## EnBW at a glance

<table>
<thead>
<tr>
<th>Category</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total revenue</td>
<td>€19,694 m</td>
</tr>
<tr>
<td>Adjusted EBITDA</td>
<td>€2,781 m</td>
</tr>
<tr>
<td>Adjusted Group net profit</td>
<td>€683 m</td>
</tr>
<tr>
<td>Retained cash flow</td>
<td>€1,639 m</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Generation Portfolio</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Total</td>
<td>12,486 MW</td>
</tr>
<tr>
<td>Renewable Energies</td>
<td>4,865 MW (39%)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Infrastructure Data</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electricity grid</td>
<td>144,000 km</td>
</tr>
<tr>
<td>Gas grid</td>
<td>26,000 km</td>
</tr>
<tr>
<td>Customers</td>
<td>~5.5 m</td>
</tr>
<tr>
<td>Employees</td>
<td>24,655</td>
</tr>
</tbody>
</table>

## One of the largest German utilities
- Fully integrated utility in Germany
- Active in selected foreign markets
- Balanced risk-return profile
- Solid investment-grade ratings
- Stable shareholder structure

## Business segments

### Smart infrastructure for customers
- Sales of electricity and gas, billing services
- Installation and operation of critical infrastructure such as broadband, charging and urban infrastructure

### System critical infrastructure
- Transmission and distribution of electricity, gas and water and provision of grid-related services

### Sustainable generation infrastructure
- Generation of electricity from renewable energies (water, wind and solar) and conventional power plants, heat generation, gas storage, electricity and gas trading and system services

---

1 As of 31 December 2020
2 In relation to the profit / loss attributable to the shareholders of EnBW AG
3 As of 1 January 2021
## Financial and non-financial KPIs and targets

### Key financials

<table>
<thead>
<tr>
<th>KPI</th>
<th>Goal</th>
<th>2020</th>
<th>Target 2020</th>
<th>Target 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adjusted EBITDA</td>
<td>Secure profitability</td>
<td>€ bn</td>
<td>2.8</td>
<td>2.3 - 2.5</td>
</tr>
<tr>
<td>Internal financing capability</td>
<td>High level of financial discipline</td>
<td>%</td>
<td>102.8</td>
<td>&gt; 100</td>
</tr>
<tr>
<td>Debt repayment potential</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ROCE</td>
<td>Increasing group value</td>
<td>%</td>
<td>6.3</td>
<td>8.5 - 11.0</td>
</tr>
</tbody>
</table>

### Key non financials

<table>
<thead>
<tr>
<th>KPI</th>
<th>Goal</th>
<th>2020</th>
<th>Target 2020</th>
<th>Target 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td>Installed output of RE</td>
<td>Expand renewable energies (RE)</td>
<td>GW</td>
<td>4.9</td>
<td>5.0</td>
</tr>
<tr>
<td>Share of the generation capacity</td>
<td>%</td>
<td></td>
<td>39.0</td>
<td>&gt; 40</td>
</tr>
<tr>
<td>accounted for by RE</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>CO₂ intensity⁴,⁵</td>
<td>Climate protection</td>
<td>g/kWh</td>
<td>372</td>
<td>-15 to -20%</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>(reference year 2015: 606 g/kWh)</td>
<td>(reference year 2018)</td>
</tr>
<tr>
<td>EnBW Customer Satisfaction Index</td>
<td>Customer proximity</td>
<td></td>
<td>132</td>
<td>&gt;136</td>
</tr>
<tr>
<td>Yello Customer Satisfaction Index</td>
<td></td>
<td></td>
<td>159</td>
<td>&gt;159</td>
</tr>
<tr>
<td>People Engagement Index (PEI)³⁶</td>
<td>Engagement of employees</td>
<td></td>
<td>83</td>
<td>-</td>
</tr>
</tbody>
</table>

1 As of 31 December 2020
2 Following the transition to the growth strategy, the internal financing capability will be replaced by the new key performance indicator debt repayment potential from 2021 onwards. To achieve the unchanged goal of maintaining a solid investment-grade rating, EnBW regularly checks the 2025 target value for the debt repayment potential for managing its financial profile. This was stated in the Integrated Annual Report 2019 as >14%.
3 The adjusted target of >12% will allow the company to take advantage of opportunities for growth while simultaneously maintaining its solid investment-grade rating. The rating target will still be guaranteed by the new target value.
4 The four segments of Sales, Grids, Renewable Energies and Generation and Trading will become the three strategic business fields of “Smart infrastructure for customers,” “System critical infrastructure” and “Sustainable generation infrastructure” from 2021.
5 Includes redispatch deployment.
6 Nuclear generation is not included in the calculation for the key performance indicator CO₂ intensity. The CO₂ intensity including nuclear generation for the reporting year was 248 g/kWh (previous year: 235 g/kWh).
7 The performance indicator was reported for the first time in 2020 and replaces the Employee Commitment Index (ECI) as a key performance indicator.
8 There is no target value available for 2020. Variations in the group of consolidated companies (all companies with more than 100 employees are generally considered [except ITOs]).
9 Due to the extraordinary effects relating to the coronavirus pandemic in the year this key performance indicator was introduced, we may need to adjust this target value during the strategy period.
Market environment

EnBW at a glance ................................................................. 02

Market environment .......................................................... 05
› Market development
› Competitors
› Political environment
› Regulatory environment
› Contracting
› Broadband and telecommunications

Strategy .................................................................................. 34

Corporate sustainability ......................................................... 49

Business segments ..................................................................... 69

Key financials and non-financials .............................................. 126

Capital markets ....................................................................... 137

Corporate governance ............................................................ 150

Service .................................................................................... 156
Market developments

Power and gas grids

› Volatile electricity generation challenging to grid stability
› Expansion of...
› electricity transmission grid, especially HVDC
› electricity distribution grids, e.g. due to increase in e-mobility
› smart grids
› gas transmission grids in Baden-Württemberg due to higher demand
› Planning and development of hydrogen infrastructure

Generation and trading

› Expansion of renewable energies, especially solar and offshore wind in Germany
› Coal phase-out started in 2020 and will be completed by 2038 latest
› Increased CO₂ prices leading to fuel switch from coal to gas fired generation
› Conventional power stations increasingly in back-up role
› Commodity prices (gas and coal) on historically high levels, strong backwardation on forward markets
› Increasing electricity demand expected for the mid and long term

Customers

› Green energy continues to grow in importance. 47%1 of selected tariffs include green electricity or carbon offset gas (44%)1
› Continued strong commitment to eco-oriented providers
› Sustainability makes for high customer satisfaction and customer loyalty
› Most common reasons for switching are price increases by the previous provider and the prospect of a switching bonus
› Ongoing upward trend in e-mobility. The number of electric vehicle energy tariffs has increased by 60 to 1501 and KfW wall box subsidies have significantly boosted demand for wallboxes. The rollout of charging infrastructure also continues

Technological developments: More diversity, modularity and granularity in the energy system
New market participants: More competition and fragmentation of the value chain
Regulatory framework: Constant change following the transformation of the energy system

1 Source: Kreutzer Vertriebskanalstudie 2021
HVDC: High-voltage direct current transmission technology
The energy transition leads to increasing competition

Retail and customers – trends

- Growing price sensitivity, increasing environmental awareness and new competitors are leading to tougher competition. In some cases there have been takeovers, customer bases have been sold or players have exited the market.

- Lateral entrants, disruptive providers and intermediaries are increasingly competing for customers and market share.

- To make pure-play electricity and gas products more interesting or more emotional for customers, providers are increasingly supplementing their products with energy-related or non-energy-related services. Companies from outside the industry continue to be popular as sales partners.

- There is also an ongoing trend towards regional providers. 29%¹ of provider switchers are willing to pay a higher price; among existing customers this figure is as high as 37%¹.

- The pandemic made online sales channels even more important, especially comparison sites. 63%¹ of customers obtained information on such sites and 53%¹ used them to sign up for new energy contracts.

Strong competition:
Cumulative churn rate of retail customers in %

<table>
<thead>
<tr>
<th>Year</th>
<th>Electricity</th>
<th>Gas</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016</td>
<td>42.0</td>
<td>32.3</td>
</tr>
<tr>
<td>2017</td>
<td>42.6</td>
<td>33.2</td>
</tr>
<tr>
<td>2018</td>
<td>43.8</td>
<td>34.0</td>
</tr>
<tr>
<td>2019</td>
<td>46.0</td>
<td>36.0</td>
</tr>
<tr>
<td>2020</td>
<td>48.2</td>
<td>37.8</td>
</tr>
</tbody>
</table>

¹ Source: Kreutzer Vertriebskanalstudie 2020

Source: BDEW
Competitors along EnBW’s business segments

Development of the sector and competitive situation
Selection of international, national, regional and new competitors

Established competitors

<table>
<thead>
<tr>
<th>National and international</th>
<th>Regional</th>
<th>Commodity suppliers/solution suppliers/start-ups</th>
<th>Renewable energies</th>
<th>E-mobility, telecommunications and broadband</th>
<th>Financial investors</th>
</tr>
</thead>
<tbody>
<tr>
<td>ALPIQ, EDF, EDPR, Enel, Engie, E.ON, Equinor, EVN, Fortum, Iberdrola, Ørsted, RWE, Vattenfall, Verbund</td>
<td>Badenova, Entega, EWE, Mainova, MW, N-Ergie, SWM, Thüga</td>
<td>bliss.energy, Lichtblick, NEXT Kraftwerke, Sonnen, Stromio, Thermondo</td>
<td>BayWa r.e., Encavis, ENERTRAG, PNE Wind, theolia, wpd</td>
<td>1&amp;1, Allego, Deutsche Glasfaser, Deutsche Telekom, Ecotel, Fastned, Google, Ionity, Shell, Tesla, VW</td>
<td>Encavis, KGAL, Talanx</td>
</tr>
</tbody>
</table>

New competitors

EnBW position
- Further development from an integrated energy supplier to a sustainable and innovative infrastructure partner
- Focus on growth in renewable energies, grids and customer solutions (especially e-mobility, telecommunications and broadband)
- Active in Germany and selected foreign markets

Challenges
- Increasing competition due to entry of new market participants in the core business
- New competition due to market entry of EnBW in new business fields
- Optimal positioning with respect to the regulatory environment and highly competitive market
The Paris Agreement

- Adopted at the UN Climate Change Conference COP21 in December 2015 by the 196 Parties to the UN Framework Convention on Climate Change (UNFCCC)
- Established a global warming goal well below +2°C on pre-industrial average with efforts to limit warming to +1.5°C in 2100 in relation to pre-industrial levels
- Aims at achieving net-zero emissions in the second half of this century
- Defined a universal, legal framework where all countries develop and communicate their mitigation measures and "nationally determined contributions" (NDCs)
- World Climate Conference 2020 (COP26) in Glasgow was postponed due to COVID-19 and will instead take place from 31 October until 12 November 2021

Effect of current pledges and policies on global GHG emissions

Current pledges lead to global warming of roughly +3°C (not yet including the impact of tipping points\(^1\), which are likely to occur at temperature increases > 1.5°C)

\(^1\) A tipping point in the climate system is a threshold that, when exceeded, can lead to large changes in the state of the system. Potential tipping points have been identified in the physical climate system, in impacted ecosystems, and sometimes in both.

Source: Climate Action Tracker / Vox
Decarbonisation: EU regulatory framework

**EU 2020 goals**
-20% GHG emissions
20% RE in final energy consumption
20% Energy savings

**EU 2030 goals**
-55.0% GHG emissions
32.0% RE in final energy consumption
32.5% Energy savings

**The European Green Deal**: The new European Commission’s core programme

**Key goals**
- Achieve climate neutrality in Europe by 2050
- Industrial policy to secure sustainable economy and industry in terms of sustainable products and access to natural resources
- Protect habitats

**Core climate and energy policy measures**
- Climate neutrality by 2050
- 2030 targets raised (emissions -55%)
- Increased sector coupling and decarbonisation of gas sector (hydrogen strategy)
- Offshore wind strategy
- Renovation wave

**Target architecture status quo**

**Green Deal**

**Economic transformation for a sustainable future**
- Climate neutrality by 2050
- Clean, safe and affordable energy
- Mobilising research and innovation
- Preserving ecosystems and biodiversity
- Sustainable mobility
- Financing the transition
- Zero pollution target
- Circular economy
- Sustainable farming and food
- Leave no one behind

- **EU as global leader**
- **European Climate Pact**

**Emissions per sector in Green Deal scenario**
(Mt CO₂-equivalent)

- **EU 2020 goals**
  - 55.0% GHG emissions
  - 32.0% RE in final energy consumption
  - 32.5% Energy savings

- **EU 2030 goals**
  - 75.0% GHG emissions
  - 60.0% RE in final energy consumption
  - 50.0% Energy savings

---

1. Current proposal: Renewables share of at least 40% of gross final energy consumption by 2030
2. Current proposal: Increase of 2030 energy efficiency targets from 32.5% to 36%-39% for final and primary energy consumption
Decarbonisation: ‘Fit for 55‘ legislative files\(^1\)

‘Fit for 55‘-Package I\(^2\)

- EU Emissions Trading System Directive
- Energy Efficiency Directive
- Alternative Fuels Infrastructure Regulation
- Effort Sharing Regulation
- Renewable Energy Directive
- Regulation on Land Use, Land Use Change and Forestry
- CO\(_2\) Emission Performance Standards Cars Regulation
- Social Climate Fund

- EU Emissions Trading System Directive
  - More ambitious ETS to achieve emissions reductions of 61% by 2030, previously 43% (base 2005)
  - Extension of the ETS to maritime shipping and strengthening of the ETS for aviation
  - Introduction of a separate ETS for buildings and road transport from 2026 with a target of -43% by 2030 (base 2005)
  - Changes to ETS affecting energy sector and industry lead to significant tightening of emission reduction requirements

- Renewable Energy Directive
  - Increase of 2030 energy efficiency targets from 32.5% to 36%-39% for final and primary energy consumption
  - Obligation to annual savings in final energy consumption of 1.5% starting in 2024
  - Obligation of Member states to renovate at least 3% of the total area of all public buildings annually
  - New requirements for high-efficiency cogeneration
  - Requirements for specific heating and cooling systems

- Alternative Fuels Infrastructure Regulation
  - Set-up & operation of charging infrastructure in competition
  - Precise requirements for the mandatory expansion of the publicly accessible e-infrastructure
  - Distance based rules for the rollout of the electric infrastructure
  - Payment systems for ad hoc charging
  - Price differentiation between end customer (ad hoc) and e-mob. Provider only with justification

- Effort Sharing Regulation
  - Renewables share of at least 40% of gross final energy consumption by 2030 (previously 32%)
  - Higher targets for heating/cooling sector, district heating/cooling systems and change of target structure for the transport sector
  - New indicative target for renewables in the building sector of 49% by 2030
  - Industry: indicative target increase to 1.1%-pt annual share + mandatory: 50% of H\(_2\) (material and energy use in industry) via renewable fuels of non-biological origins (2030)
  - Criteria for renewable hydrogen
  - Stricter sustainability criteria for biomass

- Carbon Border Adjustment Mechanism
- Energy Taxation Directive
- RE Fuel aviation + maritime Regulations

Legislative procedures at least until end 2022/2023

\(^1\) As of 15 July 2021
\(^2\) Fit for 55 - Package II will be announced in December 2021

GHG: Greenhouse gas
## Decarbonisation: Political & regulatory environment in Germany

### German Climate & Energy Policy Goals

<table>
<thead>
<tr>
<th>Climate Protection Act 2021</th>
<th>Climate protection program 2030</th>
</tr>
</thead>
<tbody>
<tr>
<td>Establishes German climate protection targets by 2050 and sets a legal framework.</td>
<td>Target of 65% renewables in 2030 and target ranges specified for specific technologies are now legislated within the Renewable Energy Act 2021 (EEG 2021)</td>
</tr>
<tr>
<td>Climate neutrality by 2045 (instead of 2050) pursued as long term target. Annual sectoral emission budgets specified through to 2030</td>
<td>Coal phase-out by 2038 at the latest (Coal phase-out act). Reduction of coal-fired capacity from ~40 GW to 30 GW in 2022 and 17 GW in 2030.</td>
</tr>
<tr>
<td>Monitoring process for target attainment by 2030: If sectoral annual emission targets missed, department in charge has to submit an immediate action programme.</td>
<td>National CO₂ pricing system in transport and heating (BEHG) started in 2021 with fixed prices followed by a cap-and-trade system from 2026.</td>
</tr>
</tbody>
</table>

### Climate Protection Act was amended in 2021 after federal constitutional court ruled that the former act of 2019 was insufficient on behalf of the rights of coming generations

- 65% GHG emissions by 2030 (88% by 2040)
- 50% primary energy consumption by 2050

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EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
BEHG: Brennstoffemissionshandelsgesetz (Fuel Emissions Trading Act)
GHG: Greenhouse gas
Decarbonisation: National CO₂ pricing in transport and heating sector

New installations and measures needed for 65% target

Putting a price on CO₂ emissions in heating and transport sectors

› New act introducing national CO₂ pricing in transport and heating sector was adopted in autumn 2019 (Fuel Emissions Trading Act, known by its German abbreviation BEHG) and was enacted by 1 January 2021.

› Parties placing fossil fuels on the market have to pay a fixed price per ton of CO₂ until 2025, after which certificate trading will be phased in with a price corridor and volume limit.

› Almost all public revenue from BEHG to be used to reduce the surcharge under the Renewable Energy Sources Act and hence the cost of electricity.

› EnBW supports introduction of cross-sectoral CO₂ pricing system and implementation of higher price path in the Act, but at the drafting stage advocated a less complex approach incorporating a CO₂ component in energy taxes.

National CO₂ pricing adds incentives for sector coupling by increasing price for fossil fuels while cutting cost of climate-friendly electricity applications.

Cap and trade system from 2026 onwards.

Fixed price phase:
- No carryover year to year
- No market pricing
- No volume limit

Trading phase:
- Market pricing
- Price corridor at least in 2026
- Subsequently carryover year to year

Natural Gas:
(€25/t CO₂, 0.50ct/kWh)

- Fixed price (BEHG 2020)
- Minimum price
- Price corridor

2021 2022 2023 2024 2025 2026 2027 2028 2029 2030
€/t CO₂
German GHG emissions and emission targets by sector

<table>
<thead>
<tr>
<th>Sector</th>
<th>1990 (in mt CO₂ eq.)</th>
<th>2020¹ (in mt CO₂ eq.)</th>
<th>2030 (in mt CO₂ eq.)</th>
<th>2030 (reduction compared to 1990)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Energy</td>
<td>466</td>
<td>280</td>
<td>108</td>
<td>77%</td>
</tr>
<tr>
<td>Industry²</td>
<td>284</td>
<td>186</td>
<td>118</td>
<td>58%</td>
</tr>
<tr>
<td>Buildings</td>
<td>210</td>
<td>118</td>
<td>67</td>
<td>68%</td>
</tr>
<tr>
<td>Transportation</td>
<td>163</td>
<td>150</td>
<td>85</td>
<td>48%</td>
</tr>
<tr>
<td>Agriculture</td>
<td>90</td>
<td>70</td>
<td>56</td>
<td>38%</td>
</tr>
<tr>
<td>Waste and others</td>
<td>38</td>
<td>9</td>
<td>5</td>
<td>87%</td>
</tr>
<tr>
<td>Subtotal</td>
<td>1,213</td>
<td>804</td>
<td>433</td>
<td>64%</td>
</tr>
<tr>
<td>Total amount</td>
<td>1,251</td>
<td>813</td>
<td>438</td>
<td>65%</td>
</tr>
</tbody>
</table>

¹ Estimation
² Manufacturing companies
³ Base year 1990
GHG: Greenhouse gas

Energy industry must provide the largest share of GHG reductions (-77% compared to 1990), energy sector expected to be almost net carbon-neutral by 2040.

An accelerated expansion of renewables and entry into an international hydrogen market is needed.
Exit paths for lignite and hard coal: capacity targets in each target year

[market capacity in GW]

Competitive bidding for plants to be decommissioned

Statutory reduction mostly without state compensation

Hard coal
> Compensation for decommissioning determined via bids (only for decommissioning until 2027)\(^1\)
> Compulsory decommissioning possible for decommissioning from 2024 if auctions undersubscribed
> South German plants disadvantaged: Not eligible to take part in first auction, then bid made uncompetitive by percentage markup for system-relevance ("grid factor")
> Coal exit in the South primarily to be achieved by fuel switch
> From 2031: Forced decommissioning with no compensation under statutory reduction plan; exception: Economic assessment for "recent" plants commissioned from 1 January 2010; compensation then still possible

Lignite
> Decommissioning path and compensation based on individual negotiations with operators
> Major decommissionings just shortly before interim target dates (2022, 2030, 2038)

---

\(^1\) In bidding for target year 2027, bid volume to be determined = difference between starting level for target year 2027 and 2030 target level for hard coal capacity in electricity market.

Grid factor: Assessment by grid operators on the basis of the so-called network factor whether the respective plants are network-relevant, in order to then determine the order of awarding.
Renewable energy: Regulatory framework

Previous and required annual average net addition of renewable energies

[GW/p.a.]

<table>
<thead>
<tr>
<th>Energy Type</th>
<th>2018-2020</th>
<th>Climate Protection Act 2019</th>
<th>Climate Protection Act 2021¹</th>
<th>Gross new installs</th>
</tr>
</thead>
<tbody>
<tr>
<td>Photovoltaic</td>
<td>3.5</td>
<td>4.5</td>
<td>9.0</td>
<td></td>
</tr>
<tr>
<td>Onshore wind</td>
<td>1.4</td>
<td>5.0</td>
<td>3.0</td>
<td>3.0</td>
</tr>
<tr>
<td>Offshore wind</td>
<td>0.8</td>
<td>1.0</td>
<td>2.0</td>
<td></td>
</tr>
</tbody>
</table>

Climate Protection Act: RE needed by 2030

- In a scenario for 2030 with the 65% target, the German government expects slightly less than 655 TWh gross electricity demand
- Attaining that target would need about 426 TWh in renewables generation (now 38% or 225 TWh)

New installations and measures needed for 65% target

- **Offshore wind**
  - Increased 20 GW target is already politically agreed. Mid-term target of 40 GW offshore wind by 2040 is also planned.

