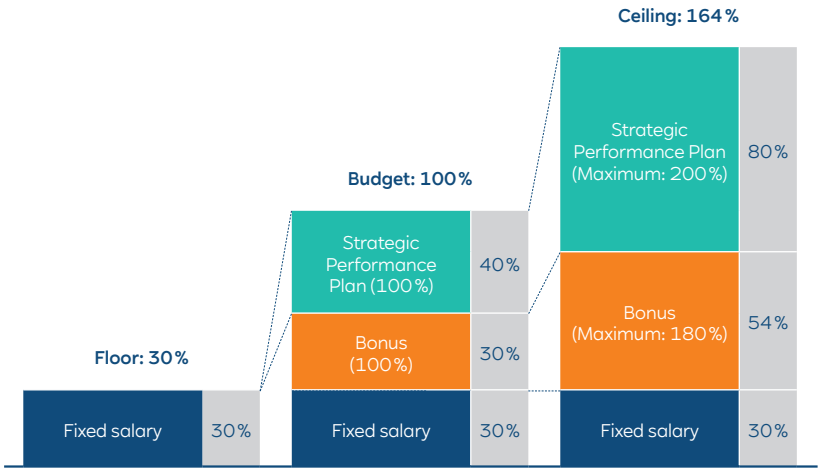
The performance shares remain unaffected after an Executive Board member resigns from their office at the end of their contract and are paid out as planned at the end of the vesting period. If an Executive Board member leaves the company at their own request, or if they are terminated for cause, all of the performance shares that have not reached the end of the vesting period lapse.

Malus and clawback provisions. The 2016 – 2020 SPP contains a malus clause, which allows the Supervisory Board to penalise misconduct by an Executive Board member by shortening or completely eliminating an ongoing SPP tranche. Such misconduct includes the intentional breach of the Code of Conduct, the compliance guidelines, a major duty set out in the employment contract, or of the duties of care defined by Section 93 of the German Stock Corporation Act.

The contracts of Michael Müller and Zvezdana Seeger, both of whom joined the Executive Board in November 2020, include the extensive malus and clawback provisions of the future remuneration system. These provisions allow the Supervisory Board to claw back performance-linked compensation that has already been paid (bonus and share-based payment) in part or in full if the consolidated financial statements are found to contain errors. Above and beyond that, in the event of misconduct by an Executive Board member, the Supervisory Board can exercise its discretion in reducing or cancelling any variable compensation for the fiscal year with which the breach of duty is associated. If the variable remuneration for the fiscal year in question has already been paid, the Supervisory Board can demand that it be returned in part or in full. The malus and clawback provisions shall not prejudice the obligation of the Executive Board member to compensate the company for damages.

Remuneration for exercising mandates. During the past fiscal year, members of the RWE AG Executive Board were paid to exercise supervisory board mandates at affiliates. This income fully counted towards the bonus (Schmitz / Krebber) or fixed remuneration (Müller / Seeger) and therefore did not increase the total remuneration.