- **Onshore wind**
  - By 2030, the decommissioning of at least 12 GW is expected to be required in addition to net additions
  - 95-100 GW required by 2030, current capacity additions too low by a factor of 4

- **Solar**
  - 65% target requires >140 GW installed capacity; that is ~9 GW/year in gross new installs (EnBW assumption: includes 5 GW in old installations going out of service)
  - Target attainment depends on: Increased land auction volume combined with sufficient land availability, existing installations kept in operation via small-scale direct marketing and more new installs on roofs and buildings

65% renewables target by 2030 - the regulatory measures adopted so far are not enough to attain it

¹ According to internal energy system analyses
Regulated grids business

Regulatory environment

- Electricity and gas transmission as well as distribution grids remain regulated, including in the long term, as a natural monopoly
- Regulatory risks manageable due to the increasing stability of the regulatory framework
- Revenue cap regulation enables grid revenues to remain independent of consumption fluctuations
- Pressure to be as efficient as possible ongoing due to regulation
- Diminishing investment conditions for transmission and distribution grids in the mid term
- In accordance with the Incentive Regulation Ordinance and electricity/gas Network Charges Ordinance, lower equity return rates will be set as of the fourth electricity regulatory period (from 2024) and gas (from 2023)
- Further amendments of Incentive Regulation Ordinance generally lead to no substantial change in the regulatory framework for transmission and distribution grid operators

Challenges for grids in Europe

Main challenges for grids:

- Electricity generation is becoming increasingly uneven – fluctuations have an impact on grid stability
- Many decentralised electricity generation plants connected to the grid – load flow reversals expected in some instances
- Coal-to-gas fuel switching leads to a great increase in demand for gas transport capacity
- Germany as a transit country – large proportion of cross-border trading

EnBW’s approaches to solutions:

- **TSOs:** New electricity transmission lines can bridge the distance between focal point of production and consumption centres; use of HVDC transmission lines and underground cables. Expansion of the gas transport network to cover capacity requirements
- **DSOs:** Expansion of the grids to integrate renewables and charging infrastructure for electric cars, smart expansion of distribution grids, efficient and swift expansion of the distribution grids by municipal partners

TSO: Transmission system operator
DSO: Distribution system operator
HVDC: High-voltage direct current transmission technology
<table>
<thead>
<tr>
<th>Organisation</th>
<th>Transmission grids</th>
<th>Distribution grids</th>
</tr>
</thead>
<tbody>
<tr>
<td>4 operators: 50Hertz, Amprion, TenneT, TransnetBW</td>
<td>380 kV, 220 kV (ultra high voltage)</td>
<td>up to 110 kV (high/medium/low voltage)</td>
</tr>
<tr>
<td>Grid length: ~37,300 km(^1)</td>
<td>Distribution grids</td>
<td>874 operators(^1)</td>
</tr>
<tr>
<td>Grids owned by operators</td>
<td>up to 110 kV (high/medium/low voltage)</td>
<td>Grid length: ~1,994,400 km(^1)</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Franchises issued by municipalities</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Competition for franchises</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Tasks</th>
<th>Transmission grids</th>
<th>Distribution grids</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ensuring balance between generation and consumption</td>
<td>Transport of wind-generated electricity from northern to southern Germany</td>
<td>Connecting consumers and local providers</td>
</tr>
<tr>
<td>Using balancing power</td>
<td>Building new high voltage direct current transmission lines using underground cables</td>
<td>Recording incidents and troubleshooting</td>
</tr>
<tr>
<td></td>
<td>Connecting offshore wind farms</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Challenge of the energy transition</th>
<th>Transmission grids</th>
<th>Distribution grids</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transport of wind-generated electricity from northern to southern Germany</td>
<td>Functional and financial unbundling of the grid business and obligation as to non-discriminatory use of grid information</td>
<td></td>
</tr>
<tr>
<td>Building new high voltage direct current transmission lines using underground cables</td>
<td></td>
<td></td>
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<tr>
<td>Connecting offshore wind farms</td>
<td></td>
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</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Unbundling regulations</th>
<th>Transmission grids</th>
<th>Distribution grids</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ownership unbundling, independent transmission operator</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

\(^1\) Source: "Monitoringbericht 2020, as of 1 March 2021", BNetzA
Electricity grids are the backbone of the energy transition

Electricity grids

General
› The electricity grid business has become a growth business due to the remodelling of the energy market
› Changes in legislation have simplified reimbursement for costs of investment in grids: e.g. revision of the Incentive Regulation Ordinance (ARegV)

Transmission grids
› Growing geographical imbalance between generation and consumption as main driver for transmission grids – primarily construction of high voltage direct current transmission lines and connection to offshore wind farms

Distribution grids
› Feed-in growing due to local generation
› Still strong trend back to municipal ownership (large share of concessions already extended)

Source: Federal requirements plan, second draft network development plan 2035 (version 2021), BMWi distribution grid study 2014, own estimates
Regulated grids business:
German electricity transmission grid ultra high voltage expansion

German AC/DC approved additional lines, rewiring and reinforcement

4,400 km upgrading in existing line routes
  › AC – reinforcement/rewiring: ~4,100 km
  › DC – rewiring: ~300 km

3,450 km grid expansion in new line routes
  › AC – new lines: ~350 km
  › DC – new lines: ~2,850 km
  › DC – new IC-lines: ~250 km

Existing transmission grid to be expanded by ~20% until 2030 over current grid length (2021)

Source: "Netzentwicklungsplan Strom 2019-2030: Bestätigung", BNetzA

1 Excluding Offshore-park connection development
2 Source: "Netzentwicklungsplan Strom 2019-2030: Bestätigung", BNetzA
### Comparison of gas transmission and distribution grids in Germany

#### Transmission grids

<table>
<thead>
<tr>
<th>Organisation</th>
</tr>
</thead>
</table>
| 16 grid operators
| Grid length: ~33,600 km
| Grids owned by operators
| One market area as of 1 October 2021 (NetConnect Germany and Gaspool merge in Trading Hub Europe)

<table>
<thead>
<tr>
<th>Tasks</th>
</tr>
</thead>
<tbody>
<tr>
<td>Transport gas from import to export points (transit) and vice versa (DSOs and industry or other market areas)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Challenge of the energy transition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Long term: potential use of synthetic gas (i.e. hydrogen) as storage medium for fluctuating electricity generation</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Unbundling regulations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ownership unbundling, independent transmission operator</td>
</tr>
</tbody>
</table>

#### Distribution grids

<table>
<thead>
<tr>
<th>Organisation</th>
</tr>
</thead>
</table>
| 704 grid operators
| Grid length: ~522,100 km
| Franchises issued by municipalities
| Competition for franchises

<table>
<thead>
<tr>
<th>Tasks</th>
</tr>
</thead>
</table>
| Connecting consumers and local providers
| Recording incidents and troubleshooting |

<table>
<thead>
<tr>
<th>Challenge of the energy transition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Integration of biogenic and synthetic gases</td>
</tr>
<tr>
<td>Degree of utilisation decreases if electric heating systems and district heating systems increase</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Unbundling regulations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Functional and financial unbundling of the grid business and obligation as to non-discriminatory use of grid information</td>
</tr>
</tbody>
</table>

---

1 Source: Monitoringbericht 2020, as of 1 March 2021, BNetzA

DSO: Distribution system operator
Gas grids are a major element of the energy transition

Transmission grids
› Increasing capacity requirements from changes in regulatory environment: Switch in the market from L-gas to H-gas (approx. half of L-gas from Netherlands to be replaced by H-gas from Russia/Norway by 2025)
› In addition, the capacity requirement increases due to the coal-to-gas fuel switch and the oil-to-gas fuel switch in the heating sector

Distribution grids
› Smaller scale of expansion compared to electricity grids
› Growth potential due to the connection of new gas fired power plants

Hydrogen grids
› Hydrogen grids for at least industry and transportation intended by the EU
› Regulatory framework to be defined

Expansion of the gas transmission grids in Germany until 2030

<table>
<thead>
<tr>
<th>Compressors</th>
<th>Transportation lines</th>
</tr>
</thead>
<tbody>
<tr>
<td>(in MW)</td>
<td>(in km)</td>
</tr>
<tr>
<td>Status 2018</td>
<td>Increase</td>
</tr>
<tr>
<td>2,780</td>
<td>~3,200</td>
</tr>
<tr>
<td>Status 2019</td>
<td>Increase</td>
</tr>
<tr>
<td>33,600</td>
<td>1,594</td>
</tr>
</tbody>
</table>

2020-2030: Investment of ~€7.8 bn in transmission grids in Germany

1 Source: Gas network development plan 2020-2030
2 Source: Monitoringbericht 2020, as of 1 March 2021, BNetzA
L-gas: low calorific gas H-gas: high calorific gas
Following the introduction of incentive regulation in 2009, grid operators are called upon to continuously improve the efficiency and cost-effectiveness of grid investment and grid operation.

Key regulatory parameters such as return on equity and the costs recognised for a network operator are set for a several-year regulatory period.

The costs to be recognised for grid operators are determined in each base year for the following regulatory period.
Regulated grids business: Return on new systems for the 3rd regulatory period

**Equity-I <= 40%**

- Return on Equity-I: 5.64% after corporate tax, after trade tax
- Base rate: 2.49%
- Risk premium: 3.15%

  **Factor accounting for corporate tax:** 1.225

  **Return on Equity-I:** 6.91% before corporate tax, after trade tax

  **Factor accounting for trade tax:** 1.1365

  **Return on Equity-I:** 7.85% before corporate tax, before trade tax

  **Weighted rate of return before corporate tax, before trade tax:** 5.21% 5.00%

  **Return on Equity-II:** 3.03% before corporate tax, after trade tax

  **Factor accounting for trade tax:** 1.1365

  **Return on Equity-II:** 3.44% before corporate tax, before trade tax

  **Weighted rate of return before corporate tax, before trade tax:** 3.09%

**Equity-II >40%**

- Return on Equity-II: 3.03% before corporate tax, after trade tax
- 10-year average over Bundesbank interest rate series

- Return on Equity-II: 3.44% before corporate tax, before trade tax

  **Factor accounting for trade tax:** 1.1365

  **Weighted rate of return before corporate tax, before trade tax:** 3.09%

- Capital employed in excess of this amount is subject to the Equity-II rate of return.

---

1 At tax rate 3.50% and multiplier 3.90%

Irrespective of the actual financing structure, a maximum of 40% of capital employed is subject to the Equity-I rate of return as this is capped at 40% of equity by law (Electricity/Gas Network Charges Ordinance)
Regulated grids business: Return on new systems for the 4th regulatory period

Equity-I  \(\leq 40\%\)

- Return on Equity-I: 4.13\% after corporate tax, after trade tax
- Base rate: 0.74\%
- Risk premium: 3.39\%

\[\text{Factor accounting for corporate tax: 1.226}\]

\[\text{Return on Equity-I: 5.07\% before corporate tax, after trade tax}\]

\[\text{Factor accounting for trade tax: 1.1365}\]

\[\text{Return on Equity-I: 5.76\% before corporate tax, before trade tax}\]

\[\text{Weighted rate of return before corporate tax, before trade tax: 3.70\%}\]

\[\text{Factor accounting for trade tax: 1.1365}\]

\[\text{Return on Equity-I: 6.56\% before corporate tax, before trade tax}\]

- Irrespective of the actual financing structure, a maximum of 40\% of capital employed is subject to the Equity-I rate of return as this is capped at 40\% of equity by law (Electricity/Gas Network Charges Ordinance).
- Capital employed in excess of this amount is subject to the Equity-II rate of return.

Equity-II  \(>40\%\)

- Return on Equity-II: 2.04\% before corporate tax, after trade tax
- Base rate: 0.74\%
- Risk premium: 3.39\%

\[\text{Factor accounting for trade tax: 1.1365}\]

\[\text{Return on Equity-II: 2.32\% before corporate tax, before trade tax}\]

\[\text{Factor accounting for trade tax: 1.1365}\]

\[\text{Return on Equity-II: 2.89\% before corporate tax, before trade tax}\]

- At tax rate 3.50\% and multiplier 3.90\%
- Subject to slight changes since 10-year average includes monthly values of Oct, Nov and Dec 2021 that are not available at the time of publication

\[\text{10-year average over Bundesbank interest rate series}\]

\[\text{Gas}\]

\[\text{Electricity}\]

\[\text{Gas}\]

\[\text{Electricity}\]
German electricity market: Installed capacity and generation

Installed capacity (in GW)

<table>
<thead>
<tr>
<th>Year</th>
<th>Nuclear power</th>
<th>Conventional thermal power plants and other</th>
<th>Renewable energies</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016</td>
<td>11</td>
<td>89</td>
<td>104</td>
</tr>
<tr>
<td>2017</td>
<td>11</td>
<td>87</td>
<td>113</td>
</tr>
<tr>
<td>2018</td>
<td>10</td>
<td>86</td>
<td>118</td>
</tr>
<tr>
<td>2019</td>
<td>10</td>
<td>85</td>
<td>124</td>
</tr>
<tr>
<td>2020</td>
<td>8</td>
<td>86</td>
<td>131</td>
</tr>
</tbody>
</table>

Generation\(^1\) (Gross power generation in billion kWh)

<table>
<thead>
<tr>
<th>Year</th>
<th>Nuclear power</th>
<th>Conventional thermal power plants and other</th>
<th>Renewable energies</th>
</tr>
</thead>
<tbody>
<tr>
<td>2016</td>
<td>13%</td>
<td>58%</td>
<td>29%</td>
</tr>
<tr>
<td>2017</td>
<td>12%</td>
<td>55%</td>
<td>33%</td>
</tr>
<tr>
<td>2018</td>
<td>12%</td>
<td>53%</td>
<td>35%</td>
</tr>
<tr>
<td>2019</td>
<td>12%</td>
<td>48%</td>
<td>40%</td>
</tr>
<tr>
<td>2020</td>
<td>11%</td>
<td>44%</td>
<td>45%</td>
</tr>
</tbody>
</table>

Source: BDEW, April and July 2021

\(^1\) May not add up to 100% due to rounding
German electricity market

Forward price for baseload electricity
(in €/MWh)

Clean-dark-spread base¹
(in €/MWh)

→ Gross margin of a coal-fired power plant
   (plant efficiency: 36%)

Clean-spark-spread peak²
(in €/MWh)

→ Gross margin of a gas-fired power plant
   (plant efficiency: 50%)

¹ Clean-dark-spread is the corresponding indicator for coal-fired generation of electricity
² Clean-spark-spread represents the net revenue a generator makes from selling power, having bought gas and the required number of carbon allowances
German gas market: Front month price and spot market development

Front month reference prices\(^1\)
[in €/MWh]

Spot market reference prices\(^1\)
[in €/MWh]

\(^1\) Average of Gaspool and NetConnect Germany (NCG); starting 1. October 2021 Trading Hub Europe (THE)
German electricity market: Electricity price

Electricity price for private households 2021

Average electricity price for a 3-person household
(Annual consumption of 3,500 kWh)
(€ cents/kWh)

<table>
<thead>
<tr>
<th>Year</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
</tr>
</thead>
<tbody>
<tr>
<td>Price</td>
<td>29.3</td>
<td>29.5</td>
<td>30.5</td>
<td>31.8</td>
<td>31.9</td>
</tr>
</tbody>
</table>

Source: German Federal Association of Energy and Water Management (BDEW), figures as of June 2021
EEG: Erneuerbare Energien Gesetz (Renewable Energy Act)
CHP: cogeneration combined heat and power
1. Average concession fee; varies according to size of community

Figures as of June 2021
Source: BDEW
Energy prices in Germany

Prices indexed to the year 2015

Electricity consumption in Germany

Net electricity consumption declining in 2020 mainly driven by pandemic lockdowns and subsequent economical downturn

Source: BDEW
Gas price for single-family home 2020

<table>
<thead>
<tr>
<th>Category</th>
<th>2017</th>
<th>2018</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
</tr>
</thead>
<tbody>
<tr>
<td>Regulated network user charges</td>
<td>2.65</td>
<td>2.77</td>
<td>3.06</td>
<td>2.84</td>
<td>2.55</td>
</tr>
<tr>
<td>Taxes and franchise fees</td>
<td>1.59</td>
<td>1.53</td>
<td>1.55</td>
<td>1.60</td>
<td>1.64</td>
</tr>
<tr>
<td>Network user charges, including metering</td>
<td>1.53</td>
<td>1.56</td>
<td>1.56</td>
<td>1.53</td>
<td>1.51</td>
</tr>
<tr>
<td>Procurement and sales</td>
<td>1.49</td>
<td>1.51</td>
<td>1.56</td>
<td>1.53</td>
<td>0.46</td>
</tr>
</tbody>
</table>

The CO2 price reflects the cost of purchasing CO2 emission trading certificates in accordance with the Fuel Emissions Trading Act (BEHG) and is fixed by law until the end of 2025.

1 Average net network user charge including charges for metering, metering station operation and billing, subject to large regional variation, figures as of July 2021; Source: BDEW

2 Most heating gas customers are customers on contract with the regional default supplier with a reduced concession fee (0.03 ct/kWh); figures as of June 2021; Source: BDEW
Contracting: Commodities and services from a single source

German contracting market

Total annual revenue, mean figures from market analyses (in € m)

- 2016: 7,800
- 2018: 7,900
- 2020: 8,200

- Highly fragmented market with approx. 500 providers, most without primary focus in terms of customer segments and media; occasional takeovers

Five main provider groups

- Contracting subsidiaries of major energy groups (e.g. E.ON, MVV Energy Solutions)
- Building systems providers/facility management service providers (e.g. Techem and Engie)
- Municipal utilities
- Independent contractors (e.g. Getec)
- Component manufacturers (e.g. Siemens/Bosch)

EnBW’s main competitors are energy groups’ subsidiaries and independent contractors (similar capability portfolio and national presence)

Key market trends and developments

- Steady growth – in revenue terms, industry the most important segment, housing sector gaining
- Increased complexity due to frequent regulatory changes

- Focus on core business – increased outsourcing of energy solutions
- Rising demand for integrated solutions, e.g. going beyond energy generation to energy distribution, and increasingly media combinations and energy-related services
- Increasing demand for CO₂-free solutions due to increased ambition in national/international climate protection targets

- Still custom solutions, increasing standardisation/modularisation and digitalisation
- Expansion of sales and local presence, increasingly in cooperation

Market and customer trends require contracting providers to adjust their capability portfolios, mostly in terms of CO₂-free solutions, media mix, increased versatility and additional services

---

Broadband and telecommunications market: Strong growth in the next years

Development of broadband fibre market:
Profit pool: “broadband fibre” telco-sub market
(EBITDA in € m)

- Disproportionate growth in fibre optic expansion [up to approx. €11 bn in 2040]
- From 2030, increasing shift from DSL to fibre [share grows to approx. 45% in 2040]
- Fibre optic expansion by 2040 with an expected capex of approx. €62 bn

Rising data rates
Data volume per fixed line subscriber in Germany
(gigabytes per month)²

- >75% of all users need at least 50 Mbit/s download speed
- >75% of all users need at least 500 Mbit/s download speed
- Large proportion of users require >1 Gbit/s data rate

In parallel: Federal government provides subsidies of >€12 bn (with a subsidy rate of >90%) to further accelerate growth

EnBW provides services spanning the entire value chain

- Rollout and provision of passive infrastructure
- Rollout and provision of active network
- Provision of services
- Provision of additional services

Optical fibre is the only technology that can deliver the bandwidth needed

Telecommunications strategy is integral to our strategy

Source: Wissenschaftliches Institut für Infrastruktur und Kommunikationsdienste, BMVI, BREKO Verband
² Data without Corona-effect
Strategy

EnBW at a glance ................................................................. 02

Market environment .......................................................... 05

Strategy ................................................................. 34
  › Climate neutrality
  › EnBW strategy
  › Gas strategy
  › Main shareholdings
  › B2C strategy
  › Contracting
  › HR strategy
  › Innovation
  › Digitisation
  › Research and development

Corporate sustainability .................................................. 49

Business segments ......................................................... 69

Key financials and non-financials ...................................... 126

Capital markets ............................................................. 137

Corporate governance .................................................... 150

Service ................................................................. 156
Climate neutrality by 2035 is key principle behind EnBW’s transformation into a sustainable and innovative infrastructure partner

Reduction of CO₂ emissions to net zero

2018
Base year: 17.6 mt CO₂

2030
-50%

2035
-100%

Midterm target 2025
Reduce CO₂ intensity by
Base year 2018 - 553 g / kWh
-15% to -30%

2025 Strategy: EnBW as an innovative infrastructure partner

**Smart Infrastructure for Customers**
Sales
- Electricity and gas sales
- E-mobility, telecommunications & broadband, PV and energy storage systems

**System Critical Infrastructure**
Grids
- Electricity distribution grids: Integrating renewables and e-mobility
- Electricity transmission grids: Suedlink & Ultranet
- Gas grids: H₂ readiness expected by 2040

**Sustainable Generation Infrastructure**
Renewable Energies, Generation & Trading
- Renewable Energies: Expansion of wind onshore, offshore, PV
- Thermal generation: Nuclear exit 2022, coal exit 2035, fuel switch (expansion of climate-neutral gases)
- Trading

---

1 EnBW’s climate neutrality target relates to own emissions (Scope 1 and 2). Target relates to CO₂ eq (CO₂, CH₄, N₂O and SF₆). Base year 2018. Includes some offsetting of remaining residual emissions by purchase of recognised offsetting certificates.

2 Includes redispatch deployment. Nuclear generation is not included in the calculation for the key performance indicator CO₂ intensity.
Adjusted EBITDA growth
(in € bn)

- Sales: 2.8 (2020) to 3.2 (Target 2025)
- Grids: 1.3 (2020) to 1.3 (Target 2025)
- Renewable Energies: 0.8 (2020) to 1.3 (Target 2025)
- Generation & Trading: 0.4 (2020) to 1.3 (Target 2025)

Investment volume 2021-2025
(in € bn)

- 80% growth
- € ~12 bn

KPI to manage financial profile
Debt repayment potential\(^1\) >12%

\(^1\) Retained Cashflow / Net debt; regularly reviewed in line with the requirements of the rating agencies to maintain a solid investment-grade rating
Sustainable generation infrastructure: Expansion of renewable energies is a major driver

Renewable energies

Targets 2025
› Share of generation capacity > 50%
› Wind onshore and offshore 4 GW
› Solar 1.2 GW

Conventional

Coal exit 2035
› Coal 35% of generation capacity and 23% of generation volume (2020)

Nuclear exit 2022
› 10% of generation capacity (2020)

Reserve power plants
› 1.7 GW\(^1\) until 2023

Fuel switch where possible
› Stakeholder dialogue for several hard coal sites planned

Trading

› 2021 generation position fully hedged one year in advance

Strategic dimensions
› Regional expansion into CWE and Nordics
› Extension of product range e.g. LNG\(^2\)
› Two PPA\(^3\) over 15 years with Energiekontor in 2019 and 2021
› 150 MW PPA for three solar parks signed with Blue Elephant Energy
› Smart and digital trading strategies

\(^1\) Not included in EnBW’s generation portfolio, \(^2\) LNG: Liquified natural gas, \(^3\) PPA: Power purchase agreement
System-critical infrastructure: Focus on grids is crucial for a successful energy transition

Electricity distribution grids
Integration of renewables and e-mobility

**Partnership approach of Netze BW**
- Second investment phase ended 30 June 2021
- 214 municipalities
- Shareholding in Netze BW of around 14%

Electricity transmission grids
Expansion of networks to transmit electricity generated in the windy north to southern Germany
- SuedLink 2 x 2 GW, > 600 km [TransnetBW, TenneT]
- ULTRANET 2 GW, 340 km, 40 km under TransnetBW [TransnetBW, Amprion]

Gas grids
H₂ readiness expected by 2040

**Transmission grids (10,000 km)**
- Acquisition of Gas-Union Transport – extension of gas grid (~550 km)²
- Planning of natural gas pipeline in South-Germany (~250 km) to meet rising demand²
- EUGAL¹ - completion in Q2 2021 (~480 km)³

**Distribution grid Netze BW (16,000 km)**
- Project “H₂ island” already delivers climate-friendly supply

---

¹ European Gas Pipeline Link; 480 km from the Baltic Sea to the German-Czech border, 16% participation of Ontras
² terranets bw
³ Ontras
Smart infrastructure for customers
Sustainable engagement for our customers

Electricity and gas
- Yello brand: Switch to sustainable product portfolio
- EnBW brand: Conclusion of green electricity contracts only for new B2C customers on enbw.com
- Among top 3 home electricity storage suppliers in Germany
- Acquisition of Gas-Union
- Digital business models and improvements in cost efficiency

E-mobility
- Market leader in quick-charging in Germany
- Over 600 locations
- Target 2021: > 1,000 locations
- Construction of further HyperHubs throughout Germany
- EnBW mobility+
  - No.1 e-mobility app in Germany
  - Over 200,000 charging points in 9 countries

Broadband/Telecommunication
- Fibre infrastructure combined with product and service portfolio

Plusnet (telecommunications provider)
- > 25,000 business customers
- Network with 100 Gbit/s bandwidth
- Post merger integration process completed

NetCom BW
- ~65,600 customers [9,250 B2B]
- ~16,600 km of fibre optic cable
**Gas strategy: Transformation of gas business to become a top player in climate-neutral gases in Germany**

**EnBW target vision for climate-neutral gases**

- EnBW currently top 3 market player in natural gas business
- Gradual transformation towards business with climate-neutral gases as contribution to climate neutrality targets
- EnBW is active in all segments along the climate-neutral gas value chain
  - Top player in production of biogas/biomethane in Germany; production of green hydrogen linked to EnBW Renewable Energies
  - Operation of H₂-ready transmission and distribution grids
  - Cost leader in operation of hydrogen storage
  - Significant import and trading portfolio
  - Sales of primarily climate-neutral gases

**Selected hydrogen projects**

- **H₂ Whylen Real-World Lab**
  - Generation of green H₂ from run-of-river hydropower
  - Utilises electrolysis waste heat
  - Generating capacity: up to 7 MWₑ
  - Planned start-up: 2024 (1 MWₑ already on stream)

- **Bad Lauchstädt Real-World Lab**
  - Integrated project along the entire value chain
  - Industrial use of H₂
  - Generating capacity: 30 MWₑ
  - Planned start-up: 2024

- **Öhringen Hydrogen Island**
  - Produced using renewable energy
  - H₂ used in admixture to supply company operations centre; expansion to include 21 residential buildings
  - Generating capacity: 300 kWₑ
  - In operation since 2021

Use of hydrogen in large-scale EnBW power plants for power grid stability and climate-neutral district heating
EnBW’s main shareholdings

- **Stadtwerke Düsseldorf AG**
  - Düsseldorf
  - 54.95% capital share
  - €189.3 m adjusted EBITDA

- **Pražská energetika Holding a.s.**
  - Prague
  - 41.40% capital share
  - €172.9 m adjusted EBITDA

- **VNG AG**
  - Leipzig
  - 74.21% capital share
  - €249.8 m adjusted EBITDA

- **Borusan EnBW Enerji yatırımları ve Üretim A.S.**
  - Istanbul
  - 50.00% capital share
  - €99.6 m adjusted EBITDA

1. Directly and indirectly held shares.
2. Shares held directly and indirectly through Prażska Energetika Holding a.s.; PRE fully consolidated according to a consortium agreement with the City of Prague.
3. Not fully consolidated, accounted for using the equity method.

Additional energy-related home infrastructure services with an eco system approach

Future focus

Today’s focus

 › B2C commodity sales remain a key element. Consistent expansion of household and multi-contract customers will be necessary.

 › Increasing importance of PV/storage and e-mobility drives even deeper integration into the customer household.

 › Further development and integration of telecommunication products, MSB (metering) or heat conceivable in the future.

Consistent continuation of the customer household approach with a focus on energy and energy-related issues.
Contracting: Capability portfolio and examples

EnBW among the top 5 contracting providers in Germany

<table>
<thead>
<tr>
<th>Customers</th>
<th>Contracts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Industry</td>
<td>200 plants under contract</td>
</tr>
<tr>
<td>Housing sector</td>
<td></td>
</tr>
<tr>
<td>Public sector</td>
<td></td>
</tr>
</tbody>
</table>

Regions

| Germany (housing sector currently Baden-Württemberg and selected regions) |

Product/service portfolio

- **Main focus**: Design-build-operate-finance services for distributed energy systems under energy supply/energy performance contracting
  - Wide range of plant types (including large complex plants, currently up to 100 MWth)
  - Integrated single-source packages, custom tailored
  - Packages linked with additional services such as direct marketing, energy efficiency optimisation, charging infrastructure, photovoltaics/storage systems
  - Operation management and efficient system management e.g. optimisation of system operation
  - Additional services such as networks and energy efficiency

Media

- Heat (hot water, steam), refrigeration, CHP, compressed air, ventilation

Systems/technologies

- CHP plants, boilers, refrigeration systems, gas turbines, compressed air systems, ventilation systems, photovoltaic systems, heat pumps

- Overall responsibility for provision of compressed air including operational management
- Takeover and overhaul of existing plant; additional measures

- Duration 10 years

Customer and starting situation

Industry

- Leading manufacturer of alloy wheels
- Facility in North Rhine-Westphalia
- Contracting agreement expiring; desire for new provider

Municipality

- Community in south of Stuttgart
- Building complexes with schools, rescue centre, child daycare centre/preschool, etc.
- Desire for integrated heating concept including new systems

Project description

- Overall responsibility for heating provision including design, build and operation
- Construction of replacement district heating (CHP) plants, expansion of district heating system
- Additional efficiency measures, e.g. renewal of ventilation systems

- Duration 10 years + 2 five-year extension options

Business area continuously built up over 20 years, positioned as established contracting provider in Germany
EnBW’s transformation to an innovative and sustainable infrastructure provider depends among other things on the further development of the workforce.

People-centred transformation provides the necessary framework for strategic skills development, learning new methods and integrating new working environments.

The company we shape stands out for self-organisation, flexibility, borderless collaboration, boldness, innovation, growth and diversity by putting people at the centre.

The focus is on people in their key role for business success and as ‘architects’ of their own development.
Innovation¹

Pre-Seed
- Power2Cloud
- Stromrevolution
- e.Movation
- Zählerfreunde

Seed
- Switchboard
- climo

Startup
- PARCONOMY

Scale
- SMIGHT
- WTT Campus ONE
- VIRTUELLES KRAFTWERK
- CHARGEnow (formerly ChargeHere)
- Ben (formerly Bike & Ped
- FoxInsights
- DZ4

Teams adopted by Group:
- vidlytics
- time2charge
- SANDY
- detACT
- NOYSEE
- energybase

61 projects since launch [16 September 2014]
- 15 projects adopted
- 7 projects active in incubation phase
- 7 projects in scale phase
- 32 projects stopped

Over 60% revenue increase from 2019 to 2020
The first scaling team also broke even in 2020

¹ As of 1 July 2021
Venture capital investments in innovative start-ups

EnBW New Ventures is the open innovation connection between start-ups and EnBW Group

- Win-win for both sides, with EnBW New Ventures operating as professional venture capital investor
- Start-ups gain access to EnBW’s energy market expertise and to EnBW customers and suppliers
- EnBW benefits from fast innovation cycles and growth options
- Cooperative approach to foster business with products and services based on innovative business models

EnBW New Ventures follows an active portfolio approach

- Evergreen Venture Capital investor with total investment amount of €100 m
- Secure minority shareholdings of between 10% and 30% in up to 20 start-ups, with an investment period of four to eight years in each case
- Open for syndication in a traditional venture capital approach

The start-ups that we invest in engage and scale with EnBW in its transformation towards becoming a sustainable and digital infrastructure operator

- 11 start-ups and 1 fund-of-fund investment

1 As of 1 August 2021

1 exit and 1 majority takeover EnBW

Lumenaza
- Successful exit 5 years after initial investment
- Collaboration with several EnBW entities, such as ESW and VPP, established and continued

DZ-4
- Majority takeover EnBW 6 years after initial investment – fit to EnBW’s growth strategy
- Collaboration with several EnBW entities such as Yello Solar and Senec
## Digitisation within EnBW

<table>
<thead>
<tr>
<th>Value chain</th>
<th>Impact</th>
<th>Relevant dimensions</th>
<th>Focuses</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CORE BUSINESS</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Generation</td>
<td></td>
<td></td>
<td>Increased availability</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Predictive maintenance</td>
</tr>
<tr>
<td>Trading</td>
<td></td>
<td>Products &amp; processes</td>
<td>Automated trading</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Improved forecasting</td>
</tr>
<tr>
<td>Grids</td>
<td></td>
<td>Technology</td>
<td>Optimisation of maintenance</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Modern customer interaction</td>
</tr>
<tr>
<td>Sales &amp; Operations</td>
<td></td>
<td>People &amp; organisation (methods)</td>
<td>Development of digital competencies through training / further education and new talent from external sources</td>
</tr>
<tr>
<td>E-mobility, virtual power plant, smart cities, quarter development</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### Focus Areas:

- **Increased availability**
- **Predictive maintenance**
- **Automated trading**
- **Improved forecasting**
- **Optimisation of maintenance**
- **Modern customer interaction**
- **New products**
- **Digital customer experience**
- **Digital business models**
- **Interconnection of customers and systems**

#### Notes:

- Comprehensive update made on EnBW's digitisation agenda
- More than 600 employees actively involved in digital initiatives all across EnBW
- 40+ initiatives around artificial intelligence, blockchain and internet of things
Research and development: Creating know-how for new opportunities

Learning by doing: Pilots and demonstrations focussed on
- Sustainable energy provision, in particular offshore wind and green hydrogen
- Future e-charging technologies
- Emerging and game-changing technologies
- Critical infrastructure

Future skills for new business opportunities
- New skills for the energy business of tomorrow
- Increase reputation with exciting R&D portfolio
- Win new employees with challenging R&D-projects

Research and development builds capacity for future business opportunities.
Generated through pilot and demonstration projects
Example: Offshore wind farms for deeper sea regions

Expenditure on research, development and innovation (in € m)

Request
- Wanted: how to redesign wind farms for floating off-shore operation in deeper seas

Research
- Studies and demonstration projects together with business units, customers and suppliers

Commercial approach prepared
- Capacity building
- Reliable basis for commercial propositions
- Early-stage strategic collaborations

EnBW Factbook 2021
Corporate sustainability

EnBW at a glance .............................................................................................................. 02

Market environment ........................................................................................................ 05

Strategy .......................................................................................................................... 34

Corporate sustainability ................................................................................................ 49
  › ESG
  › Sustainability ratings
  › 25-points sustainability programme
  › Integrated reporting
  › Sustainable finance activities
  › EU taxonomy
  › Supply chain sustainability
  › Decarbonisation
  › Climate neutrality

Business segments ........................................................................................................ 69

Key financials and non-financials ..................................................................................... 126

Capital markets .............................................................................................................. 137

Corporate governance .................................................................................................... 150

Service ............................................................................................................................ 156
Transforming ourselves into a sustainable and innovative infrastructure partner

Dr. Frank Mastiaux, CEO

We will more consistently benchmark our future decisions and investments against sustainability criteria and align our growth accordingly.

Our concept of sustainability is creating economic, environmental and social added value for customers, shareholders, the workforce, business partners and society – today and in the future.

We associate corporate sustainability with responsibility in all our activities. This makes sustainability integral to our corporate strategy.
Decisions and business activities driven by ESG responsibilities

### Environmental (E)
- Reduction of CO₂ footprint
- Responsible use of resources
- Preservation of biodiversity

### Social (S)
- Responsibility for employees
- Coal phase-out: No job losses
  Fuel switch: Secure locations & jobs

### Governance (G)
- ESG criteria integrated in investment approval process
- Decisions guided by climate neutrality target 2035
- Management Board remuneration including clawback

More ESG information on our website: Sustainability management | EnBW
### Sustainability ratings

<table>
<thead>
<tr>
<th>Climate Rating</th>
<th>ESG Risk Rating</th>
<th>ESG Rating</th>
<th>ESG Rating</th>
</tr>
</thead>
<tbody>
<tr>
<td>CDP&lt;sup&gt;1&lt;/sup&gt;</td>
<td>Sustainalytics&lt;sup&gt;2&lt;/sup&gt;</td>
<td>ISS ESG&lt;sup&gt;3&lt;/sup&gt;</td>
<td>MSCI&lt;sup&gt;4&lt;/sup&gt;</td>
</tr>
</tbody>
</table>

**2019**

- **Management**: B
- **Leadership**: A

**2020**

- **Risk**: 32.8 (High)
- **Risk**: 31.0 (High)

**2021**

- **Prime Status**: B-
- **Prime Status**: B

**2020**

- **Outperformer**: AA
- **Average**: A

---

1. CDP Scale: A to D (Leadership A/A-; Management B/B-; Awareness C/C-; Disclosure D/D-; Failure F)
2. Sustainalytics Scale: 0-100 (Risk Score: negligible [0-10]; low [10-20]; medium [20-30]; high [30-40]; severe [40+])
3. ISS ESG Scale: A+ to D- (absolute best-in-class basis; Prime Status awarded)
4. MSCI Scale: AAA to CCC (Leader AAA – AA; Average A – BB, Laggard B – CCC)
25-points sustainability programme

Management processes
1. Climate neutrality by 2035
2. Integration of sustainability assessment in investment decisions
3. Evaluation of the EnBW portfolio based on EU taxonomy
4. Transparency with regard to party donations and lobbying
5. Introduction of a plan of measures and progress report for non-financial targets
6. Integration of sustainability and climate protection into the Board of Management’s remuneration
7. Expansion of sustainable finance activities
8. Systematic examination of sustainability risks and opportunities
9. Human resources work focused on sustainability

Core processes
Sustainable generation infrastructure
10. Boost sustainability in the area of trading
11. Increase responsible raw material procurement
12. Paris-compliant phase-out of coal
13. Introduce climate-neutral gases
14. Targets for harmful emissions and greenhouse gases
15. Measures for efficient water consumption/extraction

System critical infrastructure
16. Development of sustainable grid companies
17. Boost sustainable product portfolio at Netze BW

Smart infrastructure for customers
18. Sustainable sales
19. Extend climate-friendly product portfolio

Supporting processes
20. Sustainable procurement
21. Paper reduction and recycling
22. Climate-friendly internal mobility
23. Sustainable real estate management
24. Climate protection measures
25. Sustainable canteen
Value added of the EnBW Group
(in € m\(^1\))

<table>
<thead>
<tr>
<th>Input: resources</th>
<th>Creation of value</th>
<th>Output: value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Finance</td>
<td>Sales</td>
<td>16,326</td>
</tr>
<tr>
<td>Relationships</td>
<td>Grids</td>
<td></td>
</tr>
<tr>
<td>Employees</td>
<td>Renewable Energies</td>
<td></td>
</tr>
<tr>
<td>Environment</td>
<td>Generation and Trading</td>
<td></td>
</tr>
<tr>
<td>Infrastructure</td>
<td></td>
<td>21,514</td>
</tr>
<tr>
<td>Expertise</td>
<td></td>
<td>Cash-relevant business performance (2019: 21,532)</td>
</tr>
</tbody>
</table>

5,188 value added (2019: 4,728)

Use of value added

<table>
<thead>
<tr>
<th></th>
<th>2020</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Active and former employees: Primarily wages and salaries</td>
<td>42%</td>
<td>43%</td>
</tr>
<tr>
<td>EnBW Group: Retained cash flow</td>
<td>32%</td>
<td>26%</td>
</tr>
<tr>
<td>State: Taxes</td>
<td>14%</td>
<td>19%</td>
</tr>
<tr>
<td>Shareholders: Dividends</td>
<td>7%</td>
<td>7%</td>
</tr>
<tr>
<td>Outside investors: Interests</td>
<td>5%</td>
<td>5%</td>
</tr>
</tbody>
</table>

1 The figures for the previous year have been restated.
2 Includes interests and dividends received, as well as the dedicated financial assets contribution.
Integrated Reporting – EnBW’s performance management system includes non-financial KPIs

Non-financial performance indicators and targets

1. Customers and society goal dimension

- Reputation Index: 52.8 > 56, 58–62
- SAIDI (electricity) in min./year: 15 > 15, < 20

2. Environment goal dimension

- Installed output of renewable energies in GW: 4.4 > 4.9, 6.5–7.5
- Share of generation capacity RE in %: 31.8 > 39, > 50
- CO₂ intensity in g/kWh: 419 > 372, -15% - 30%²

3. Employees goal dimension

- People Engagement Index (PEI): -³
- LTIF for companies controlled by the Group/LTIF overall: 2.1/3.8 > 2.1/3.6, 2.1/3.5

---

¹ The performance indicator was reported for the first time in 2020 and replaces the Employee Commitment Index (ECI) as a key performance indicator
² Reference year 2018
Sustainable finance activities

**Green bonds**
- €2.5bn green bonds\(^1\)
- First green bond:
  - Issuance size €500 m, October 2018
- Four green subordinated bonds:
  - First German green subordinated bond issuer
  - 2* €500 m, total issue size €1 bn, July 2019
  - Issue size €500 m, June 2020
  - Issue size €500 m, August 2021

**Sustainable syndicated credit line**
- First sustainability-linked syndicated credit facility in June 2020:
  - Credit facility amount of €1.5 bn
  - Borrowing costs are reduced or increased according to target attainment on selected sustainability indicators:
    - CO\(_2\) intensity
    - Share of renewables capacity
    - Grid supply reliability (SAIDI)

**EU Taxonomy alignment**
- Publication of Taxonomy-aligned business activities in March 2021 as one of the first companies in Europe:
  - Renewable energies\(^2\) and grids\(^3\) in first step. Other EnBW activities/segments will follow in 2021.
- Environmentally-sustainable activities of EnBW Group in 2020\(^4\):
  - Revenue: 18%
  - Capex: 60%
  - Opex: 26%
  - Adjusted EBITDA: 65%

---
\(^1\) Already over 30% of EnBW’s total outstanding corporate bonds as of 31 August 2021
\(^2\) Renewable Energies: including onshore wind, offshore wind, solar/PV, hydropower plants
\(^3\) Grids: Including electricity grids (distribution and transmission grids)
\(^4\) Includes the analyzed activities in the segments Renewable Energies and Grids
Green Financing Framework: Green Bond Principles promote market transparency

In accordance with the ICMA Green Bond Principles (GBP)\(^1\) and the EU Taxonomy\(^2\)
- Issued before the first green bond issuance in October 2018
- Updated regularly to include developments

### Content

<table>
<thead>
<tr>
<th>Use of proceeds</th>
<th>Project categories:</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>- Renewable energies</td>
</tr>
<tr>
<td></td>
<td>- Clean transportation</td>
</tr>
<tr>
<td></td>
<td>- Energy efficiency</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Project evaluation and selection</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Development of a criteria set</td>
</tr>
<tr>
<td>- Establishing a Green Financing Committee</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Management of proceeds</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Proceeds are allocated within 24 months after issuance</td>
</tr>
<tr>
<td>- Reallocation if necessary (sale, project breakup, a project does not allow for allocation)</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Reporting</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Annual reporting (website and Impact Report)</td>
</tr>
<tr>
<td>- Use of proceeds</td>
</tr>
<tr>
<td>- Quantitative and qualitative reporting on impact</td>
</tr>
</tbody>
</table>

Use of Green Bond Principles promotes market transparency and helps investors to evaluate the environmental benefits of potential investments

---

\(^1\) Green Bond Principles are voluntary process guidelines that encourage issuers to be transparent in disclosure to ensure integrity of the green bond market. They set out a clear procedure for issuing green bonds.