Range of Executive Board remuneration

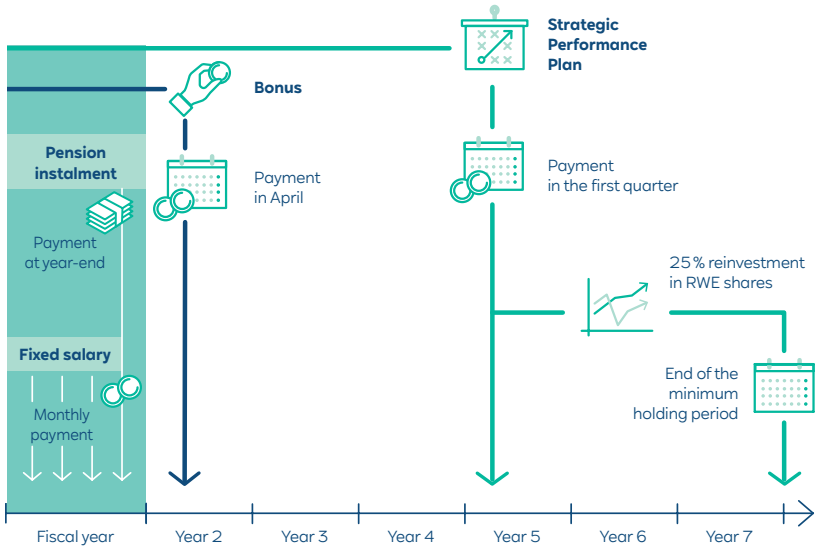


Remuneration broken down by component. Assuming that both the company and the Executive Board members achieved their performance targets to a degree of 100 %, the compensation structure would roughly have broken down as follows: 30 % of total remuneration would have been accounted for by the fixed salary, another 30 % by the bonus, and 40 % by long-term compensation under the 2016 – 2020 SPP.

Limitation of Executive Board remuneration. The chart above shows the percentage shares of the components of Executive Board remuneration in 2020. The company bonus was limited to 150 % of the contractually agreed bonus budget and the individual performance factor was capped at 120 %. Consequently, a maximum of 180 % of the bonus budget could be reached. With regard to share-based payment under the 2016 – 2020 SPP, payout of the performance shares after the vesting period was limited to a maximum of 200 % of the grant budget. Due to the above maximum values, there was also a cap on total compensation, which amounted to 164 % of the budget.

Payment dates. Executive Board members receive their fixed salary in monthly instalments. The pension instalment is paid out at the end of the year, unless it is converted into a pension commitment. After the fiscal year, the Supervisory Board determines the target achievement for the company bonus and establishes the individual performance factor. The bonus is paid in April. For performance shares from the SPP, the payment is made in the first quarter following the end of the vesting period. As explained earlier, Executive Board members must invest 25 % of the payment in RWE shares and may not sell these shares until after three additional calendar years have passed from completion of the four-year vesting period. As a result, it takes a total of seven years for Executive Board members to obtain the full amount of their compensation.

Executive Board remuneration payment timeline for a fiscal year



Pension scheme. Until the introduction of the pension instalment described earlier on 1 January 2011, pension benefits were granted to the members of the Executive Board. Of the Executive Board members in 2020, this only applies to Rolf Martin Schmitz; the pension commitment made to him in 2009 remains unchanged. It entitles him to life-long retirement benefits in the event of retirement from the Executive Board of RWE AG upon turning 60, permanent disability, early termination or non-extension of his employment contract by the company. In the event of death, his surviving dependants are entitled to benefits. The amount of Rolf Martin Schmitz's qualifying income and the level of benefits based on the years of service determine his individual pension and surviving dependants' benefits.

Change of control. The contracts of Rolf Martin Schmitz and Markus Krebber contain change-of-control clauses, which consist of the following main provisions: if shareholders or third parties obtain control over the company and this results in major disadvantages for the Executive Board members, they have a special right of termination. They can resign from the Executive Board and request that their employment contract be terminated in combination with a one-off payment within six months of the change of control.

A change of control as defined by this provision occurs when one or several shareholders or third parties acting jointly account for at least 30 % of the voting rights in the company, or if any of the aforementioned can exert a controlling influence on the company in another manner. A change of control also occurs if the company is merged with another legal entity, unless the value of the other legal entity is less than 50 % of the value of RWE AG.

On termination of their employment contract due to a change of control, Executive Board members receive a one-off payment equalling the compensation due until the end of the term of their contract. However, this amount will not be higher than three times their total annual remuneration, which encompasses all compensation components including fringe benefits but excluding the SPP.

In the event of a change of control, all of the performance shares granted under the 2016 – 2020 SPP that have been finally allocated but not been paid out are paid out early. Conversely, performance shares conditionally granted by the date of the change of control lapse without replacement or consideration.