\(^2\) Based on the Delegated Act from June 2020.
Allocation of EnBW’s green bond proceeds

- **$500\text{ m}$$$ Green senior bond
  - October 2018
  - $1\text{ bn}$ in 2 tranches
  - **Green subordinated bond**
  - July 2019
  - $€500\text{ m}$

- **Clean transportation**
  - E-mobility charging stations
  - ~2%
  - PV: ~6%
  - Onshore: ~47%
  - Offshore: ~46%

- **Renewable energies**
  - PV
  - Onshore
  - Offshore
  - ~4%
  - PV: ~2%
  - Onshore: ~22%
  - Offshore: ~54%

- **Valeco: Project developer**
  - M&A (June 2019)
  - ~4%
  - M&A

- **$500\text{ m}$$$ Green subordinated bond
  - August 2021

- **$500\text{ m}$$$ Green subordinated bond
  - June 2020

---

as of 30 September 2021

1 100% allocated, difference due to rounding
EnBW Green Bond Impact Report

Allocation report on project category level
- Capital expenditures attributable to the bonds
- Generation capacity attributable to the bonds

Impact Report
- CO₂ avoidance factor
- Emissions avoided attributable to the bonds

External verification

First layer: Second Party Opinion – ISS ESG
- ISS ESG proved and confirmed
  - Use of proceeds are linked to our sustainability strategy
  - Compliance with the ICMA Green Bond Principles, the
    Green Loan Principles and proposed EU Green Bond Standard¹
  - Good sustainability quality of the bond

Second layer: CBI – Certification
- Pre issuance Certification
  - Obtained during the green bond preparation work
  - To be published when issuing the emission
- Post Issuance Certification
  - Approximately one year after the issuance
    – to verify on the use of proceeds and allocation
  - Standards include detailed, sector-specific criteria
    for qualification as a green bond

More information on our website: Green Bond Impact Report 2020 | EnBW

¹ Alignment with the proposed EU Green Bond Standard (GBS) has been assessed in 2021 for the first time.
CBI: Climate Bond Initiative
EnBW's selected sustainability key performance indicators

- System-relevant social and environmental KPIs reinforce our 2025 strategy of becoming a sustainable and innovative infrastructure partner.
- Borrowing costs are reduced or increased according to target attainment on selected sustainability indicators.

<table>
<thead>
<tr>
<th>Target dimension</th>
<th>Topic</th>
<th>Selected sustainability KPI</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. Environment</td>
<td>Climate protection</td>
<td>CO₂ intensity in g/kWh</td>
</tr>
<tr>
<td>2. Environment</td>
<td>Expansion of renewable energies</td>
<td>Share of renewable energies in the generation capacity in %</td>
</tr>
<tr>
<td>3. Society</td>
<td>Reliability of supply</td>
<td>SAIDI [electricity] in min/y</td>
</tr>
</tbody>
</table>

### Margin adjustment mechanism

- **Margin discount applies if at least 2 out of the 3 KPIs meet their achievement values**
- **Margin premium applies if at least 2 out of the 3 KPIs meet their non-achievement values**
- **No impact otherwise**

#### Illustrative scenarios

<table>
<thead>
<tr>
<th>KPI 1 met</th>
<th>KPI 2 met &amp; 1 missed</th>
<th>KPI 3 met &amp; 2 missed nor met</th>
<th>1 KPI met &amp; 2 neither missed nor met</th>
<th>2 KPIs neither missed nor met &amp; 1 missed</th>
<th>1 KPI met &amp; 2 missed</th>
<th>3 KPIs missed</th>
</tr>
</thead>
<tbody>
<tr>
<td>✓</td>
<td>✓</td>
<td>✓</td>
<td>❌</td>
<td>---</td>
<td>✓</td>
<td>×</td>
</tr>
<tr>
<td>✓</td>
<td>✓</td>
<td>❌</td>
<td>❌</td>
<td>❌</td>
<td>×</td>
<td>×</td>
</tr>
<tr>
<td>✓</td>
<td>✗</td>
<td>❌</td>
<td>❌</td>
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</tr>
</tbody>
</table>

Discount | Discount | No adjust. | No adjust. | Premium | Premium
First mover in disclosing EU taxonomy-aligned business activities

EnBW activities examined for the EU Taxonomy Regulation (2020)

Examined segments¹

Examined activities
- Electricity distribution grids
- Electricity transmission grids

Activities not examined
- Gas distribution grids
- Gas transmission grids
- Grid services
- Water

Examined activities
- Onshore wind
- Offshore wind
- Solar
- Hydropower

Activities not examined
- Biomass

Percentage of environmentally sustainable business activities within the EnBW Group (2020)

- 18% Revenue
- 26% OPEX
- 60% CAPEX
- 65% Adjusted EBITDA

More ESG information on our website: EU taxonomy | EnBW

¹ In 2020, the segments renewable energies (excluding biomass) and grids (excluding gas distribution grids, gas transmission grids, grids services, water) were examined. Other EnBW activities/segments will follow in 2021.
Supply chain sustainability: Responsibility for the environment and society

Core elements of the Supply Chain Due Diligence Act

- Statement of principle
- Internal responsibilities
- Reporting & documentation requirements
- Representative action
- Penalties

Supplier Code of Conduct (SCoC)

Elements
- Social standards and human rights
- Environmental standards
- Compliance and fair working relationships
- Compliance monitoring; complaints procedure

Mandatory criterion in supplier selection
- Core element in supplier qualification
- Rollout for existing suppliers, immediate application for new suppliers

Risk management and development

Assessment of sustainability risks
- Train staff
- Validate process
- Use data and tools

Towards supply chain sustainability
- Implement measures with suppliers
- Establish procurement of sustainable product alternatives
- Know and reduce supply chain carbon footprint (Scope 3)

From 16 July 2021, new suppliers can only qualify for EnBW if they recognise the SCoC.
From 1 January 2023, working relationships with suppliers who have not recognised the SCoC will be terminated.

1 Legal representation by third parties (such as NGOs)
The CO₂ intensity of own generation of electricity in 2020 was 372 g/kWh. The target was a reduction of between 15% and 20% relative to the 2015 value of 606 g/kWh. We were able to clearly exceed this target due to:

- Higher generation from renewable energies
- Electricity generation at our fossil fuel-fired power plants was significantly lower than expected due to market-driven developments
- Unforeseeable effects of the coronavirus pandemic

With respect to our target of reducing the CO₂ intensity of our own electricity generation, the years 2019 and 2020 were exceptional years that were subject to extraordinary effects.

The updated target is to reduce the CO₂ intensity of our own generation of electricity by between 15% and 30% in comparison to the reference year of 2018 used for our target of climate neutrality, which was also the last year without extraordinary effects.
EnBW’s carbon footprint
Emissions 2020: Scope 1, 2 and 3

Greenhouse gas emissions (CO₂, CH₄, N₂O and SF₆)

**Scope 3 upstream**
Other indirect greenhouse gas emissions
- Upstream gas sales (gas procurement)
- Procurement of fuel
- Business trips

**Scope 1**
Direct greenhouse gas emissions from sources belonging to or directly controlled by the company
- Electricity generation
- Heat generation
- Operation of gas pipelines and gas plants
- Operation of electricity grid
- Buildings
- Vehicles

**Scope 2**
Indirect greenhouse gas emissions originating during the production of purchased electricity, steam, district heating and cooling that the company consumes; grid losses
- Grid losses
- Operation of plants, electricity grid
- Operation of plants, gas grid
- Operation of plants, water supply
- Buildings

**Scope 3 downstream**
Other indirect greenhouse gas emissions
- Gas consumption by customers

Upstream emissions by third parties
Direct and indirect emissions at EnBW
Downstream emissions by third parties

6.9 m t CO₂eq
9.6 m t CO₂eq
0.8 m t CO₂eq
42.6 m t CO₂eq
Why is EnBW committed to climate action?

- Low-carbon business areas are key growth markets in the energy sector
- EnBW’s strategic goals can be attained with low-carbon activities
- EnBW delivers on its social responsibility for climate action/sustainability

EnBW long-term climate targets scopes 1 and 2 (mt)

- Onshore wind growth to 1,000 MW by 2020/2,000 MW by 2025
- Offshore wind growth to ≥ 1,500 MW by 2025
- Selective further internationalisation of business by 2025, with substantial base in France and Sweden

EnBW renewables growth¹

<table>
<thead>
<tr>
<th>Year</th>
<th>Adjusted EBITDA in € bn</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>0.2</td>
</tr>
<tr>
<td>2020</td>
<td>0.7</td>
</tr>
<tr>
<td>2025</td>
<td>1.4</td>
</tr>
</tbody>
</table>

31% of household electricity consumption in Baden-Württemberg can theoretically be served by EnBW’s Renewable Energy Activities

Remaining total GHG budget post-2018: 150 mt

- 17.6 mt in 2018
- 8.8 mt in 2030
- 0.0 mt in 2035

Remaining total GHG budget post-2018: 150 mt

- ~35,000 households [300 GWh/p.a.]

1 Run-of-river power plants, pumped storage power plants with natural inflow, wind power, photovoltaic and other
GHG: Greenhouse gas
EnBW's transition towards climate neutrality is a just transition

Clear climate targets

Long-term climate targets for EnBW

› -50% by 2030
› -100% by year-end 2035
› Offsets for unavoidable residual emissions from 2036

Calculation of Paris-compliant residual emission budget

› Based on German Advisory Council on the Environment (SRU)

EnBW residual emissions budget in line with 66% probability of 1.75°C global warming (mt CO₂)

Just transition

No additional job cuts

(currently 3,400 employees in conventional generation)

› Attaining EnBW climate neutrality by 2035 does not mean decommissioning coal-fired power plants in excess of the statutory decommissioning path

› EnBW delivers on its social responsibility in the exit from coal: suitable HR instruments (further training e.g.) and forward-looking HR planning

› Former conventional power generation employees are already contributing their technical expertise in other areas today, such as in offshore wind power

Financial feasibility

Cost management

› No need for offsetting expected up to 2035 as 50% target realistically attainable by EnBW

› Offsetting only expected to be needed from 2036 to 2040, on declining trend (notably due to use of climate-friendly gases in power plants)

› EnBW offsets according to Gold Standard and thus complies with prevailing minimum requirements
EnBW uses various instruments on the path to climate neutrality

<table>
<thead>
<tr>
<th>Coal exit/fuel switch</th>
<th>Use of climate-neutral gases</th>
<th>Use of green electricity</th>
<th>Offsetting</th>
<th>Other options</th>
</tr>
</thead>
<tbody>
<tr>
<td>› Coal phase-out expected shortly after 2030¹</td>
<td>› Transition to climate-neutral gases necessary in medium term</td>
<td>› Mainly relevant as substitute for ‘grey’ grid loss purchases in Scope 2²</td>
<td>› Unavoidable residual emissions offset by purchase of recognised offsetting allowances (Scope 1³)</td>
<td>› Action package to avoid relatively small-scale emissions (such as canteen and building emissions)</td>
</tr>
<tr>
<td>› District heating/power generation fuel switch to natural gas, biogas/biomass, hydrogen etc.</td>
<td>› Climate-neutral hydrogen not expected to be universally available until mid-2030s</td>
<td>› Surcharge for green grid loss purchases required</td>
<td>› Reduction prioritised over offsetting</td>
<td>› About 2% of total emissions at EnBW</td>
</tr>
</tbody>
</table>

¹ Given current sector targets for 2030, according to Climate Protection Act (Klimaschutzgesetz, KSG); of EnBW’s coal-fired power stations, only RDK8, GKM9 and LIP currently still expected to be in service beyond 2030, plus electricity from Walsum in 2030
² Indirect emissions from electricity purchased and used by the organisation.
³ All direct emissions from the activities of an organisation or under their control.
EnBW has a clear-cut implementation plan for emission reductions: 50% by 2030, net zero by 2035

### Emission targets and measures

<table>
<thead>
<tr>
<th>Mt CO₂</th>
<th>By 2025</th>
<th>By 2030</th>
<th>By 2035</th>
<th>Beyond 2035</th>
</tr>
</thead>
<tbody>
<tr>
<td>17.6</td>
<td>8.8</td>
<td>0.0</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Coal-fired generation capacity (GW)</th>
<th>2018</th>
<th>By 2025</th>
<th>By 2030</th>
<th>Beyond 2035</th>
</tr>
</thead>
<tbody>
<tr>
<td>4.6</td>
<td>-50%</td>
<td>-100%</td>
<td>0.0</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Scope 1‡</th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Coal to gas fuel switch</td>
<td>Reduction in fleet, canteen, building etc. emissions</td>
<td>First coal-fired power plants decommissioned</td>
<td>Decommissioning of remaining coal-fired power plants</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Fuel switch</td>
<td>Continuation of other reduction measures</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Continuation of other reduction measures</td>
<td>Offsetting (only if necessary), attainment of H₂ readiness</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Conversion from natural gas to climate neutral gases (hydrogen)</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Offsetting of residual fossil emissions</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td>Continuation of other reduction measures</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Scope 2§</th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Start of green grid loss purchases (electricity)</td>
<td></td>
<td>Green grid loss purchases; possibly additional offsetting measures</td>
<td></td>
</tr>
</tbody>
</table>

1 Starting figure for Scope 1 and 2 (mainly power generation and grid losses)
2 Target for Scope 1 and 2
3 As of October 2020
4 All direct emissions from the activities of an organisation or under their control.
5 Indirect emissions from electricity purchased and used by the organisation.
Business segments

EnBW at a glance ........................................... 02
Market environment ...................................... 05
Strategy .......................................................... 34
Corporate sustainability .................................. 49

Business segments
› Selected EnBW companies
› Segment overview
› Smart Infrastructure for Customers
› System Critical Infrastructure
› Sustainable Generation Infrastructure
› Electricity and gas sales volumes

Key financials and non-financials .............................................. 126
Capital markets ......................................................... 137
Corporate governance ...................................................... 150
Service ........................................................................ 156
Selected EnBW companies

Baden-Württemberg
- EnBW
  EnBW Energie Baden-Württemberg AG, Karlsruhe
- EnBW ÖDR
  EnBW Ostwürttemberg DonauRies AG, Ellwangen
- Erdgas Südwest
  Erdgas Südwest GmbH, Karlsruhe
- GasVersorgung Süddeutschland GmbH, Stuttgart
- NetCom BW
  NetCom BW GmbH, Ellwangen
- Netze BW
  Netze BW GmbH, Stuttgart
- terranets bw
  terranets bw GmbH, Stuttgart
- TRANSENW BW
  TransnetBW GmbH, Stuttgart
  ZEAG Energie AG, Heilbronn

Germany
- ontragas
  ONTRAS Gastransport GmbH, Leipzig
- plusnet
  Plusnet GmbH, Cologne

Sweden
- Sverige AB
  EnBW Sverige AB, Falkenberg

Denmark
- Connected Wind Services A/S, Balle

Czech Republic
- Pražská energetika a.s., Prague

France
- valeco
  Valeco SAS, Montpellier

Switzerland
- Zeal
  EnergieDienst Energiedienst Holding AG, Laufnburg

Austria
- SMATRICS
  SMATRICS EnBW GmbH, Vienna

Turkey
- Borusan EnBW Enerji yatırımları ve Üretim A.S., İstanbul

1 Not fully consolidated, accounted for using the equity method.

The full list of shareholdings can be found in the notes to the consolidated financial statements under (37) "Additional disclosures".

Further information shareholdings: www.enbw.com/shareholdings

The full set of consolidated financial statements as of 31 December 2020 is published at www.enbw.com/report2020-downloads
Our new segments:
Three strategic business fields with a focus on infrastructure

up to 2020

Energy industry value chain with four segments

Sales
Grids
Renewable Energies
Generation and Trading

from 2021

Three strategic business fields with a focus on infrastructure

Smart Infrastructure for Customers
Sales of electricity and gas, billing services
Installation and operation of critical infrastructure such as broadband, charging and urban infrastructure

System Critical Infrastructure
Transmission and distribution of electricity, gas and water and the provision of grid-related services

Sustainable Generation Infrastructure
Generation of electricity from renewable energies (water, wind and sun)
Generation of electricity from conventional power plants, generation of heating, storage of gas, electricity and gas trading and system services

Our vision
EnBW 2025 strategy
Sustainable and innovative infrastructure partner
Business segments¹

- **Smart Infrastructure for Customers**
  - E-mobility
  - Telecommunications and broadband
  - PV and energy storage systems

- **System Critical Infrastructure**
  - Electricity distribution grids (integrating renewables and e-mobility)
  - Electricity transmission grids (Suedlink and Ultranet)
  - Gas grids (H₂ readiness by 2040)

- **Sustainable Generation Infrastructure**
  - Renewable Energies (expansion of wind onshore, offshore and PV)
  - Thermal generation (nuclear exit by 2022, coal exit by 2035, fuel switch, expansion of climate neutral gases)
  - Trading

¹ As of 1 January 2021
Smart Infrastructure for Customers: E-mobility

Highlights

- **over 600** fast-charging stations in Germany
- **2,500** fast-charging stations by the year 2025
- **over 200,000** charging points in the EnBW HyperNetwork
- **€100 m** invested annually by 2025

Examples of partners and references

Our range of services

- Consulting and sales
- Location analysis
- Planning, project planning, civil engineering
- Access and billing
- Operation and service

EnBW mobility+

- Is operating the most fast-charging locations in Germany
- Offers the largest network coverage in DACH region
- Is awarded multiple times:
## Smart Infrastructure for Customers: EnBW HyperNetwork

### Charge while you eat or shop
- **Retail hubs**
  - Convenient and time-saving quick charging while you eat or shop
  - Supermarkets
  - Malls
  - Drugstores
  - Bakeries
  - Fast food outlets
  - Typical provision: 2-12 chargers
  - Typical capacity: 75-150 kW

### Make a quick charging stop
- **Urban hubs**
  - Fast to very fast charging in urban hubs
  - Cities over 100,000 population
  - Highly frequented locations for high capacity utilisation
  - Urban areas with above-average population density
  - Typical provision: 8-12 chargers
  - Typical capacity: 75-300 kW

- **Long-distance hubs**
  - Very fast range top-up on/near the Autobahn and major roads
  - Interchanges
  - Slipways
  - Major axes/trunk roads
  - Rest stops/service stations
  - Greenfield sites
  - Typical provision: 12-20 chargers
  - Typical capacity: 150-300 kW

Anyone without a home charger saves time by building the perfect HPC charging experience into their everyday routine.
Smart Infrastructure for Customers: EnBW mobility+ app

> 900,000 downloads

> 400,000 registered app users

> 200,000 charging points in nine countries

of which > 45,000 charging points in Germany

Use the EnBW mobility+ app to conveniently find the next free charging point, start charging and pay at the same fair price in nine countries.

Multiple award-winning and most frequently downloaded electric mobility app in Germany
Smart Infrastructure for Customers: Fibre broadband and services at NetCom BW

- Approx. 65,000 customers, of which 9,250 commercial and industrial
- Around 16,600 km of fibre optic cable
- Second largest fibre backbone network in Baden-Württemberg
- Serves > 40% of municipalities in Baden-Württemberg
- Strong data growth: doubling of transported data volume in 2020 to ~210,000,000 GBytes (compared to 2019)

Total customer growth

Number of customers

- 24,000 customers in 2014
- 56,000 customers in 2019
- 65,000 customers in 2020

as of 31 December 2020
Smart Infrastructure for Customers: Plusnet - leading nationwide B2B telecoms operator

Key highlights

Customers
› Well-known and loyal customer base
› Overall ~25,000 business customers
› Customer base well-diversified by region, industry, size and products

Sales organisation
› Significant experience in B2B sales with long-term relationships
› Strong direct sales channel and indirect sales network with more than 300 partners
› Seamless interaction between indirect and direct sales with strong products

Network
› Fully meshed 100 Gbps DWDM backbone based on 6,500 km fibre network
› Plusnet owns and operates third largest copper-based access network with 1,374 central offices, fully tailored to business (DSL) markets as well as the largest independent B2B WLL network in Germany with ~150 base stations and ~1,050 customer links

Fibre optic expansion
› Focused on commercial areas, we are rolling-out fibre selectively throughout Germany

Municipal utility companies in Germany
› Plusnet is well positioned to be the go-to provider of network services, white label and open access solutions for municipal utility companies, offering unique white label building-blocks

Nationwide IP-based voice and data network
Smart Infrastructure for Customers: SENEC - Decentralised energy solutions for homeowners

- Fully integrated solutions for self-supply with solar power [SENEC 360°]
- Development and production of electricity storage systems
  - Distribution of own-brand PV systems and wallboxes
  - SENEC-Cloud virtual electricity storage
  - Electric mobility: Solar-optimised charging via wallbox
- Distribution through over 1,000 certified installers
- Positioned in high-growth sweet spots of decentralised energy solutions
- Over 70,000 electricity storage systems sold
- Presence in major growth markets (Germany, Italy and Australia)
- Strongly scaling business: 800% growth since acquisition in 2018 to revenue well above €200 m in 2021

SENEC.Home
SENEC.Solar
SENEC.Wallbox
SENEC.Cloud

Additional products:
SENEC.Cloud to go
SENEC.Cloud heat
SENEC.Cloud family & friends
Smart Infrastructure for Customers: Energy-related services for utilities

Business model

› EnBW Utility Services has provided energy-related services to utilities for over 10 years. The business focus is on the supplier and distribution network business (including as default meter operator). Today, the business has over 2.6 m metering points under management.

› The main energy-related services include the provision of IT platforms (SaaS), business process outsourcing (BPO) and implementing projects such as migrations for e.g. municipal utilities.

Market development

› The business has changed noticeably in recent years, with changing customer behaviour, higher legislative and regulatory requirements and new technologies. This path of change continues with growing rapidity and increases complexity for market players who make increasing use of outsourcing.