The latest version of the GCGC suggests that no benefits be pledged in the event of the early termination of an employment contract by an Executive Board member due to a change of control. We adhere to this principle in all newly concluded employment contracts. In the event of a change of control, Zvezdana Seeger and Michael Müller, who were appointed to the Executive Board as of 1 November 2020, do not have a special right of termination or a right to severance. The same will apply to Markus Krebber from 1 May 2021 onwards, when he succeeds Rolf Martin Schmitz as CEO.

Early termination of Executive Board mandate and severance cap. Following a recommendation of the GCGC, the Executive Board's employment contracts include a provision stipulating that if an Executive Board mandate is otherwise terminated early without due cause, a severance payment of no more than the remuneration due until the end of the employment contract and no more than two total annual compensations is made (severance cap).

Level of Executive Board remuneration (according to HGB)	Rolf Martin Schmitz		Markus Krebber		Michael Müller[1]		Zvezdana Seeger[1]		Total	
€ '000	2020	2019	2020	2019	2020	2019	2020	2019	2020	2019
Non-performance-based:	**1,181**	**1,183**	**1,145**	**1,085**	**156**	**–**	**154**	**–**	**2,636**	**2,268**
Fixed remuneration[2]	1,160	1,160	800	763	108	–	108	–	2,176	1,923
Pension instalments[3]	–	–	300	300	43	–	43	–	386	300
Fringe benefits	21	23	45	22	5	–	3	–	74	45
Performance-based:	**3,084**	**3,032**	**2,187**	**2,271**	**297**	**–**	**297**	**–**	**5,865**	**5,303**
Bonus (short-term)	1,584	1,782	1,087	1,171	130	–	130	–	2,931	2,953
of which: credited remuneration for mandates[2]	85	115	40	146	–	–	–	–	129	261
Value of performance shares at grant[4] (long-term)	1,500	1,250	1,100	1,100	167	–	167	–	2,934	2,350
Total remuneration	**4,265**	**4,215**	**3,332**	**3,356**	**453**	**–**	**451**	**–**	**8,501**	**7,571**

1 Michael Müller and Zvezdana Seeger joined the Executive Board on 1 November 2020.
2 Income of Michael Müller and Zvezdana Seeger from the exercise of Supervisory Board offices within the Group counts towards fixed pay and not the bonus; in 2020, it amounted to €7,000 for Michael Müller, whereas Zvezdana Seeger did not have any such income.
3 The pension instalment paid to Markus Krebber, Michael Müller and Zvezdana Seeger is part of their remuneration under the German Commercial Code (HGB), but this does not apply to the annual service cost of the pension commitment to Rolf Martin Schmitz.
4 The German Commercial Code mandates the statement of the fair value as of the grant date.

Level of Executive Board remuneration

The remuneration of the Executive Board of RWE AG is calculated in compliance with the rules set out in the German Commercial Code (HGB). The members of the Executive Board received €8,501,000 in total remuneration for their work in fiscal 2020 compared to €7,571,000 in the previous year when the board was made up of two members. The remuneration components are shown in the table above.

EBIT of relevance to remuneration, the basis for calculating the bonus, amounted to €1,830 million in the fiscal year that just ended. It differs from adjusted EBIT (€1,771 million) in that we made certain modifications to it to neutralise exceptional effects that could not be foreseen when establishing the target figure. One such modification related to the dividend on the 15% stake in E.ON, which was considered in the EBIT target because it had not been decided at the time that we would recognise it in the financial result. Moreover, a correction was made to income from investments that was unexpectedly high due to timing effects. A further adjustment related to impairments recognised in 2019, the knock-on effects of which were not taken into account in the target value and were therefore eliminated. The adjusted EBIT target derived from the medium-term plan was €1,556 million (target achievement of 100%), with a floor of €856 million (target achievement of 50%) and a ceiling of €2,256 million (target achievement of 150%). These figures and the actual figure result in a target achievement of 120% for 2020. This means that the company bonus was 20% higher than the bonus budget established at the beginning of the year.