› Overall, the market is expected to grow by about 2.5% a year to a total volume of around €3.5 bn by 2030 (today\(^1\): €2.7 bn). Strongest growth and margins: Software/SaaS and metering point business

\(^1\) As of 30 September 2021

approx. 100 clients

>5 m contracts under management

Approx. €120 m revenue
Smart Infrastructure for Customers: Develop biomethane business

Biomethane market development

› Short-term market development: Biomethane opens up additional applications in the transport and buildings sector for rapid decarbonisation

› In the medium term, biomethane will be used as a storable and climate-friendly gas fuel in industry, the tertiary sector and power generation

› Rapid expansion of biomethane business via acquisition of BayWa portfolio by bmp greengas (2019) and organic growth

› Expansion of non-subsidised business (Germany) and internationalisation by cross-border procurement and marketing activities

Source: Erdgas Südwest GmbH
EnBW has a thorough grasp of the grids business

- EnBW and its predecessor companies have been in the grids business for more than 100 years
- Security of supply is our highest priority – which is why we employ modern and tested technologies and maintain an extensive network of service centres
- Efficiency benchmark from most recent regulatory period certifies generally best results for EnBW grids
- High regulatory competence and market competence

Grids business has stabilising effect on portfolio

- Electricity and gas grids are subject to regulation
- Stabilising risk/return mix with stable cash flows
## System Critical Infrastructure: Electricity and gas grids

### in km

<table>
<thead>
<tr>
<th>Transmission grids</th>
<th>2020</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Extra-high voltage 380 kV</td>
<td>2,200</td>
<td>2,200</td>
</tr>
<tr>
<td>Extra-high voltage 220 kV</td>
<td>1,000</td>
<td>1,000</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Distribution grids</th>
<th>2020</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>High voltage 110 kV</td>
<td>8,600</td>
<td>8,600</td>
</tr>
<tr>
<td>Medium voltage 30/20/10 kV</td>
<td>43,000</td>
<td>42,700</td>
</tr>
<tr>
<td>Low voltage 0.4 kV</td>
<td>89,800</td>
<td>89,600</td>
</tr>
</tbody>
</table>

| Overall length | 143,700 | 144,100 |

<table>
<thead>
<tr>
<th>Transportation grids</th>
<th>2020</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>High pressure</td>
<td>9,700</td>
<td>9,100</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Distribution grids</th>
<th>2020</th>
<th>2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>High pressure</td>
<td>2,400</td>
<td>2,300</td>
</tr>
<tr>
<td>Medium pressure</td>
<td>8,900</td>
<td>8,600</td>
</tr>
<tr>
<td>Low pressure</td>
<td>4,700</td>
<td>4,600</td>
</tr>
</tbody>
</table>

| Overall length | 25,700 | 24,600 |
## System Critical Infrastructure: Expansion of transmission grids to ensure security of supply

<table>
<thead>
<tr>
<th>AC grids reinforcement</th>
<th>Grids section</th>
<th>Scheduled completion</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 for Rhine river area in Baden</td>
<td>~150 km</td>
<td>2023/2028</td>
</tr>
<tr>
<td>2 for north Baden-Württemberg</td>
<td>~80 km</td>
<td>2028</td>
</tr>
<tr>
<td>3 for north east Baden-Württemberg</td>
<td>~140 km</td>
<td>2022/2030</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>DC expansion</th>
<th>Grids section</th>
<th>Scheduled completion</th>
</tr>
</thead>
<tbody>
<tr>
<td>4 in corridor C “SuedLink” 4 GW corridor</td>
<td>689 km¹</td>
<td>2026/2028</td>
</tr>
<tr>
<td>5 in corridor A “Ultranet” 2 GW corridor</td>
<td>40 km</td>
<td>2024/2026</td>
</tr>
</tbody>
</table>

EnBW/TransnetBW contribution: Converter, power lines in Baden-Württemberg

---

Investment up to 2025: Around €6 bn


¹ In cooperation with TenneT

AC: Alternating current  DC: Direct current
System Critical Infrastructure:
SuedLink is the largest infrastructure project in the energy transition

Transmission grids
4 GW from north to south
- SuedLink – largest infrastructure project
- Ultranet under construction

Distribution grids
- Grids expansion and upgrading to integrate renewables and supply electric cars
- Ensuring security and reliability of supply on the grids
Challenges and activities

Challenges of the distribution grids in Baden-Württemberg

- Widespread use of photovoltaics in the grids area
- High expansion targets for wind power
- Growing prevalence of electric cars

Necessitate grids expansion using smart technologies (e.g. controllable local grids station, current peaks storage, etc.)

In addition to expansion of the distribution grids, EnBW is investigating smart distribution grids together with partners in several “grids laboratories”

Through to 2025, investment of ~€2.5 bn necessary to develop the electricity distribution grids infrastructure in Baden-Württemberg

EnBW grids laboratories and grids innovations

E-mobility

1. E-mobility Carré Tamm
   Approaches for the integration of e-mobility in apartment buildings

2. E-mobility Chaussee Kusterdingen
   Approaches for the integration of e-mobility in rural areas

3-7. Intelligent home-charging
   Remote controlled charging at home

Smart grids and others

8. Sonderbuch
   Interactive smart grids demonstrator

9. Freiamt – flexQgrid
   The grid as distributed power plant; implementation of grids traffic light

10. Hydrogen-Island Öhringen
    Renewable energies stored as hydrogen in the natural gas grids
**System Critical Infrastructure:**
Local authorities and municipal utilities

**Concessions**
- Netze BW locations
- North grids region
- Centre grids region
- South grids region

With investment, research activities, state-of-the-art technology and our highly dedicated workforce, we make a major contribution in terms of security of supply and future-ready energy supply, especially in rural regions.

- 550 electricity concessions
- 100 gas concessions
- 2.5 m electricity connections
- 150,000 gas connections

**Our ambition:**
Secure and win concessions

**Shareholdings in local services**
Alongside our own activities, our shareholdings in local services are a key pillar of our regional business. We place great importance on close teamwork.

- Approx. 100 shareholdings, numerous network providers and municipal utilities
- Approx. €3 bn revenue
- 20% electricity and gas market volume share in Baden-Württemberg

**Our ambition:**
Long-term and durable partnerships with municipal shareholders and services.

**Local sale and distribution**
Broad portfolio of products and services serving over 1,400 municipalities across Baden-Württemberg and beyond.

- With a strong regional footprint, we work closely with municipal and district councils to deliver tailored solutions.
- Our portfolio focuses on smart mobility, networked infrastructure, sustainable energy, reliable security and innovative local services
- Revenue 2020 approx. €160 m

**Our ambition:**
Work together to deliver smart infrastructure for all generations.
## Generation portfolio 2020

<table>
<thead>
<tr>
<th>Source</th>
<th>2020 in MW</th>
<th>share in %</th>
<th>2020 in GWh</th>
<th>share in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Renewable energies</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Renewable energies</td>
<td>4,865</td>
<td>39</td>
<td>11,850</td>
<td>32</td>
</tr>
<tr>
<td>Run-of-river</td>
<td>1,007</td>
<td>8</td>
<td>5,137</td>
<td>14</td>
</tr>
<tr>
<td>Storage/pumped storage (using natural flow of water)</td>
<td>1,507</td>
<td>12</td>
<td>944</td>
<td>3</td>
</tr>
<tr>
<td>Onshore wind</td>
<td>951</td>
<td>8</td>
<td>1,809</td>
<td>5</td>
</tr>
<tr>
<td>Offshore wind</td>
<td>976</td>
<td>8</td>
<td>3,441</td>
<td>9</td>
</tr>
<tr>
<td>Other</td>
<td>424</td>
<td>3</td>
<td>519</td>
<td>1</td>
</tr>
<tr>
<td><strong>Thermal power plants</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Thermal power plants</td>
<td>7,621</td>
<td>61</td>
<td>24,779</td>
<td>68</td>
</tr>
<tr>
<td>Lignite</td>
<td>875</td>
<td>7</td>
<td>3,164</td>
<td>9</td>
</tr>
<tr>
<td>Hard coal</td>
<td>3,467</td>
<td>28</td>
<td>5,407</td>
<td>15</td>
</tr>
<tr>
<td>Gas</td>
<td>1,165</td>
<td>9</td>
<td>4,404</td>
<td>12</td>
</tr>
<tr>
<td>Other</td>
<td>346</td>
<td>3</td>
<td>170</td>
<td>0</td>
</tr>
<tr>
<td>Pumped storage (not using natural flow of water)</td>
<td>545</td>
<td>4</td>
<td>1,387</td>
<td>4</td>
</tr>
<tr>
<td>Nuclear</td>
<td>1,233</td>
<td>10</td>
<td>10,247</td>
<td>28</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>12,486</td>
<td>100</td>
<td>36,629</td>
<td>100</td>
</tr>
</tbody>
</table>
Sustainable Generation Infrastructure:
Renewable energies are core of our energy transition strategy

Offshore wind
› 1 GW in operation
› 2.4 GW secured pipeline (He Dreih & UK)
› Project development in UK, US & Taiwan

Onshore wind
› 1 GW in operation
› ~2.4 GW secured pipeline and under construction
› Project development in Germany, France and Sweden

Solar
› 0.4 GW in operation
› ~1.3 GW secured pipeline and under construction
› Project development in Germany and France

Latest project news

Offshore wind UK
› EnBW and bp awarded 3 GW in 2021
› Most attractive areas in the auction
› Expected FID 2026 / start COD 2028/29

Offshore wind farm HeDreiht
› 900 MW subsidy-free offshore wind farm
› Most advanced and cost-efficient 15 MW turbines from Vestas
› Expected FID 2023 / start COD 2025

Solar Germany
› 187 MW Weesow-Wilmersdorf connected to grid
› 300 MW (2*150 MW) under construction in north-east Germany
### Sustainable Generation Infrastructure: Offshore wind in Germany - portfolio and project pipeline

**Installed capacity:** 945 MW  
**Secured pipeline:** 900 MW

- **In operation**
- **Development stage**

<table>
<thead>
<tr>
<th>Country</th>
<th>Baltic 1</th>
<th>Baltic 2</th>
<th>Hohe See</th>
<th>Albatros</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Country</strong></td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
</tr>
<tr>
<td><strong>Technology</strong></td>
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<td>Offshore</td>
<td>Offshore</td>
<td>Offshore</td>
</tr>
<tr>
<td><strong>Type of turbine</strong></td>
<td>21 x Siemens SWT 2.3-93</td>
<td>80 x Siemens SWT 3.6-120</td>
<td>71 x Siemens SWT 7.0-154</td>
<td>16 x Siemens SWT 7.0-154</td>
</tr>
<tr>
<td><strong>Total capacity in MW</strong></td>
<td>48.3</td>
<td>288</td>
<td>497</td>
<td>112</td>
</tr>
<tr>
<td><strong>Shareholders</strong></td>
<td>~50.3% EnBW; ~49.7% 19 municipal utilities</td>
<td>~50.1% EnBW ~49.9% PGGM &amp; ÄVWL</td>
<td>~50.1% EnBW ~49.9% Enbridge Inc./CPPIB</td>
<td>~50.1% EnBW ~49.9% Enbridge Inc./CPPIB</td>
</tr>
<tr>
<td><strong>Operation date</strong></td>
<td>Apr 2011</td>
<td>Sep 2015</td>
<td>Oct 2019</td>
<td>Jan 2020</td>
</tr>
<tr>
<td><strong>Feed-in system</strong></td>
<td>EEG 2009</td>
<td>EEG 2012</td>
<td>EEG 2014</td>
<td>EEG 2014</td>
</tr>
</tbody>
</table>

**Notes:**
- EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
- CPPIB: Canada Pension Plan Investment Board
- PGGM: Stichting Depositary PGGM Infrastructure Funds
- ÄVWL: ÄrzteVersorgung Westfalen-Lippe

As of 30 September 2021
EnBW He Dreih secured 900 MW grids capacity as one of the first zero subsidy projects in 2017

- Currently under development, i.e. engineering, tendering of supply contracts, consenting and financing
- Agreement on 66 kV direct connection of inner array grid to AC/DC converter eliminates the need for a costly offshore substation
- Export connection supplied by transmission system operator (TSO) by 2025
- Strong operational synergies with neighbouring EnBW wind farms Hohe See and Albatros
- Final Investment Decision (FID) planned for 2023
- Start of operation expected for 2025

**Country** | Germany
---|---
**Technology** | Offshore
**Type of turbine** | To be contracted
**Total capacity** | 900 MW
**Shareholders** | 100% EnBW
**Commissioning** | 2025
**Feed-in tariff** | Without EEG funding
Sustainable Generation Infrastructure: Offshore wind in United Kingdom under development

EnBW secured seabed leases with a potential of 3,000 MW

- 50:50 partnership with bp combines EnBW’s offshore wind expertise with bp’s experience, especially in consenting and procurement.
- Sites do benefit from being close to shore and are lifting synergies from local proximity.
- Grid access can be established in comparatively short time at fairly low cost due to relatively short export grid connection.
- Both wind farms under development, various ongoing activities regarding grid connection, consent and engineering.
- Actively pursuing cooperation with regional developers, ports, businesses and authorities to support early grid connection and consent activities.
- EnBW UK Ltd. established., consent application planned for 2023

Shareholders
50% EnBW, 50% bp

Commissioning
Depending on grid connection, aiming at; aiming at 2028/29

Feed-in tariff
To be determined in future CfD auction
Offshore wind in France and Scotland: Project development activities

**France**

- First European market enabling commercial-scale floating offshore wind projects with a dedicated regulated feed-in tariff as well as grid access by French independent operator RTE.
- Opportunity to participate in three floating auctions (250 MW each): One in South Brittany in 2022 and subsequently two in the Mediterranean in 2023.
- Pre-qualified joint venture comprises 40% Shell/Eolfi, 40% EnBW/Valeco and 20% CDC.

**Scotland**

- Highly attractive market based on ambitious climate targets and strong motivation to transition away from oil and gas dependency, as well as excellent wind resources, available infrastructure and regulatory and commercial regimes.
- Multi step approach in Scotland to complete successful project development:
  - Seabed award
  - Completion of permit / consent process
  - Commercialization / route to market (CfD auction)
- Continuation of successful partnership with bp (50:50).
- Joint submission with bp of one application in Crown Estate Scotland’s ScotWind seabed leasing round in July 2021. Application entails:
  - Details of technical and commercial concept
  - Description of relevant experience and capabilities
  - Overview of preparatory steps taken for project delivery
  - Summary of additional initiatives to highlight organisational commitment
- Announcement of land lease auction results expected in Q1 2022.

**Abbreviations**

- RTE: Réseau de Transport d’Electricité
- CDC: Caisse des Dépôts et Consignations
- OpCo: Operating Company
- CfD: Contract for Difference
Sustainable Generation Infrastructure: Project development activities in North America and Taiwan

US West Coast
› Joint venture Castle Wind LLC for first floating offshore wind project between local developer Trident Winds (20%) and EnBW North America (80%)
› First commercial-scale floating offshore wind project developed in USA
› California renewable energy generation target of 60% by 2030 and 100% by 2045

US East Coast
› Local subsidiary EnBW North America Inc. legally established and in operation with local staff since 2018
› Project company East Wind LLC established in order to achieve site control by participation in offshore wind lease auctions
› Official offshore wind development targets of states along US East Coast increased to over 20 GW by 2035

Taiwan, Formosa 3 project
› Combination of significant economies of scale with excellent wind conditions and a strong local supply chain
› Taiwan long-term energy policy target for offshore wind of up to 15 GW by 2035
› EnBW’s partners JERA and Macquarie – development of three offshore wind sites (total capacity of up to 2 GW)
› Allocation of up to 5 GW in several grid allocation auctions for projects going online between 2025 and 2030
› Taiwan regulator BoE announced next auction round of at least 1 GW for 2022 - Formosa III pipeline with existing EIA well positioned for that round
Sustainable Generation Infrastructure: Onshore wind portfolio and pipeline

Portfolio and pipeline\(^1\)
(in MW)

~2,400

1,002

September 2021

Secured pipeline and projects under construction
Portfolio

Regional distribution of the 2021 portfolio and pipeline\(^2\)
as of 11 August 2021

\(^1\) In Germany and abroad
\(^2\) In Germany
\(^3\) Negotiations for land contracts
\(^4\) At least land contracts concluded
\(^5\) Wind parks in operation with EnBW majority shareholding
Sustainable Generation Infrastructure: Onshore wind in Germany - portfolio and under construction

**Installed total power**: 706 MW

**Number of turbines**: 311

**Number of locations**: > 60

### In operation

<table>
<thead>
<tr>
<th>Country</th>
<th>Technology</th>
<th>Type of turbine</th>
<th>Total capacity in MW</th>
<th>Number of turbines</th>
<th>Operation date</th>
<th>Feed-in system</th>
</tr>
</thead>
<tbody>
<tr>
<td>Düsedau II</td>
<td>Onshore</td>
<td>V150</td>
<td>22.4</td>
<td>4</td>
<td>Jan 2023</td>
<td>EEG 2021</td>
</tr>
<tr>
<td>Häusen</td>
<td>Onshore</td>
<td>V126</td>
<td>6.6</td>
<td>2</td>
<td>Apr 2023</td>
<td>EEG 2021</td>
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<tr>
<td>Hohenstadt</td>
<td>Onshore</td>
<td>N149/N131</td>
<td>12</td>
<td>3</td>
<td>Mar 2023</td>
<td>EEG 2021</td>
</tr>
<tr>
<td>Huettersdorf</td>
<td>Onshore</td>
<td>N131</td>
<td>6.6</td>
<td>2</td>
<td>Dec 2021</td>
<td>EEG 2017</td>
</tr>
<tr>
<td>Steinheim A</td>
<td>Onshore</td>
<td>V50</td>
<td>12.6</td>
<td>3</td>
<td>Mar 2023</td>
<td>EEG 2021</td>
</tr>
<tr>
<td>Tantow</td>
<td>Onshore</td>
<td>V136</td>
<td>10.8</td>
<td>3</td>
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<tr>
<td>Wulkow-Trebnitz</td>
<td>Onshore</td>
<td>V150</td>
<td>21</td>
<td>5</td>
<td>Aug 2023</td>
<td>EEG 2021</td>
</tr>
</tbody>
</table>

### Under construction

- Düsedau II Häusen Hohenstadt Huettersdorf Steinheim A Tantow Wulkow-Trebnitz
- Technology: Onshore
- Type of turbine: V150, V126, N149/N131, N131, V50, V136, V150
- Total capacity in MW: 22.4, 6.6, 12, 6.6, 12.6, 10.8, 21
- Number of turbines: 4, 2, 3, 2, 3, 3, 5
- Operation date: Jan 2023, Apr 2023, Mar 2023, Dec 2021, Mar 2023, Dec 2021, Aug 2023
- Feed-in system: EEG 2021, EEG 2021, EEG 2021, EEG 2017, EEG 2021, EEG 2017, EEG 2021
## Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (1/7)

### In operation

<table>
<thead>
<tr>
<th>Country</th>
<th>Technology</th>
<th>Type of turbine</th>
<th>Total capacity in MW</th>
<th>Number of turbines</th>
<th>Commissioning date</th>
<th>Feed-in system</th>
</tr>
</thead>
<tbody>
<tr>
<td>Aalen-Waldhausen</td>
<td>Onshore</td>
<td>Vestas V126</td>
<td>16.5</td>
<td>5</td>
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</tr>
<tr>
<td>Alt Zeschdorf</td>
<td>Onshore</td>
<td>Vestas V90</td>
<td>6</td>
<td>3</td>
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<td>Benndorf</td>
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<td>EEG 2014 and older</td>
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<td>Berghülen</td>
<td>Onshore</td>
<td>Enercon E82-E2</td>
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<td>3</td>
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<td>EEG 2014 and older</td>
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<td>Boxberg-Angeltürn</td>
<td>Onshore</td>
<td>Enercon E-115</td>
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<td>4</td>
<td>Mar 2018</td>
<td>EEG 2014 and older</td>
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<td>Boxberg-Bobstadt</td>
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<td>Enercon E-115</td>
<td>12</td>
<td>4</td>
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<td>Boxberg-Oberschüpf</td>
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<td>Enercon E-101</td>
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<td>Braunsbach</td>
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<td>Enercon E-115</td>
<td>15</td>
<td>5</td>
<td>Nov 2016</td>
<td>EEG 2014 and older</td>
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<td>Breitenbach</td>
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<td>GE 2.75-120</td>
<td>8.25</td>
<td>3</td>
<td>2x Dec 2017</td>
<td>EEG 2017^1</td>
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</tbody>
</table>

### Notes
- EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
- ^1 Temporary regulations

EnBW Factbook 2021 ▶️< Agenda
### Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (2/7)

<table>
<thead>
<tr>
<th>Country</th>
<th>Bremervörde</th>
<th>Breitenfeld</th>
<th>Buchholz</th>
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<th>Buchholz III</th>
<th>Bühlertann</th>
<th>Burgholz</th>
<th>Christinendorf III</th>
<th>Dienstweiler</th>
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<tr>
<td><strong>Type of turbine</strong></td>
<td>Nordex S70</td>
<td>Nordex N131</td>
<td>Vestas V90</td>
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<td>Vestas V126</td>
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<td>Nordex N117</td>
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<td><strong>Total capacity in MW</strong></td>
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<td>4</td>
<td>4</td>
<td>3</td>
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<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
</tr>
</tbody>
</table>

*as of 30 September 2021*  
EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
### Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (3/7)

**In operation**

<table>
<thead>
<tr>
<th>Country</th>
<th>Dittelsdorf III</th>
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<th>Düsedau</th>
<th>Eisenach II</th>
<th>Elze</th>
<th>Epenrod</th>
<th>Fichtenau</th>
<th>Freckenfeld</th>
<th>Friedberg</th>
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<tbody>
<tr>
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<td>Onshore</td>
<td>Onshore</td>
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<tr>
<td>Type of turbine</td>
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<td>Vestas V126</td>
<td>NEG Micon NM72</td>
<td>Vestas V90</td>
<td>Enercon E53</td>
<td>NEG Micon NW52</td>
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<td>Total capacity in MW</td>
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<td>2.7</td>
<td>9.9</td>
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<td>4</td>
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<td>Feed-in system</td>
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<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
</tr>
</tbody>
</table>

**Legend:**
- EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)

*As of 30 September 2021*
## Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (4/7)

### In operation

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<tr>
<th>Country</th>
<th>Fürth</th>
<th>Görike</th>
<th>Grevenbroich</th>
<th>Harthäuser Wald</th>
<th>Hasel</th>
<th>Haupersweiler</th>
<th>Hemme</th>
<th>Homburg</th>
<th>Ilshofen-Ruppertshofen</th>
<th>Kemberg II</th>
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<tbody>
<tr>
<td><strong>Germany</strong></td>
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<td><strong>Technology</strong></td>
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<tr>
<td><strong>Type of turbine</strong></td>
<td>Nordex N131</td>
<td>Vestas V90</td>
<td>Vestas V90 GS</td>
<td>Enercon E-115</td>
<td>Vestas V126</td>
<td>Nordex N117</td>
<td>Jacobs 48/600</td>
<td>Nordex N117</td>
<td>Enercon E-101</td>
<td>Vestas V90</td>
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<td><strong>Total capacity in MW</strong></td>
<td>16.5</td>
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<td>2</td>
<td>54</td>
<td>9.9</td>
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<td>2.4</td>
<td>9.6</td>
<td>6.1</td>
<td>12</td>
</tr>
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<td><strong>Number of turbines</strong></td>
<td>5</td>
<td>5</td>
<td>1</td>
<td>18</td>
<td>3</td>
<td>6</td>
<td>4</td>
<td>4</td>
<td>2</td>
<td>6</td>
</tr>
<tr>
<td><strong>Feed-in system</strong></td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
</tr>
</tbody>
</table>

as of 30 September 2021

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
### Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (5/7)