Calculation of the 2020 company bonus	2020 € million	Target achievement %
Adjusted EBIT	1,771	–
Modifications[1]	59	–
EBIT of relevance to remuneration	**1,830**	**120**
Target	1,556	100
Ceiling	2,256	150
Floor	856	50

1 See commentary on the previous page.

The Supervisory Board found that Rolf Martin Schmitz and Markus Krebber overachieved the individual and collective targets. The main success factors were the completion of the asset swap with E.ON and the progress made in transforming RWE into a leading renewable energy company. The Supervisory Board is of the opinion that the repeated strong performance of the RWE share is proof of the capital market's endorsement of RWE's growth strategy. Of notable mention was the Executive Board setting the stage for the accelerated expansion of wind and solar capacity through the capital increase of August 2020 and the acquisition of Nordex's European project development business. The conclusion of the public law contract with the German government on the conditions of the lignite phaseout and its socially acceptable provisions also contributed to the high degree of target achievement. Goals associated with employee motivation, which is measured via regular in-company surveys, were slightly exceeded. The degrees of target achievement with respect to CR goals, which mainly relate to the carbon footprint of the generation portfolio, occupational safety as well as conformity with compliance, environmental and social standards, were between 95 % and 120 %. Messrs. Schmitz and Krebber fell 5 % short of the carbon footprint target set for the generation portfolio due to delays in the completion of renewable energy assets, which in some cases were due to COVID-19. In view of the problem-free familiarisation process of Michael Müller and Zvezdana Seeger, the Supervisory Board determined that these two new Executive Board members reached an individual target achievement of 100 %. As set out earlier, this assessment did not take account of any of the collective goals.

Calculation of the 2020 individual bonus		Rolf Martin Schmitz	Markus Krebber	Michael Müller	Zvezdana Seeger
Bonus budget	€ '000	1,100	755	108	108
Target achievement regarding EBIT of relevance to remuneration	%	120	120	120	120
Company bonus	€ '000	1,320	906	130	130
Individual performance factor	%	120	120	100	100
Individual bonus	€ '000	1,584	1,087	130	130

Rolf Martin Schmitz and Markus Krebber each had a target achievement of 132 %. Due to the cap, their individual performance factor was 120 %, whereas that of Michael Müller and Zvezdana Seeger was 100 %. Multiplying these figures by the company bonus results in the amount of individual bonus granted to each Executive Board member. It totalled €1,584,000 for Rolf Martin Schmitz, €1,087,000 for Markus Krebber, €130,000 for Michael Müller and €130,000 for Zvezdana Seeger.

Calculation of the 2020 tranche of the Strategic Performance Plan	2020 € million	Target achievement %
Adjusted net income	1,213	–
Modifications[1]	–170	–
Net income of relevance to remuneration	**1,043**	**104**
Target	1,007	100
Ceiling	1,507	150
Floor	507	50

1 See commentary on the next page.

The German Commercial Code stipulates that the long-term performance-based remuneration component is the fair value of the performance shares granted on a preliminary basis at the beginning of a fiscal year. As set out on pages 85 et seq., the level of the final grant depends on the development of net income of relevance to remuneration in the fiscal year compared to a predefined target. The latter was set by the Supervisory Board at €1,007 million for 2020 (grant of 100%). The floor was €507 million (grant of 50%) and the ceiling was €1,507 million (grant of 150%). The actual amount of €1,043 million led to a target achievement of 104%. This means that the final grant of performance shares for 2020 was 4% higher than the preliminary grant.

Net income of relevance to remuneration is adjusted net income (€1,213 million) minus several exceptional items. As mentioned on page 89, we made a downward correction to the unexpectedly high income from investments and eliminated knock-on effects of impairments. A further modification related to the tax rate, which is used to calculate adjusted net income. It currently amounts to 15%, whereas the target was determined based on a tax rate of 20%.