#### In operation

<table>
<thead>
<tr>
<th>Country</th>
<th>Königsheim</th>
<th>Königsbronn</th>
<th>Langenburg</th>
<th>Leddin II</th>
<th>Müncheberg</th>
<th>Neuruppin</th>
<th>Niederlinxweiler</th>
<th>Nonnweiler</th>
<th>OberRamstadt</th>
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</thead>
<tbody>
<tr>
<td><strong>Technology</strong></td>
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<tr>
<td><strong>Type of turbine</strong></td>
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<td>E138</td>
<td>Vestas V126</td>
<td>Vestas V90</td>
<td>Vestas V90</td>
<td>Vestas V90</td>
<td>Nordex N117</td>
<td>Nordex N117</td>
<td>SWT130</td>
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<td>16</td>
<td>4.8</td>
<td>4.8</td>
<td>4.8</td>
</tr>
<tr>
<td><strong>Number of turbines</strong></td>
<td>2</td>
<td>1</td>
<td>10</td>
<td>1</td>
<td>4</td>
<td>8</td>
<td>2</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td><strong>Feed-in system</strong></td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
<td>EEG 2014 and older</td>
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<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
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</tbody>
</table>

as of 30 September 2021

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
### Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (6/7)

#### In operation

| Country | Location     | Country | Technology | Type of turbine | Technology | Total capacity in MW | Number of turbines | Commissioning date | Feed-in system |
|---------|--------------|---------|------------|-----------------|------------|----------------------|--------------------|-------------------|----------------|---|
| Obhausen | Germany      | Oldendorf | Germany    | Onshore         | Enercon E66 | 36                   | 20                 | 2000-2002         | EEG 2014 and older |
| Oster-cappeln | Germany | Prötzel | Germany    | Onshore         | Enercon E53 | 12                   | 15                 | Dec 2010           | EEG 2014 and older |
| Prötzel I | Germany     | Rosenberg | Germany   | Onshore         | Nordex S70 | 18                   | 12                 | Nov 2016           | EEG 2014 and older |
| Prötzel | Germany      | Rositz | Germany    | Onshore         | Vestas V80 | 18                   | 9                  | 2006              | EEG 2014 and older |
| Rosenberg | Germany    | Rot am See | Germany   | Onshore         | Enercon E115 | 9                   | 3                  | May 2020          | EEG 2017 |
| Süd | Germany | Schnittlingen | Germany   | Onshore         | Vestas V80 | 20                   | 10                 | Dec 2017           | EEG 2014 and older |
| | | | | Onshore         | Nordex N131 | 6.6                 | 2              | Sep 2017           | EEG 2014 and older |
| | | | | Onshore         | Nordex S70 | 13.5                | 9              | Nov 2016           | EEG 2014 and older |
| | | | | Onshore         | Vestas V126 | 13.2                | 4              | Sep 2016           | EEG 2014 and older |
| | | | | Onshore         | DeWind D6   | 1                   | 1              | Jun 2019           | EEG 2014 and older |
| | | | | Onshore         |             |                     |                 | Dec 2002           | EEG 2014 and older |

**Notes:**
- EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
- As of 30 September 2021
## Sustainable Generation Infrastructure: Onshore wind in Germany - installed wind farms (7/7)

### In operation

<table>
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<th>Schulenburg II</th>
<th>Schwienau II</th>
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<th>Söllenthin</th>
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<tbody>
<tr>
<td>Technology</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
</tr>
<tr>
<td>Type of turbine</td>
<td>Enercon E82</td>
<td>Vestas V90</td>
<td>Vestas V80</td>
<td>Vestas V90</td>
<td>Repower MM92</td>
<td>Vestas V80</td>
<td>Nordex N131</td>
<td>Enercon E66</td>
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</tr>
<tr>
<td>Total capacity in MW</td>
<td>2</td>
<td>6</td>
<td>10</td>
<td>12.6</td>
<td>6.15</td>
<td>4</td>
<td>9.9</td>
<td>14.4</td>
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<tr>
<td>Number of turbines</td>
<td>1</td>
<td>3</td>
<td>5</td>
<td>3</td>
<td>3</td>
<td>2</td>
<td>3</td>
<td>8</td>
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</tr>
<tr>
<td>Feed-in system</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td></td>
</tr>
</tbody>
</table>

*as of 30 September 2021*

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
## Sustainable Generation Infrastructure: Onshore wind in France - portfolio and installed wind farms (1/2)

<table>
<thead>
<tr>
<th>Location</th>
<th>Audinctxun</th>
<th>Belleuse</th>
<th>Bernagues</th>
<th>Cap Espigne</th>
<th>Cap Redounde</th>
<th>Champs Perdus</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
</tr>
<tr>
<td>Type of turbine</td>
<td>Enercon E92</td>
<td>Vestas V100</td>
<td>Enercon E70</td>
<td>Enercon E70</td>
<td>Alstom Eco 62</td>
<td>Alstom Eco 110</td>
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<tr>
<td>Total capacity in MW</td>
<td>14.1</td>
<td>11.0</td>
<td>16.1</td>
<td>16.1</td>
<td>3.9</td>
<td>12.0</td>
</tr>
<tr>
<td>Number of turbines</td>
<td>6</td>
<td>5</td>
<td>7</td>
<td>7</td>
<td>3</td>
<td>4</td>
</tr>
<tr>
<td>Remuneration</td>
<td>FiP</td>
<td>FiP</td>
<td>FiT</td>
<td>FiT</td>
<td>FiT</td>
<td>FiT</td>
</tr>
</tbody>
</table>

### Installed total power in MW: 172

- Number of turbines: 80
- Number of locations: 13

As of 30 September 2021

FiP: Feed-in-Premium (Contract for Difference) post Decree of 13 December 2016

FiT: Feed-in-Tarif prior to Decree of 13 December 2016

AO CRE 1: First wind tender (December 2017 - April 2021)
### Sustainable Generation Infrastructure: Onshore wind in France - installed wind farms (2/2)

#### In operation

<table>
<thead>
<tr>
<th>Location</th>
<th>Gramentes</th>
<th>La Bessiere</th>
<th>Puech de Cambert</th>
<th>Puech de l'Homme</th>
<th>Saint Félix</th>
<th>Sommereux</th>
<th>St. Jean-Lachalm II</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>France, Aude (11)</strong></td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
</tr>
<tr>
<td><strong>France, Tarn (81)</strong></td>
<td>Enercon E82</td>
<td>Enercon E70</td>
<td>Alstom Eco 62</td>
<td>Enercon E70</td>
<td>Vestas V100</td>
<td>Onshore</td>
<td>Enercon E70</td>
</tr>
<tr>
<td><strong>France, Tarn (81)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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<tr>
<td><strong>France, Charente-Maritime (17)</strong></td>
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<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>France, Oise (60)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>France, Haute-Loire (43)</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
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</tr>
<tr>
<td><strong>Total capacity in MW</strong></td>
<td>13.8</td>
<td>13.8</td>
<td>11.7</td>
<td>16.1</td>
<td>19.8</td>
<td>17.6</td>
<td>6.0</td>
</tr>
<tr>
<td><strong>Number of turbines</strong></td>
<td>6</td>
<td>6</td>
<td>9</td>
<td>7</td>
<td>9</td>
<td>8</td>
<td>3</td>
</tr>
<tr>
<td><strong>Remuneration</strong></td>
<td>FiP</td>
<td>FiT</td>
<td>FiT</td>
<td>FiT</td>
<td>FiP / A0 CRE1</td>
<td>A0 CRE 1</td>
<td>FiT</td>
</tr>
</tbody>
</table>

*as of 30 September 2021

FiT: Feed-in-Tarif prior to Decree of 13 December 2016

FiP: Feed-in-Premium (Contract for Difference) post Decree of 13 December 2016

A0 CRE 1: First wind tender (December 2017 – April 2021)
Sustainable Generation Infrastructure: Onshore wind in Sweden – portfolio and development

**In operation**

- Installed total power in MW: 120.1
- Number of turbines: 55
- Number of locations: 8

**Development**

- Total power in MW: appr. 250
- Number of turbines: appr. 37
- Number of locations: 6

Secured projects in development phase with focus in the south of Sweden

Focus area of EnBW

as of 30 September 2021
### Sustainable Generation Infrastructure: Onshore wind in Sweden - installed wind farms

**In operation**

<table>
<thead>
<tr>
<th>Country</th>
<th>Bliekevare</th>
<th>Brahehus</th>
<th>Granberget</th>
<th>Hedbodberget</th>
<th>Kultorp</th>
<th>Råmmarehemmet</th>
<th>Röbergsfjället</th>
<th>Säliträdberget</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Technology</strong></td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
<td>Onshore</td>
</tr>
<tr>
<td><strong>Type of turbine</strong></td>
<td>Vestas V90</td>
<td>Siemens SWT101</td>
<td>Vestas V90</td>
<td>Vestas V90</td>
<td>Nordex N90</td>
<td>Enercon E138</td>
<td>Vestas V90</td>
<td>Vestas V90</td>
</tr>
<tr>
<td><strong>Total capacity in MW</strong></td>
<td>32</td>
<td>11.5</td>
<td>10</td>
<td>12</td>
<td>10</td>
<td>12.6</td>
<td>16</td>
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<tr>
<td><strong>Number of turbines</strong></td>
<td>16</td>
<td>5</td>
<td>5</td>
<td>6</td>
<td>4</td>
<td>3</td>
<td>8</td>
<td>8</td>
</tr>
</tbody>
</table>

**as of 30 September 2021**
Sustainable Generation Infrastructure: Onshore wind in Czech Republic - portfolio

In operation

<table>
<thead>
<tr>
<th>Country</th>
<th>Horní Částkov</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technology</td>
<td>Czech Republic</td>
</tr>
<tr>
<td>Type of turbine</td>
<td>Onshore</td>
</tr>
<tr>
<td>Total capacity in MW</td>
<td>VESTAS V90</td>
</tr>
<tr>
<td>Number of turbines</td>
<td>4</td>
</tr>
<tr>
<td>Number of locations</td>
<td>2</td>
</tr>
<tr>
<td>Commissioning date</td>
<td>Jul 2009</td>
</tr>
<tr>
<td>Feed-in system</td>
<td>Green Bonus</td>
</tr>
</tbody>
</table>

as of 30 September 2021
Sustainable Generation Infrastructure: Photovoltaics portfolio and pipeline

Portfolio and pipeline\(^1\) (in MWp)

- Besides projects within the EEG system, EnBW focuses on developing projects on a larger scale without feed-in tariff

Regional distribution of the 2021 portfolio and pipeline\(^2\) as of 11 August 2021

---

1. In Germany and abroad
2. In Germany
3. Portfolio consists of 328 MWp Germany, 80 MWp France, 26 MWp Czech Republic, 3 MWp Switzerland
4. Negotiations for land contracts
5. At least land contracts concluded
6. Wind parks in operation with EnBW majority shareholding

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
Sustainable Generation Infrastructure: Photovoltaics in Germany – portfolio and under construction

### Portfolio

- **Country**: Germany
- **Technology**: Solar
- **Total capacity in MWp**: 151
- **Operation date**: Mar 2022
- **Feed-in system**: Without EEG funding

### Under construction

#### Alttrebbin
- **Country**: Germany
- **Technology**: Solar
- **Total capacity in MWp**: 152
- **Operation date**: Mar 2022
- **Feed-in system**: Without EEG funding

#### Gottesgabe
- **Country**: Germany
- **Technology**: Solar
- **Total capacity in MWp**: 28
- **Operation date**: Oct 2021
- **Feed-in system**: EEG 2017 (partly)

#### Maßbach
- **Country**: Germany
- **Technology**: Solar
- **Total capacity in MWp**: 9
- **Operation date**: Dec 2021
- **Feed-in system**: EEG 2017

---

*as of 30 September 2021*  
*EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)*  
*The number of solar parks shown neither adds up to > 100 nor to 328 MWp. Small solar installations e.g. at city halls and schools as well as solar parks of subsidiaries are not included.*
### Sustainable Generation Infrastructure: Photovoltaics in Germany – installed solar parks (1/3)

#### Portfolio

<table>
<thead>
<tr>
<th>Country</th>
<th>Aitrach</th>
<th>Berghülen</th>
<th>Birkenfeld</th>
<th>Eggesin</th>
<th>Ingoldingen</th>
<th>Inzigkofen</th>
<th>Krautheim</th>
<th>Leibertingen</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Country</strong></td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
</tr>
<tr>
<td><strong>Total capacity in MWp</strong></td>
<td>1.5</td>
<td>2.7</td>
<td>5.8</td>
<td>10.0</td>
<td>4.3</td>
<td>7.5</td>
<td>0.5</td>
<td>2.1</td>
</tr>
<tr>
<td><strong>Feed-in system</strong></td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
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</tbody>
</table>

**as of 30 September 2021**

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
<table>
<thead>
<tr>
<th>Country</th>
<th>Leibertingen II</th>
<th>Leutkirch-Haid 1</th>
<th>Leutkirch-Haid 2</th>
<th>Leutkirch 2b</th>
<th>Lindendorf</th>
<th>Löffingen</th>
<th>March-Neureshausen</th>
<th>Müssentin</th>
</tr>
</thead>
<tbody>
<tr>
<td>Country</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
<td>Germany</td>
</tr>
<tr>
<td>Total capacity in MWp</td>
<td>5.0</td>
<td>4.9</td>
<td>2.9</td>
<td>0.8</td>
<td>6.9</td>
<td>2.7</td>
<td>0.9</td>
<td>9.1</td>
</tr>
<tr>
<td>Feed-in system</td>
<td>EEG 2017</td>
<td>EEG 2014</td>
<td>EEG 2014</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
<td>EEG 2014</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
</tr>
</tbody>
</table>

* EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
## Sustainable Generation Infrastructure: Photovoltaics in Germany – installed solar parks (3/3)

### Portfolio

<table>
<thead>
<tr>
<th>Country</th>
<th>Riedlingen-Zwieffaltendorf</th>
<th>Sophienhof I</th>
<th>Torgau</th>
<th>Tunningen</th>
<th>Ulm-Eggingen</th>
<th>Ulrichshof</th>
<th>Weesow-Willmersdorf</th>
<th>Welgesheim</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Total capacity in MWp</strong></td>
<td>5.3</td>
<td>8.8</td>
<td>4.7</td>
<td>4.5</td>
<td>6.5</td>
<td>6.6</td>
<td>187</td>
<td>3.2</td>
</tr>
<tr>
<td><strong>Feed-in system</strong></td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
<td>EEG 2017</td>
<td>EEG 2014 and older</td>
<td>EEG 2014 and older</td>
<td>EEG 2017</td>
<td>Without EEG funding</td>
<td>EEG 2017</td>
</tr>
</tbody>
</table>

(as of 30 September 2021)

EEG: Erneuerbare Energien-Gesetz (Renewable Energy Act)
Sustainable Generation Infrastructure: Photovoltaics in France - portfolio and under construction

Portfolio

Installed total power: 80.2 MWp
Number of solar parks: 16

Under construction

<table>
<thead>
<tr>
<th>Location</th>
<th>Châteauvert I</th>
<th>Châteauvert II</th>
<th>Cordesse</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Location</strong></td>
<td>France, Var (83)</td>
<td>France, Var (83)</td>
<td>France, Var (83)</td>
</tr>
<tr>
<td><strong>Technology</strong></td>
<td>Ground mounted with trackers</td>
<td>Ground mounted</td>
<td>Ground mounted</td>
</tr>
<tr>
<td><strong>Total capacity in MWp</strong></td>
<td>12.0</td>
<td>11.0</td>
<td>5.0</td>
</tr>
<tr>
<td><strong>Commissioning</strong></td>
<td>Oct 2021</td>
<td>Oct 2021</td>
<td>Oct 2021</td>
</tr>
<tr>
<td><strong>Remuneration</strong></td>
<td>AO CRE1</td>
<td>AO CRE 4</td>
<td>AO CRE 4</td>
</tr>
</tbody>
</table>

as of 30 September 2021

AO CRE 1: First solar tender (September 2011)
AO CRE 4: Fourth ground solar tender (February 2017 – July 2021)
## Portfolio

<table>
<thead>
<tr>
<th>Location</th>
<th>Technology</th>
<th>Total capacity in MWp</th>
<th>Commissioning</th>
<th>Remuneration</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beaucaire</td>
<td>Rooftop</td>
<td>3.7</td>
<td>Sep 2019</td>
<td>AO CRE4</td>
</tr>
<tr>
<td>Exideuil</td>
<td>Ground mounted</td>
<td>9.7</td>
<td>Dec 2020</td>
<td>AO CRE4</td>
</tr>
<tr>
<td>Isle-sur-la-Sorge</td>
<td>3 x Rooftop 1 x Sunshade</td>
<td>2.0</td>
<td>Nov 2019</td>
<td>AO CRE 4</td>
</tr>
<tr>
<td>Le Val</td>
<td>Ground mounted</td>
<td>7.2</td>
<td>Aug 2015</td>
<td>AO CRE 1</td>
</tr>
<tr>
<td>Megasol</td>
<td>Ground mounted</td>
<td>6.2</td>
<td>Aug 2016</td>
<td>AO CRE 1</td>
</tr>
<tr>
<td>Montégut</td>
<td>Ground mounted</td>
<td>5.0</td>
<td>Nov 2020</td>
<td>AO CRE 4</td>
</tr>
<tr>
<td>Saint Laurent Solar</td>
<td>Rooftop</td>
<td>4.8</td>
<td>Apr 2012</td>
<td>FiT</td>
</tr>
</tbody>
</table>

**Location**
- France, Gard (30)
- France, Charente (16)
- France, Vaucluse (84)
- France, Var (83)
- France, Bouches-du-Rhône (13)
- France, Gers (32)
- France, Gard (30)

**Technology**
- Rooftop
- Ground mounted
- 3 x Rooftop 1 x Sunshade
- Ground mounted
- Ground mounted
- Ground mounted
- Ground mounted
- Rooftop

**Total capacity in MWp**
- 3.7
- 9.7
- 2.0
- 7.2
- 6.2
- 5.0
- 4.8

**Commissioning**
- Sep 2019
- Dec 2020
- Nov 2019
- Aug 2015
- Aug 2016
- Nov 2020
- Apr 2012

**Remuneration**
- AO CRE4
- AO CRE4
- AO CRE 4
- AO CRE 1
- AO CRE 1
- AO CRE 4
- FiT

---

**As of 30 September 2021**
- AO CRE 1: First solar tender (September 2011)
- AO CRE 4: Fourth ground solar tender (February 2017 – July 2021)

**FIT**: Feed-In tariffs prior to September 2011
## Sustainable Generation Infrastructure: Photovoltaics in France - installed solar parks (2/2)

### Portfolio

<table>
<thead>
<tr>
<th>Location</th>
<th>Saint Mamet</th>
<th>Severac</th>
<th>St Quentin la Tour</th>
<th>Sycala</th>
<th>TEA Fleury Ouest</th>
<th>Terres Rouges I</th>
<th>Terres Rouges II</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Technology</strong></td>
<td>Rooftop</td>
<td>ground-mounted</td>
<td>Ground mounted</td>
<td>Ground mounted</td>
<td>Sunshade</td>
<td>Ground mounted</td>
<td>Ground mounted</td>
</tr>
<tr>
<td><strong>Total capacity in MWp</strong></td>
<td>2.8</td>
<td>5.0</td>
<td>3.1</td>
<td>8.0</td>
<td>10.0</td>
<td>7.1</td>
<td>5.6</td>
</tr>
<tr>
<td><strong>Remuneration</strong></td>
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<td>AO CRE 4</td>
<td>AO CRE 4</td>
<td>FIT</td>
<td>AO CRE 4</td>
<td>FIT</td>
<td>AO CRE 2</td>
</tr>
</tbody>
</table>

**as of 30 September 2021**

AO CRE 2: Second solar tender (March 2013)

AO CRE 4: Fourth ground solar tender (February 2017 – July 2021)

FIT: Feed-In tariffs prior to September 2011

FiT: Feed-In tariffs from September 2011
## Sustainable Generation Infrastructure: Photovoltaics in Czech Republic - portfolio and installed solar parks

### Portfolio

<table>
<thead>
<tr>
<th>Country</th>
<th>Total capacity in MWp</th>
<th>Operation date</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Installed total power</strong></td>
<td>26 MW</td>
<td></td>
</tr>
<tr>
<td><strong>Number of solar parks</strong></td>
<td>14</td>
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</table>

<table>
<thead>
<tr>
<th>Country</th>
<th>FVE Dačice</th>
<th>FVE Hořovice</th>
<th>FVE Hrouda</th>
<th>FVE Jinonice</th>
<th>FVE Kondrac</th>
<th>FVE Lhotka</th>
<th>FVE Mikulov</th>
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</thead>
<tbody>
<tr>
<td>Total capacity in MWp</td>
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<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
</tr>
<tr>
<td>26 MW</td>
<td>4.848</td>
<td>1.087</td>
<td>0.028</td>
<td>0.173</td>
<td>1.109</td>
<td>0.060</td>
<td>0.941</td>
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</table>

<table>
<thead>
<tr>
<th>Country</th>
<th>FVE Ořechovská</th>
<th>FVE Pozorka</th>
<th>FVE Pozořice</th>
<th>FVE Pražačka (I-III)</th>
<th>FVE Rajhradská</th>
<th>FVE Sever</th>
<th>FVE Světlík</th>
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</thead>
<tbody>
<tr>
<td>Total capacity in MWp</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
<td>Czech Republic</td>
</tr>
<tr>
<td>26 MW</td>
<td>3.168</td>
<td>3.998</td>
<td>4.596</td>
<td>0.138</td>
<td>3.168</td>
<td>0.204</td>
<td>2.154</td>
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</tbody>
</table>

*as of 30 September 2021*
### Sustainable Generation Infrastructure: Hydropower plants

<table>
<thead>
<tr>
<th>Run-of-river (in MW)</th>
<th>Pumped storage (in MW)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rhine power plants</td>
<td></td>
</tr>
<tr>
<td>Neckar, Donau, Murg, Nagold, Enz, Glatt, Jagst, Kocher, Argen</td>
<td>870</td>
</tr>
<tr>
<td>Iller power plants</td>
<td></td>
</tr>
<tr>
<td>EnAlpin</td>
<td>1,049</td>
</tr>
<tr>
<td></td>
<td></td>
</tr>
<tr>
<td>EnBW Factbook 2021</td>
<td></td>
</tr>
<tr>
<td>as of 31 December 2020</td>
<td></td>
</tr>
</tbody>
</table>
Sustainable Generation Infrastructure: Thermal power plants

**Conventional power plants**

<table>
<thead>
<tr>
<th>Plant</th>
<th>Hard-coal</th>
<th>Brown-coal</th>
<th>Gas</th>
<th>Oil</th>
<th>Waste</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Karlsruhe</td>
<td>1,351</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>1,351</td>
</tr>
<tr>
<td>Düsseldorf</td>
<td>827</td>
<td></td>
<td></td>
<td>86</td>
<td>54</td>
<td>967</td>
</tr>
<tr>
<td>Lippendorf</td>
<td>778</td>
<td>875</td>
<td></td>
<td></td>
<td></td>
<td>875</td>
</tr>
<tr>
<td>Heilbronn</td>
<td>778</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>778</td>
</tr>
<tr>
<td>Altbach/Deizisau</td>
<td>336</td>
<td>253</td>
<td></td>
<td></td>
<td></td>
<td>589</td>
</tr>
<tr>
<td>Mannheim</td>
<td>546</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>546</td>
</tr>
<tr>
<td>Rostock</td>
<td>259</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>259</td>
</tr>
<tr>
<td>Walsum</td>
<td>250</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>250</td>
</tr>
<tr>
<td>Stuttgart</td>
<td>55</td>
<td>31</td>
<td>70</td>
<td>53</td>
<td></td>
<td>209</td>
</tr>
<tr>
<td>Walheim</td>
<td></td>
<td>136</td>
<td></td>
<td></td>
<td></td>
<td>136</td>
</tr>
<tr>
<td><strong>Sum</strong></td>
<td><strong>3,052</strong></td>
<td><strong>875</strong></td>
<td><strong>284</strong></td>
<td><strong>292</strong></td>
<td><strong>107</strong></td>
<td><strong>4,610</strong></td>
</tr>
</tbody>
</table>

**Nuclear**

<table>
<thead>
<tr>
<th>Plant</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Neckarwestheim</td>
<td>1,096</td>
</tr>
</tbody>
</table>

**Grid reserve power plants**

<table>
<thead>
<tr>
<th>Plant</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Marbach</td>
<td>426</td>
</tr>
<tr>
<td>Heilbronn</td>
<td>250</td>
</tr>
<tr>
<td>Walheim</td>
<td>244</td>
</tr>
<tr>
<td>Karlsruhe</td>
<td>353</td>
</tr>
<tr>
<td>Altbach</td>
<td>433</td>
</tr>
<tr>
<td><strong>Sum</strong></td>
<td><strong>1,706</strong></td>
</tr>
</tbody>
</table>

---

1 Major power plants in Germany, as of 31 December 2020
2 Continued temporary operation of 9 power plant units due to system relevance: HLB 5/6, MAR DT III, MAR GT II, MAR GT III, WAL 1/2, RDK4s and ALT HKW1
Borusan EnBW Enerji, based in Istanbul, was founded in summer 2009 as a joint venture between EnBW and the Turkish company Borusan.

The aim of the joint venture is to build up generation capacities in the field of renewable energies in Turkey.

---

1 Generation capacity not consolidated, figures as of 31 December 2020
Sustainable Generation Infrastructure:
New-built gas turbine power plant for grid stability purposes in South Germany

Additional capacity needed for grid stability in South Germany

› In 2017, the federal regulatory agency approved 1.2 GW additional power generation capacity in southern Germany to maintain grid stability in the context of the energy transition.
› August 2019: Award of contract for design and installation of 300 MW gas turbine power plant at existing EnBW Marbach a.N. site.

Timeline and next steps
› Construction works on site started mid 2020
› Delivery of the rotating equipment mid 2021
› Commissioning mid 2022
› Commercial operation planned for October 2022
Sustainable Generation Infrastructure: Fuel switch (H₂ readiness)

Planning status

- Fuel switch keeps locations economically viable and contributes to security of supply
- Driven by heat energy transition, priority on locations with integrated district heat provision
- Implementing fuel switch significantly cuts carbon emissions
- Natural gas as interim technology, conversion to biogenic gases such as green hydrogen already provided for

H₂ strategy

- Deployment of gas turbines that allow the admixture of 10%-25% H₂ from the beginning
- Conversion to 100% H₂ combustion already considered in design and business plan of the project

Heilbronn (CCGT plant, 700 MW approx.)
- FID in 2022 and commissioning in 2026 possible

Altbach (CCGT plant, 700 MW approx.)
- FID in 2022 and commissioning in 2026 possible

Stuttgart-Münster (GT plant, 120 MW approx.)
- FID in 2022 and commissioning in 2025 possible

Source: Ansaldo
Sustainable Generation Infrastructure: Expand biogas production

Sustainable production of biogas and biomethane

› Strong growth in biogas plant portfolio from 10 MW rated thermal input in 2017 to 150 MW in 2020; further growth planned
› Options for site development and reuse safeguard plant asset value when subsidies expire, increasingly with upgrading of biogas to biomethane
› EnBW to become market leader in biogas production in Germany

Source: BALANCE Erneuerbare Energien GmbH
Sustainable Generation Infrastructure:
Trading – adapting to generation portfolio & energy markets changes

Diversified activities and managing market risks
› Buying and selling electricity and gas on wholesale markets from intraday to 10 years+
   - Fuel procurement (including emissions) and logistics
   - Dispatching of EnBW assets
› Origination activities for electricity and gas to substitute conventional generation assets by contracts
   - LNG trading activities
   - Renewables PPA business (e.g. intermediary for production and demand)
› Active in various markets
   - Targeted internationalisation: Central Western Europe (e.g. PPA with Blue Elephant Energy in Spain), Nordics and beyond

Smart and digital
› Enhancement of automated trading and improved forecasting

LNG: Liquefied natural gas
PPA: Power purchase agreement
Partner for project developers and investors to manage market risks

» Tailored power purchase agreements for merchant renewables assets

Offering carbon free energy to corporates to reach their sustainability targets

» Corporate PPA and Power Sales Agreements based on renewable projects enable companies (large, medium or small) to realise their sustainability strategies and decarbonisation efforts

Direct marketing

» Marketing of renewable energy plants in the market premium model and route to market services for assets after the support period (post EEG PPA)
EnBW Group: Electricity and gas sales volumes

in bn kWh

<table>
<thead>
<tr>
<th></th>
<th>2020</th>
<th>2019¹</th>
<th>Variance in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Electricity sales volumes</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Retail and commercial customers [B2C]</td>
<td>14.3</td>
<td>14.8</td>
<td>-3.4</td>
</tr>
<tr>
<td>Business and industrial customers [B2B]</td>
<td>20.0</td>
<td>20.5</td>
<td>-2.4</td>
</tr>
<tr>
<td>Trading</td>
<td>73.0</td>
<td>117.3</td>
<td>-37.8</td>
</tr>
<tr>
<td><strong>Gas sales volumes</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Retail and commercial customers [B2C]</td>
<td>17.1</td>
<td>17.4</td>
<td>-1.7</td>
</tr>
<tr>
<td>Business and industrial customers [B2B]</td>
<td>199.7</td>
<td>166.0</td>
<td>20.3</td>
</tr>
<tr>
<td>Trading</td>
<td>224.3</td>
<td>178.4</td>
<td>26.0</td>
</tr>
</tbody>
</table>

¹ The figures for the previous year have been restated
## Multi-year overview (1/2)

### EnBW Group

#### Earnings

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>External revenue²</td>
<td>€ m</td>
<td>19,694</td>
<td>19,436</td>
<td>20,815</td>
<td>21,974</td>
</tr>
<tr>
<td>Adjusted EBITDA</td>
<td>€ m</td>
<td>2,781</td>
<td>2,433</td>
<td>2,158</td>
<td>2,133</td>
</tr>
<tr>
<td>Adjusted Group net profit/loss¹</td>
<td>€ m</td>
<td>596</td>
<td>787</td>
<td>438</td>
<td>793</td>
</tr>
</tbody>
</table>

#### Balance sheet

<table>
<thead>
<tr>
<th></th>
<th></th>
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<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Equity</td>
<td>€ m</td>
<td>7,769</td>
<td>7,445</td>
<td>6,273</td>
<td>5,863</td>
</tr>
<tr>
<td>Net debt</td>
<td>€ m</td>
<td>14,407</td>
<td>12,852</td>
<td>9,586</td>
<td>8,418</td>
</tr>
<tr>
<td>Net financial debt</td>
<td>€ m</td>
<td>7,232</td>
<td>6,022</td>
<td>3,738</td>
<td>2,918</td>
</tr>
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</table>

#### Cash flow

<table>
<thead>
<tr>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Retained cash flow</td>
<td>€ m</td>
<td>1,639</td>
<td>1,241</td>
<td>999</td>
<td>3,050</td>
</tr>
<tr>
<td>Internal financing capability²</td>
<td>%</td>
<td>102.9</td>
<td>90.0</td>
<td>92.2</td>
<td>111.9</td>
</tr>
</tbody>
</table>

#### Profitability

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Return on capital employed (ROCE)</td>
<td>%</td>
<td>6.3</td>
<td>5.2</td>
<td>6.5</td>
<td>7.3</td>
</tr>
<tr>
<td>Value added</td>
<td>€ m</td>
<td>253</td>
<td>0</td>
<td>32</td>
<td>152</td>
</tr>
<tr>
<td>Earnings per share²</td>
<td>€</td>
<td>2.20</td>
<td>2.71</td>
<td>1.23</td>
<td>7.58</td>
</tr>
<tr>
<td>Dividend per share/dividend payout ratio³</td>
<td>€</td>
<td>1.00/40</td>
<td>0.70/40</td>
<td>0.65/40</td>
<td>0.50/17</td>
</tr>
</tbody>
</table>

#### Energy sales

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Electricity</td>
<td>bn kWh</td>
<td>107</td>
<td>153</td>
<td>137</td>
<td>122</td>
</tr>
<tr>
<td>Gas²</td>
<td>bn kWh</td>
<td>442</td>
<td>362</td>
<td>329</td>
<td>250</td>
</tr>
</tbody>
</table>

¹ In relation to the profit/loss attributable to the shareholders of EnBW AG
² The figures for the previous year have been restated
³ Adjusted for the valuation effects of IFRS 9 in 2019
## EnBW Group

### Sales segment

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>External revenue1</td>
<td>€ m</td>
<td>9,965</td>
<td>9,350</td>
<td>7,348</td>
<td>7,354</td>
</tr>
<tr>
<td>Adjusted EBITDA1</td>
<td>€ m</td>
<td>335</td>
<td>326</td>
<td>268</td>
<td>330</td>
</tr>
</tbody>
</table>

### Grids segment

<table>
<thead>
<tr>
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<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>External revenue</td>
<td>€ m</td>
<td>3,657</td>
<td>3,460</td>
<td>3,215</td>
<td>7,472</td>
</tr>
<tr>
<td>Adjusted EBITDA</td>
<td>€ m</td>
<td>1,347</td>
<td>1,355</td>
<td>1,177</td>
<td>1,046</td>
</tr>
</tbody>
</table>

### Renewable Energies segment

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>External revenue</td>
<td>€ m</td>
<td>1,044</td>
<td>653</td>
<td>478</td>
<td>508</td>
</tr>
<tr>
<td>Adjusted EBITDA</td>
<td>€ m</td>
<td>836</td>
<td>483</td>
<td>298</td>
<td>332</td>
</tr>
</tbody>
</table>

### Generation and Trading segment

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>External revenue1</td>
<td>€ m</td>
<td>5,020</td>
<td>6,970</td>
<td>9,768</td>
<td>6,631</td>
</tr>
<tr>
<td>Adjusted EBITDA1</td>
<td>€ m</td>
<td>442</td>
<td>384</td>
<td>431</td>
<td>377</td>
</tr>
</tbody>
</table>

---

1 The figures for the previous year have been restated
# Fiscal year 2020: Financial key performance figures

## Financial and strategic performance indicators

<table>
<thead>
<tr>
<th>Indicator</th>
<th>2020</th>
<th>2019</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Adjusted EBITDA</strong></td>
<td>€ m</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Share of adjusted EBITDA accounted for by Sales</strong></td>
<td>€ m/%</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Share of adjusted EBITDA accounted for by Grids</strong></td>
<td>€ m/%</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Share of adjusted EBITDA accounted for by Renewable Energies</strong></td>
<td>€ m/%</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Share of adjusted EBITDA accounted for by Generation and Trading</strong></td>
<td>€ m/%</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Internal financing capability</strong></td>
<td>%</td>
<td>102.8</td>
<td></td>
</tr>
<tr>
<td><strong>Return On Capital Employed (ROCE)</strong></td>
<td>%</td>
<td>6.3</td>
<td></td>
</tr>
<tr>
<td><strong>Adjusted Group net profit</strong></td>
<td>€ m</td>
<td>682.8</td>
<td></td>
</tr>
<tr>
<td><strong>Group net profit</strong></td>
<td>€ m</td>
<td>596.1</td>
<td></td>
</tr>
<tr>
<td><strong>Earnings per share from Group net profit</strong></td>
<td>€</td>
<td>2.20</td>
<td>-18.8</td>
</tr>
</tbody>
</table>

1 The figures for the previous year have been restated
2 In relation to the profit/loss attributable to the shareholders of EnBW AG
## Fiscal year 2020: Non-financial key performance figures

### Customers and society goal dimension

<table>
<thead>
<tr>
<th></th>
<th>2020</th>
<th>2019</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Reputation Index</strong></td>
<td>55.5</td>
<td>52.8</td>
<td>5.1</td>
</tr>
<tr>
<td><strong>EnBW/Yello Customer Satisfaction Index</strong></td>
<td>132/159</td>
<td>116/157</td>
<td>13.8/1.3</td>
</tr>
<tr>
<td><strong>SAIDI (electricity) in min./year</strong></td>
<td>15</td>
<td>15</td>
<td>-</td>
</tr>
</tbody>
</table>

### Employees goal dimension

<table>
<thead>
<tr>
<th></th>
<th>2020</th>
<th>2019</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>People Engagement Index (PEI)</strong></td>
<td>83</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td><strong>LTIF for companies controlled by the group</strong></td>
<td>2.1/3.6</td>
<td>2.1/3.8</td>
<td>-/-5.3</td>
</tr>
</tbody>
</table>

### Environment goal dimension

<table>
<thead>
<tr>
<th></th>
<th>2020</th>
<th>2019</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Installed output of renewable energies in GW and the share of the generation capacity accounted for by renewable energies in %</strong></td>
<td>4.9/39.0</td>
<td>4.6/31.8</td>
<td>18.9/-</td>
</tr>
<tr>
<td><strong>CO₂ intensity in g/kWh</strong></td>
<td>372</td>
<td>419</td>
<td>-11.7</td>
</tr>
</tbody>
</table>

### Employees of the EnBW Group

<table>
<thead>
<tr>
<th></th>
<th>31.12.2020</th>
<th>31.12.2019</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Employees</strong></td>
<td>24,655</td>
<td>23,293</td>
<td>5.8</td>
</tr>
<tr>
<td><strong>Employee equivalents</strong></td>
<td>23,078</td>
<td>21,843</td>
<td>5.7</td>
</tr>
</tbody>
</table>

---

1. The performance indicator was reported for the first time in 2020 and replaces the Employee Commitment Index (ECI). There is no value for 2019 and no forecasted value for 2020 available.
2. Variations in the group of consolidated companies (all companies with more than 100 employees, excluding external agency workers and contractors, are generally considered).
3. Except for companies in the area of waste management.
4. Number of employees excluding apprentices/trainees and inactive employees.
5. Converted into full-time equivalents.

LTIF: Lost Time Injury Frequency
SAIDI: System Average Interruption Duration Index
### Fiscal year 2020: ROCE and value added

#### Group level

- **ROCE at 6.3% compared to 5.2% in the prior year**
- **Increase in average capital employed**

#### Value added to the EnBW Group by segment

<table>
<thead>
<tr>
<th></th>
<th>Sales</th>
<th>Grids</th>
<th>Renewable Energies</th>
<th>Generation and Trading</th>
<th>Other/Consolidation</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Adjusted EBIT incl. the adjusted investment result € m</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2020</td>
<td>186.5²</td>
<td>205.6³</td>
<td>824.9¹</td>
<td>883.8³</td>
<td>522.5³</td>
<td>283.6³</td>
</tr>
<tr>
<td>2019</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Average capital employed € m</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2020</td>
<td>1,411.4</td>
<td>1,308.8</td>
<td>9,879.6</td>
<td>8,033.3</td>
<td>6,961.9</td>
<td>4,840.6</td>
</tr>
<tr>
<td>2019</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Return On Capital Employed (ROCE) %</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2020</td>
<td>13.2</td>
<td>15.7</td>
<td>8.3</td>
<td>11.0</td>
<td>7.5</td>
<td>5.9</td>
</tr>
<tr>
<td>2019</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Weighted Average Cost of Capital (WACC) %</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>2020</td>
<td>7.4</td>
<td>7.6</td>
<td>4.1</td>
<td>4.2</td>
<td>5.4</td>
<td>5.3</td>
</tr>
<tr>
<td>2019</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Value added € m</strong></td>
<td>81.9</td>
<td>106.0</td>
<td>414.9</td>
<td>546.3</td>
<td>146.2</td>
<td>29.0</td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

1 The figures for the previous year have been restated
2 Investment result of €41.6 m, adjusted for taxes (investment result/0.706 - investment result; with 0.706 = 1 - tax rate 29.4%). Does not include impairment losses and reversals to impairment losses on investments, the result from the sale of equity investments, the share of the result from entities accounted for using the equity method not relevant to the ongoing management of the company and the result from equity investments held as financial assets
3 Investment result of €47.2 m, adjusted for taxes (investment result/0.706 - investment result; with 0.706 = 1 - tax rate 29.4%). Does not include impairment losses and reversals to impairment losses on investments, the result from the sale of equity investments, the share of the result from entities accounted for using the equity method not relevant to the ongoing management of the company and the result from equity investments held as financial assets
### Fiscal year 2020: Segment reporting\(^1\)

**in € m**

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Revenue</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>External revenue</td>
<td>9,964.9</td>
<td>9,350.2</td>
<td>3,657.5</td>
<td>3,459.7</td>
<td>1,044.0</td>
<td>653.1</td>
<td>5,019.8</td>
<td>5,969.5</td>
</tr>
<tr>
<td>Internal revenue</td>
<td>757.2</td>
<td>769.6</td>
<td>1,353.1</td>
<td>1,359.6</td>
<td>460.4</td>
<td>405.0</td>
<td>3,022.7</td>
<td>3,085.0</td>
</tr>
<tr>
<td>Total revenue</td>
<td>10,722.1</td>
<td>10,119.8</td>
<td>5,010.6</td>
<td>4,819.3</td>
<td>1,504.4</td>
<td>1,058.2</td>
<td>8,042.5</td>
<td>9,054.6</td>
</tr>
<tr>
<td><strong>Earnings indicators</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Adjusted EBITDA</td>
<td>335.0</td>
<td>325.9</td>
<td>1,346.6</td>
<td>1,355.3</td>
<td>835.6</td>
<td>499.3</td>
<td>442.2</td>
<td>426.4</td>
</tr>
<tr>
<td>EBITDA</td>
<td>206.1</td>
<td>275.6</td>
<td>1,311.0</td>
<td>1,275.6</td>
<td>803.9</td>
<td>468.2</td>
<td>358.1</td>
<td>225.0</td>
</tr>
<tr>
<td>Scheduled amortization and depreciation</td>
<td>-151.0</td>
<td>-115.3</td>
<td>-553.4</td>
<td>-517.7</td>
<td>-315.3</td>
<td>-221.1</td>
<td>-325.9</td>
<td>-589.4</td>
</tr>
<tr>
<td>Impairment losses</td>
<td>-1.7</td>
<td>0.0</td>
<td>-89.0</td>
<td>-1.1</td>
<td>-68.0</td>
<td>-11.6</td>
<td>-12.2</td>
<td>-148.0</td>
</tr>
<tr>
<td>Net profit/loss from entities accounted for using the equity method</td>
<td>2.8</td>
<td>2.0</td>
<td>14.4</td>
<td>19.1</td>
<td>69.1</td>
<td>1.2</td>
<td>9.1</td>
<td>6.5</td>
</tr>
<tr>
<td>Significant non-cash-relevant items</td>
<td>-61.4</td>
<td>-22.7</td>
<td>-2.1</td>
<td>21.5</td>
<td>3.2</td>
<td>3.9</td>
<td>7.5</td>
<td>48.6</td>
</tr>
</tbody>
</table>

\(^1\) The figures for the previous year have been restated
## First six months 2021: Financial key performance figures

### Financial and strategic performance indicators

<table>
<thead>
<tr>
<th>Category</th>
<th>1.1. – 30.6.2021</th>
<th>1.1. – 30.6.2020</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adjusted EBITDA</td>
<td>€ m</td>
<td>€ m</td>
<td>-6.8</td>
</tr>
<tr>
<td>Share of adjusted EBITDA accounted for by Smart Infrastructure for Customers¹</td>
<td>€ m/%</td>
<td>€ m/%</td>
<td>51.5/-</td>
</tr>
<tr>
<td>Share of adjusted EBITDA accounted for by System Critical Infrastructure¹</td>
<td>€ m/%</td>
<td>€ m/%</td>
<td>-11.2/-</td>
</tr>
<tr>
<td>Share of adjusted EBITDA accounted for by Sustainable Generation Infrastructure¹</td>
<td>€ m/%</td>
<td>€ m/%</td>
<td>-11.3/-</td>
</tr>
<tr>
<td>Share of adjusted EBITDA accounted for by Other/Consolidation¹</td>
<td>€ m/%</td>
<td>€ m/%</td>
<td>-1.7/-</td>
</tr>
<tr>
<td>Adjusted Group net profit²</td>
<td>€ m</td>
<td>€ m</td>
<td>60.5</td>
</tr>
<tr>
<td>Group net profit/loss²</td>
<td>€ m</td>
<td>€ m</td>
<td>-</td>
</tr>
<tr>
<td>Earnings per share from Group net profit/loss²</td>
<td>€</td>
<td>€</td>
<td>-</td>
</tr>
<tr>
<td>Retained cash flow</td>
<td>€ m</td>
<td>€ m</td>
<td>-23.4</td>
</tr>
<tr>
<td>Net cash investment</td>
<td>€ m</td>
<td>€ m</td>
<td>45.8</td>
</tr>
</tbody>
</table>