Long-term incentive payment (Strategic Performance Plan): 2020 tranche		Rolf Martin Schmitz	Markus Krebber	Michael Müller	Zvezdana Seeger
Grant date		1 Jan 2020	1 Jan 2020	1 Nov 2020	1 Nov 2020
Fair value at grant date	€ '000	1,500	1,100	167	167
Share price (average)	€	26.41	26.41	26.41	26.41
Number of performance shares allocated on a provisional basis		**56,797**	**41,651**	**6,311**	**6,311**
Measurement date of performance conditions		31 Dec 2020	31 Dec 2020	31 Dec 2020	31 Dec 2020
Target achievement in relation to net income of relevance to remuneration	%	104	104	104	104
Final number of fully granted performance shares		**59,069**	**43,317**	**6,563**	**6,563**
End of vesting period		31 Dec 2023	31 Dec 2023	31 Dec 2023	31 Dec 2023

Long-term incentive payment (Strategic Performance Plan): 2017 – 2019 tranches		Rolf Martin Schmitz			Markus Krebber		
Tranche	Year	2019	2018	2017	2019	2018	2017
Grant date		1 Jan 2019	1 Jan 2018	1 Jan 2017	1 Jan 2019	1 Jan 2018	1 Jan 2017
Fair value at grant date	€ '000	1,250	1,250	1,250	1,100	1,100	988
Share price (average)	€	19.10	18.80	11.62	19.10	18.80	11.62
Number of performance shares allocated on a provisional basis		**65,445**	**66,489**	**107,573**	**57,592**	**58,511**	**84,983**
Measurement date of performance conditions		31 Dec 2019	31 Dec 2018	31 Dec 2017	31 Dec 2019	31 Dec 2018	31 Dec 2017
Target achievement in relation to net income of relevance to remuneration	%	150	123	115	150	123	115
Final number of fully granted performance shares		**98,168**	**81,781**	**123,709**	**86,388**	**71,969**	**97,730**
End of vesting period		31 Dec 2022	31 Dec 2021	31 Dec 2020	31 Dec 2022	31 Dec 2021	31 Dec 2020

The table below shows the increase in provisions to cover obligations from share-based payments under the SPP.

Addition to provisions for long-term share-based incentive payments € '000	2020	2019
Rolf Martin Schmitz	2,527	2,726
Markus Krebber	2,096	1,982
Michael Müller	54	–
Zvezdana Seeger	54	–
Total	**4,731**	**4,708**

Obligations under the former pension scheme. The service cost of pension obligations to Rolf Martin Schmitz amounted to €595,000 in 2020 (previous year: €554,000). This is not a remuneration component in accordance with the German Commercial Code. As of year-end, the present value of the defined benefit obligation determined in accordance with IFRS amounted to €16,441,000 (previous year: €14,997,000). The present value of the pension obligation determined according to the German Commercial Code totalled €13,166,000 (previous year: €11,894,000). It therefore increased by €1,272,000 (previous year: €1,360,000). Based on the emoluments qualifying for a pension as of 31 December 2020, the projected annual pension paid to Rolf Martin Schmitz on retiring from the company totalled €556,000, as in the previous year. This includes vested pension benefits due from former employers transferred to RWE AG.

Presentation of Executive Board remuneration in accordance with the GCGC (2017)

In designing and presenting the remuneration system, we also follow the recommendations of the German Corporate Governance Code. Last year, we oriented ourselves towards the version of the Code dated 7 February 2017, which was in force at the time. It was replaced by the version of 16 December 2019, which was introduced on 20 March 2020. The new GCGC no longer contains recommendations regarding the presentation of management board compensation, as opposed to the old version of the Code, which recommended the use of specific model tables. The Government Commission responsible for the Code is of the opinion that reporting on remuneration is now sufficiently regulated by the German law on the implementation of the Second Shareholder Rights Directive (ARUG II). However, the corresponding rules pursuant to German stock corporation law become mandatory for fiscal 2021 and later. To avoid gaps in transparency, we are presenting the Executive Board's remuneration for 2020 using the model tables from the 2017 GCGC once again.

The following tables show:

- the benefits granted for the reporting year including fringe benefits as well as the theoretical maximum and minimum amounts of variable compensation;
- payments of fixed remuneration, short-term variable remuneration and long-term variable remuneration by year of receipt; and
- the cost of pensions and other benefits.

Benefits or compensation are considered granted when a binding commitment to such is made to the management board member. In deviation from German commercial law, it is immaterial to what extent the management board member has already provided the services being remunerated.

The term 'benefits received' defines the extent to which the management board member has already received payments. In this regard, the relevant aspect is the time at which the amount being paid is sufficiently certain and not the actual time of the payment. We also take this approach in presenting the payments made under the 2016 – 2020 SPP.

This distinction described above can be illustrated with the example of the bonus: the contractually agreed and promised budgeted bonus for the fiscal year in question is considered 'granted'. Conversely, the benefits received table shows the bonus level which will actually be paid with a high degree of probability. In this regard, it is irrelevant that the payment will not be made until the following year. The payment date is deemed to have been reached when the indicators needed to determine target achievement (and therefore the bonus) are known with sufficient certainty. It is assumed that this is already the case at the end of the year. As a result, the Executive Board bonuses are stated in the reporting year in the benefits received table.

Benefits granted	Rolf Martin Schmitz Chief Executive Officer since 15 October 2016				Markus Krebber Chief Financial Officer since 15 October 2016				Michael Müller Member of the Executive Board since 1 November 2020				Zvezdana Seeger Chief HR Officer / Labour Director since 1 November 2020			
€ '000	2020 (Min.)	2020 (Max.)	2020 Actual	2019 Actual	2020 (Min.)	2020 (Max.)	2020 Actual	2019 Actual	2020 (Min.)	2020 (Max.)	2020 Actual	2019 Actual	2020 (Min.)	2020 (Max.)	2020 Actual	2019 Actual
Fixed remuneration	1,160	1,160	1,160	1,160	800	800	800	763	108	108	108	–	108	108	108	–
Pension instalment	–	–	–	–	300	300	300	300	43	43	43	–	43	43	43	–
Fringe benefits	21	21	21	23	45	45	45	22	5	5	5	–	3	3	3	–
Total fixed remuneration	**1,181**	**1,181**	**1,181**	**1,183**	**1,145**	**1,145**	**1,145**	**1,085**	**156**	**156**	**156**	**–**	**154**	**154**	**154**	**–**
One-year variable remuneration (bonus)	**0**	**1,980**	**1,100**	**1,100**[1]	**0**	**1,359**	**755**	**723**[1]	**0**	**195**	**108**	**–**	**0**	**195**	**108**	**–**
Multi-year variable remuneration (SPP)	**0**	**3,000**	**1,500**	**1,250**	**0**	**2,200**	**1,100**	**1,100**	**0**	**333**	**167**	**–**	**0**	**333**	**167**	**–**
2019 tranche (term: 2019 – 2022)	–	–	–	1,250	–	–	–	1,100	–	–	–	–	–	–	–	–
2020 tranche (term: 2020 – 2023)	0	3,000	1,500	–	0	2,200	1,100	–	0	333	167	–	0	333	167	–
Total variable remuneration	**0**	**4,980**	**2,600**	**2,350**	**0**	**3,559**	**1,855**	**1,823**	**0**	**528**	**275**	**–**	**0**	**528**	**275**	**–**
Total variable and fixed remuneration	**1,181**	**6,161**	**3,781**	**3,533**	**1,145**	**4,704**	**3,000**	**2,908**	**156**	**684**	**431**	**–**	**154**	**682**	**429**	**–**
Service cost	595	595	595	554	–	–	–	–	–	–	–	–	–	–	–	–
Total remuneration	**1,776**	**6,756**	**4,376**	**4,087**	**1,145**	**4,704**	**3,000**	**2,908**	**156**	**684**	**431**	**–**	**154**	**682**	**429**	**–**

1 Figures restated due to the change in the method used to state the bonus.

Benefits received	Rolf Martin Schmitz Chief Executive Officer since 15 October 2016		Markus Krebber Chief Financial Officer since 15 October 2016		Michael Müller Member of the Executive Board since 1 November 2020		Zvezdana Seeger Chief HR Officer / Labour Director since 1 November 2020	
€ '000	2020	2019	2020	2019	2020	2019	2020	2019
Fixed remuneration	1,160	1,160	800	763	108	–	108	–
Pension instalment	–	–	300	300	43	–	43	–
Fringe benefits	21	23	45	22	5	–	3	–
Total fixed remuneration	**1,181**	**1,183**	**1,145**	**1,085**	**156**	**–**	**154**	**–**
One-year variable remuneration (bonus)	**1,584**	**1,782**	**1,087**	**1,171**	**130**	**–**	**130**	**–**
Multi-year variable remuneration (SPP)	**2,500**	**1,538**	**1,975**	**494**	**–**	**–**	**–**	**–**
Payment from the 2016 tranche	–	1,538	–	494	–	–	–	–
Payment from the 2017 tranche	2,500	–	1,975	–	–	–	–	–
Total variable remuneration	**4,084**	**3,320**	**3,062**	**1,665**	**130**	**–**	**130**	**–**
Total variable and fixed remuneration	**5,265**	**4,503**	**4,207**	**2,750**	**286**	**–**	**284**	**–**
Service cost	595	554	–	–	–	–	–	–
Total remuneration	**5,860**	**5,057**	**4,207**	**2,750**	**286**	**–**	**284**	**–**

New Executive Board remuneration system as of 2021

As set out earlier, we refined our Executive Board remuneration system in order to bring it in line with the current statutory requirements and the expectations of our stakeholders. The new rules have been in force since 1 January 2021. We maintained the basic structure of the remuneration system. This means that Executive Board compensation still consists of fixed remuneration, the pension instalment, the performance-based bonus and the share-based payment. A detailed presentation of the new remuneration system can be found in the invitation to this year's Annual General Meeting, to which we will submit the system for approval. The invitation has been published at www.rwe.com/agm.

The following is a brief overview of some major new rules:

- In the future, share-based payments will orientate to two additional success factors: the carbon footprint of our generation portfolio and the relative total shareholder return, which puts the total return of the RWE share in relation to that of other European utility stocks. These two indicators and the development of net income of relevance to remuneration will determine how many of the conditionally granted performance shares are finally granted at the end of the performance period. This period, which in the past only comprised the fiscal year in question, will be extended to three years in the new remuneration system. Once it ends, all three criteria will be given equal weight in calculating the final grant. Thereafter, the performance shares must be held for a further year. Therefore, the vesting period will still be four years.
- A new element included in the remuneration system is the Shareholder Ownership Guidelines (SOGs) which serve to further align the interests of the Executive Board and the shareholders. The SOGs obligate the members of the Executive Board to have a minimum personal investment in RWE shares and to hold the shares during and two years after their tenure on the Executive Board. The personal investment quota is 100 % of annual gross fixed remuneration for ordinary Executive Board members and 200 % for the Chairman. Every year, at least 25 % of variable gross remuneration paid must be invested in RWE shares until the target amount is reached.
- Another major new feature is a clawback mechanism, which supplements the existing demerit rule. As set out in more detail on page 86, in the event of misconduct, an Executive Board member may be requested to return the variable remuneration already paid. The old malus rule did not go that far: it simply allowed SPP tranches that had not been paid yet to be reduced or withheld.

Since 2021, the employment contracts of Michael Müller and Zvezdana Seeger have reflected all the amendments to the remuneration system. This also applies to Markus Krebber as of 1 May 2021 when he becomes CEO. It was decided not to amend the conditions of the contract of Rolf Martin Schmitz, who will resign from the Executive Board at the end of April.