¹ The figures for the previous year have been restated

² In relation to the profit/loss attributable to the shareholders of EnBW AG
First six months 2021: Non-financial performance indicators

### Customers and society goal dimension

<table>
<thead>
<tr>
<th></th>
<th>1.1. – 30.6.2021</th>
<th>1.1. – 30.6.2020</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>EnBW/Yello Customer Satisfaction Index</td>
<td>127/161</td>
<td>120/159</td>
<td>5.8/1.3</td>
</tr>
<tr>
<td>SAIDI (electricity) in min./year</td>
<td>8</td>
<td>7</td>
<td>14.3</td>
</tr>
</tbody>
</table>

### Employees goal dimension

<table>
<thead>
<tr>
<th></th>
<th>30.06.2021</th>
<th>30.06.2020</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>LTIF for companies controlled by the group^2 / LTIF overall^3</td>
<td>1.7/2.5</td>
<td>1.9/3.1</td>
<td>-10.5/-19.4</td>
</tr>
</tbody>
</table>

### Employees of the EnBW Group^4,5

<table>
<thead>
<tr>
<th></th>
<th>30.06.2021</th>
<th>30.06.2020</th>
<th>Change in %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Employees</td>
<td>24,894</td>
<td>23,685</td>
<td>5.1</td>
</tr>
<tr>
<td>Full-time equivalents^6</td>
<td>23,369</td>
<td>22,184</td>
<td>5.3</td>
</tr>
</tbody>
</table>

LTIF: Lost Time Injury Frequency
SAIDI: System Average Interruption Duration Index

---

1 The values for the key performance indicators Reputation Index, People Engagement Index (PEI), "Installed capacity of renewable energies (RE) in GW and the share of the generation capacity accounted for by RE in %" and CO₂ intensity are exclusively collected at the end of the year

2 Variations in the group of consolidated companies (all companies with more than 100 employees are generally considered except for companies in the area of waste management as well as external agency workers and contractors)

3 Variations in the group of consolidated companies (all companies with more than 100 employees are generally considered except for external agency workers and contractors [except ITOs])

4 Number of employees excluding apprentices/trainees and inactive employees

5 The number of employees for the ITOs (ONTRAS Gastransport GmbH, terranets bw GmbH and TransnetBW GmbH) is only updated at the end of the year; for intervals of less than a year, the number of employees from 31 December 2020 is carried forward

6 Converted into full-time equivalents
## Financial and non-financial KPIs and targets:
### Finance and strategy goal dimensions

<table>
<thead>
<tr>
<th>Goal</th>
<th>KPI</th>
<th>2020</th>
<th>Target 2020</th>
<th>Target 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Finance</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Secure profitability</td>
<td>Adjusted EBITDA in € bn</td>
<td>2.8</td>
<td>2.3–2.5</td>
<td>3.2</td>
</tr>
<tr>
<td>Managing the financial profile</td>
<td>Internal financing capability in %</td>
<td>102.8</td>
<td>&gt; 100</td>
<td>&gt; 121</td>
</tr>
<tr>
<td></td>
<td>Debt repayment potential in %</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
<tr>
<td>Increasing Group value</td>
<td>Return On Capital Employed (ROCE) in %</td>
<td>6.3</td>
<td>8.5 - 11</td>
<td>6.5–8</td>
</tr>
<tr>
<td><strong>Strategy</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Share of result accounted for by “Customer proximity”/Sales</td>
<td>Share of overall adjusted EBITDA in € bn/in %</td>
<td>0.3/12.0</td>
<td>0.4/15.0</td>
<td>0.6/20.0</td>
</tr>
<tr>
<td>Share of result accounted for by Grids</td>
<td>Share of overall adjusted EBITDA in € bn/in %</td>
<td>1.3/48.8</td>
<td>1.0/40.0</td>
<td>1.3/40.0</td>
</tr>
<tr>
<td>Share of result accounted for by Renewable Energies</td>
<td>Share of overall adjusted EBITDA in € bn/in %</td>
<td>0.8/30.0</td>
<td>0.7/30.0</td>
<td>1.3/40.0</td>
</tr>
<tr>
<td>Share of result accounted for by Generation and Trading</td>
<td>Share of overall adjusted EBITDA in € bn/in %</td>
<td>0.4/15.9</td>
<td>0.3/15.0</td>
<td></td>
</tr>
</tbody>
</table>

1 Following the transition to the growth strategy, the internal financing capability will be replaced by the new key performance indicator debt repayment potential from 2021 onwards. To achieve the unchanged goal of maintaining a solid investment-grade rating, EnBW regularly checks the 2025 target value for the debt repayment potential for managing its financial profile. This was stated in the Integrated Annual Report 2019 as >14%. The adjusted target of >12% will allow the company to take advantage of opportunities for growth while simultaneously maintaining its solid investment-grade rating. The rating target will still be guaranteed by the new target value.

2 The four segments of Sales, Grids, Renewable Energies and Generation and Trading will become the three strategic business fields of “Smart infrastructure for customers,” “System critical infrastructure” and “Sustainable generation infrastructure” from 2021.
Financial and non-financial KPIs and targets:
Other goal dimensions

<table>
<thead>
<tr>
<th>Goal</th>
<th>KPI</th>
<th>2020</th>
<th>Target 2020</th>
<th>Target 2025</th>
</tr>
</thead>
<tbody>
<tr>
<td>Customers and society</td>
<td>Reputation</td>
<td>56</td>
<td>55</td>
<td>58 to 62</td>
</tr>
<tr>
<td></td>
<td>Customer proximity</td>
<td>132 / 159</td>
<td>&gt; 136/&gt; 159</td>
<td>125 to 136/148 to 159</td>
</tr>
<tr>
<td></td>
<td>Supply reliability</td>
<td>15</td>
<td>&lt; 25</td>
<td>&lt; 20</td>
</tr>
<tr>
<td>Employees</td>
<td>Engagement of employees</td>
<td>83</td>
<td>-</td>
<td>77 to 83²</td>
</tr>
<tr>
<td></td>
<td>Occupational safety</td>
<td>2.1</td>
<td>≤ previous year</td>
<td>2.1</td>
</tr>
<tr>
<td></td>
<td></td>
<td>3.8</td>
<td></td>
<td>3.5</td>
</tr>
<tr>
<td>Environment</td>
<td>Expand renewable energies (RE)</td>
<td>4.9/39.0</td>
<td>5.0/&gt; 40</td>
<td>7.5 to 8.0/&gt; 50⁵</td>
</tr>
<tr>
<td></td>
<td>and the share of the generation capacity accounted for by RE in %</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>Climate protection</td>
<td>372</td>
<td>-15% to -20% (reference year 2015: 609 g/kWh)</td>
<td>-10% to -20%⁵ (reference year 2018)</td>
</tr>
</tbody>
</table>

1 The performance indicator was reported for the first time in 2020 and replaces the Employee Commitment Index (ECI) as a key performance indicator. There is no target value available for 2020. Variations in the group of consolidated companies [all companies with more than 100 employees are generally considered [except ITOs]]

2 Due to the extraordinary effects relating to the coronavirus pandemic in the year this key performance indicator was introduced, we may need to adjust this target value during the strategy period.

3 Variations in the group of consolidated companies [all companies with more than 100 employees, excluding external agency workers and contractors, are generally considered].

4 Excluding companies in the area of waste management

5 The 2025 target values for installed output of RE and share of generation capacity accounted for by RE and CO₂ intensity were examined and adjusted based on the target of climate neutrality. The target figures for the expansion of RE were adjusted due to slowed approval processes and grid connection and feed-in forecasts. The reference year for CO₂ intensity was adjusted to 2018 because the 2020 reporting year cannot be considered representative for the coming years (due to, among other things, market effects and the coronavirus pandemic)

6 Includes redispatch deployment

7 Nuclear generation is not included in the calculation for the key performance indicator CO₂ intensity. The CO₂ intensity including nuclear generation for the reporting year was 268 g/kWh (previous year: 235 g/kWh)

LTIF: Lost Time Injury Frequency
SAIDI: System Average Interruption Duration Index
Capital markets

EnBW at a glance ................................................. 02
Market environment ........................................... 05
Strategy ............................................................. 34
Corporate sustainability ....................................... 49
Business segments .............................................. 69

Key financials and non-financials ............................. 126

Capital markets
  › Financial management
  › Bonds
  › Credit ratings
  › Share
  › Shareholder structure
  › Financing strategy

Corporate governance ........................................... 150
Service ............................................................. 156
Financial objectives and financing strategy

EnBW’s financial objectives

- Flexible access to capital markets
- Well-diversified portfolio of financing sources
- Solid investment grade ratings
- Management of credit metrics by KPI debt repayment potential
- Close integration of corporate and financing strategy

EnBW’s financing strategy

- Multi-pillar strategy to ensure maximum flexibility in financing
- Diversified market and investor approach
- Funding mix complemented by ESG linked instruments
- Well-balanced maturity profile
- Subordinated capital to support senior debt holders
Financial asset management: Covering the Group’s pension and nuclear provisions while also considering ESG criteria

Investment targets

- Risk-optimised investments with performance in line with market trends
- Ensuring the functionality of EnBW’s Asset Liability Management Model at the same time

Rising number of EnBW’s asset managers incorporate ESG criteria in their investment decisions

ESG criteria are linked to EnBW’s overall UN-SDG Strategy:

- Improvements in climate protection
- Risk minimisation through the governance factor (e.g. reputation, fraud, corruption).
- Ensure diversity to avoid undesired risk concentration

Strategic asset allocation

- Euro government bonds
- Euro corporate bonds investment grade
- Euro corporate bonds high yield
- USD corporate bonds investment grade
- Equities Eurozone
- Global Equities
- Real Estate
- Private equity
- Infrastructure
Asset Liability Management Model
Management of financing needs for pension and nuclear obligations

EnBW's cash flow-based model
(in € m)

Nuclear and pension provisions

Financial assets

100% Coverage projected 2036

€350 m impact on OCF in 2020

No impact on OCF

OCF contribution
Asset contribution

as of 31 December 2020
OCF: Operating cash flow

1 Adjusted with inflation thereafter
EnBW has flexible access to various financing sources 1,2

<table>
<thead>
<tr>
<th>Source</th>
<th>Amount (€ bn)</th>
<th>Utilised</th>
</tr>
</thead>
<tbody>
<tr>
<td>Debt Issuance Programme</td>
<td>7.0</td>
<td></td>
</tr>
<tr>
<td>- Subordinated bonds</td>
<td>2.5</td>
<td></td>
</tr>
<tr>
<td>- Commercial Paper Programme</td>
<td>2.0</td>
<td></td>
</tr>
<tr>
<td>- Sustainable syndicated credit line</td>
<td>1.5</td>
<td>€0.1</td>
</tr>
<tr>
<td>- Committed bilateral credit lines</td>
<td>1.2</td>
<td>€0.1</td>
</tr>
</tbody>
</table>

1 As of 30 June 2021
2 Rounded figures
3 Following exercise of the first annual renewal option after the first year. There is a second renewal option after the second year with the potential maximum term until end of June 2027
Liquidity management at EnBW

**Integrated planning process**
- System based inhouse bank approach “EnBW Cashpool”
- Defined group of liquidity drivers represents all relevant EnBW activities
- Subsidiaries without stand-alone financing included
- Integrated view on historical and planning data

**Rolling time horizon & risk based**
- 12 months rolling time horizon with daily output for the first 3 months and monthly output for the following 9 months
- Secured cash flows for most of the liquidity drivers
- Risk based approach for certain liquidity drivers
- Risk assessment with focus on working capital movements

**Funding**
- Different type of funding sources for certain time periods (cash, bank lines, etc.)
- Calculation of short term (7 days) and medium term (3 and 12 months) liquidity based on the current account balance
- Consumption ratio for cumulative time periods (needs vs. sources)
- Escalation mechanism implemented

Efficient inhouse bank approach to cover all liquidity needs

Combination of expected and unexpected cash flows

Entire short term and long term funding basis

Inhouse bank and risk based approach to allow efficient and forward-looking financing decisions
### Issuer: EnBW International Finance B.V.

<table>
<thead>
<tr>
<th>Type</th>
<th>CCY</th>
<th>Denomination</th>
<th>Volume (m)</th>
<th>Term (years)</th>
<th>Issue date</th>
<th>Maturity</th>
<th>Coupon (%)</th>
<th>Interest date</th>
<th>Security No. (WKN)</th>
<th>ISIN No.</th>
<th>Stock Exchange</th>
</tr>
</thead>
<tbody>
<tr>
<td>Senior</td>
<td>CHF</td>
<td>5,000</td>
<td>100</td>
<td>10</td>
<td>12.7.2013</td>
<td>12.7.2023</td>
<td>2.250</td>
<td>1.7</td>
<td>A1HM5N</td>
<td>CH0217677654</td>
<td>S</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>5</td>
<td>7.4.2020</td>
<td>17.4.2025</td>
<td>0.625</td>
<td>17.4.</td>
<td>A28V1E</td>
<td>XS2156607702</td>
<td>L</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>12</td>
<td>4.6.2014</td>
<td>4.6.2026</td>
<td>2.500</td>
<td>4.6.</td>
<td>A1ZJ9E</td>
<td>XS1074208270</td>
<td>L</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>7</td>
<td>22.2.2021</td>
<td>1.3.2028</td>
<td>0.125</td>
<td>1.3</td>
<td>A3KMDZ</td>
<td>XS2306986782</td>
<td>L</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>10</td>
<td>12.10.2020</td>
<td>19.10.2030</td>
<td>0.250</td>
<td>19.10.</td>
<td>A283UQ</td>
<td>XS2242728041</td>
<td>L</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>12</td>
<td>22.2.2021</td>
<td>1.3.2033</td>
<td>0.500</td>
<td>1.3</td>
<td>A3KMD0</td>
<td>XS2306988564</td>
<td>L</td>
</tr>
<tr>
<td>Green Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>500</td>
<td>15</td>
<td>31.10.2018</td>
<td>31.10.2033</td>
<td>1.875</td>
<td>31.10.</td>
<td>A2RTNC</td>
<td>XS1901055472</td>
<td>L</td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>100,000</td>
<td>100</td>
<td>20</td>
<td>13.6.2014</td>
<td>13.6.2034</td>
<td>2.875</td>
<td>13.6.</td>
<td>Private Placement</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Senior</td>
<td>EUR</td>
<td>1,000</td>
<td>600</td>
<td>30</td>
<td>7.7.2009</td>
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<td>6.125</td>
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<td>Senior</td>
<td>EUR</td>
<td>100,000</td>
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<td>3.080</td>
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<td>Senior</td>
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<td>50</td>
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</table>

CCY: Currency
L: Luxembourg, S: Switzerland

as of 31 August 2021
# Fixed income: EnBW’s subordinated bonds

**Issuer:** EnBW Energie Baden-Württemberg AG

<table>
<thead>
<tr>
<th>Type</th>
<th>CCY</th>
<th>Denomination</th>
<th>Volume (m)</th>
<th>Term (years)</th>
<th>Issue date</th>
<th>Maturity</th>
<th>Coupon¹ (%)</th>
<th>Interest date</th>
<th>Security No. (WKN)</th>
<th>ISIN No.</th>
<th>Stock Exchange</th>
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<tbody>
<tr>
<td>Subordinated</td>
<td>USD²</td>
<td>2,000</td>
<td>300</td>
<td>60.5</td>
<td>5.10.2016</td>
<td>5.4.2077</td>
<td>5.125</td>
<td>5.4.</td>
<td>A2BN7K</td>
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<td>Subordinated</td>
<td>EUR</td>
<td>1,000</td>
<td>725</td>
<td>60.5</td>
<td>5.10.2016</td>
<td>5.4.2077</td>
<td>3.375</td>
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<td>Green Subordinated</td>
<td>EUR</td>
<td>100,000</td>
<td>500</td>
<td>60</td>
<td>5.8.2019</td>
<td>5.8.2079</td>
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<td>500</td>
<td>60.25</td>
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<td>XS2381272207</td>
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<td>Subordinated</td>
<td>EUR</td>
<td>100,000</td>
<td>500</td>
<td>60</td>
<td>24.8.2021</td>
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<td>31.8.1</td>
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As of 31 August 2021

L: Luxembourg, F: Frankfurt, CCY: Currency

¹ Subordinated bond coupon initially

² Regulation: These Notes are not offered or sold within the United States or to, or for the account or benefit of, U.S. persons
Maturities of EnBW’s bonds

(in € m) as of 31 August 2021

1 First call date: subordinated maturing in 2077; includes USD 300 m (swap in €), coupon before swap 5.125%
2 CHF 100 m, converted as of the reporting date of 31.8.2021
3 First call date: green subordinated maturing in 2079
4 First call date: green subordinated maturing in 2080
5 First call date: green subordinated maturing in 2081
6 JPY 20 bn (swap in €), coupon before swap 5.460
7 Includes USD 300 m, converted as of 5.10.2016
High share of low-risk activities and sound financial policy form the basis of solid credit quality

Leadership position as vertically integrated utility within Baden-Württemberg
Significant proportion of EBITDA, around 50%, from low-risk regulated distribution and transmission activities
Growing share of renewables under contracts as EnBW continues to invest in line with its strategy
Historically balanced financial policy and demonstrated commitment to robust credit quality
Difficult operating environment in Germany for conventional generation and challenging retail markets
Execution risks relating to a large investment programme, including offshore wind development
Supportive stance of shareholders

Well positioned amid the European energy transition, with a business mix that is proving resilient to economic downturns
EnBW to enter an intensive investment circle focusing mostly on low-risk grid projects and increasing renewable capacity
Capex intensification will increase leverage, but consistent with current rating
Regulated business and low-risk renewable portfolio will translate into stable and sustainable cash flow streams
Prudent risk-sharing strategy; increasing share of minority shareholdings factored in in S&P’s rating triggers
Moderate likelihood of government support
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<th></th>
<th></th>
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<tbody>
<tr>
<td>Annual high</td>
<td>€ 58.00</td>
<td>€ 61.00</td>
<td>€ 34.00</td>
<td>€ 29.63</td>
<td>€ 24.25</td>
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<tr>
<td>Annual low</td>
<td>€ 32.00</td>
<td>€ 29.00</td>
<td>€ 25.40</td>
<td>€ 20.00</td>
<td>€ 18.29</td>
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<tr>
<td>Closing price</td>
<td>€ 56.00</td>
<td>€ 50.50</td>
<td>€ 29.20</td>
<td>€ 20.00</td>
<td>€ 19.69</td>
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<tr>
<td>Number of shares outstanding as of 31 December²</td>
<td>Thousand shares</td>
<td>270,855</td>
<td>270,855</td>
<td>270,855</td>
<td>270,855</td>
</tr>
<tr>
<td>Market capitalisation as of 31 December²</td>
<td>€ bn</td>
<td>15.2</td>
<td>13.7</td>
<td>7.9</td>
<td>7.8</td>
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<tr>
<td>Stock exchange trade (total)</td>
<td>Number of shares</td>
<td>152,206</td>
<td>106,534</td>
<td>86,190</td>
<td>157,021</td>
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<tr>
<td>Stock exchange trade (daily average)</td>
<td>Number of shares</td>
<td>611</td>
<td>426</td>
<td>435</td>
<td>604</td>
</tr>
<tr>
<td>Earnings per share from Group net profit/loss</td>
<td>€</td>
<td>2.20</td>
<td>2.71</td>
<td>1.23</td>
<td>7.58</td>
</tr>
<tr>
<td>Dividend distribution³</td>
<td>€ m</td>
<td>271</td>
<td>190</td>
<td>176</td>
<td>135</td>
</tr>
<tr>
<td>Dividend per share</td>
<td>€</td>
<td>1.00</td>
<td>0.70</td>
<td>0.65</td>
<td>0.50</td>
</tr>
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</table>

### Stock exchange information

- **ISIN/security identification no.:** DE0005220008/522000
- **Stock exchange abbreviation:**
  - Bloomberg: EBK GY
  - Reuters: EBKG.DE
- **Transparency level:** General Standard
- **Indices:**
  - General All Share
  - DAX sector All Utilities, CDAX
- **Number of shares:** 276,604,704
- **Class of share:** Ordinary no-par value bearer shares
- **Stock markets:**
  - Regulated market: Frankfurt and Stuttgart
  - Over-the-counter trading: Berlin and Munich

---

1 Share value based on closing price trading the EnBW share in XETRA  
2 Total number of shares: 276,604,704 million shares  
3 Distribution in terms of eligible shares as of year-end
Shareholder structure

- OEW Energie-Beteiligungs GmbH
  - 46.75%
- NECKARPRI-Beteiligungsgesellschaft mbH
  - 46.75%
- Badische Energieaktionärs-Vereinigung
  - 2.45%
- Gemeindeelektrizitätsverband Schwarzwald-Donau
  - 0.97%
- Neckar-Elektrizitätsverband
  - 0.63%
- EnBW Energie Baden-Württemberg AG
  - 2.08%
- Other shareholders
  - 0.39%

May not add up to 100% due to rounding; figures as of 30 June 2021.

1 Wholly-owned subsidiary of Zweckverband Überschwäbische Elektrizitätswerke which is an association of 9 districts with headquarters in Ravensburg
2 Wholly-owned subsidiary of NECKARPRI GmbH, which is wholly owned by the state of Baden-Württemberg
3 Wholly-owned subsidiary of NECKARPRI GmbH, which is wholly owned by the state of Baden-Württemberg

Capital stock: € 708,108,042.24, divided into 276,604,704 no par value bearer shares with an imputed value of € 2.56 each.
Financing strategy follows credit investors’ needs

- Solid investment-grade ratings
- Financial profile managed by debt repayment potential
- Focus on sustainable financial instruments
- Successful management of long-term obligations with cash flow-based Asset Liability Management Model
- Stable government-related shareholder structure and dividend policy\(^1\)

\(^1\) Payout ratio of 40% to 60% of adjusted Group net profit.
Corporate governance

Corporate governance
› Responsible and transparent management
› German Corporate Governance Code
› Remuneration systems
› Compliance
› Data protection
Responsible and transparent management

EnBW corporate culture

Translucent and responsible

Strengthen trust and confidence among

Customers
Capital providers
Employees
Public

Long-term success

Board of Management

Dr. Frank Mastiaux
Chief Executive Officer
Appointed until 30 September 2022

Colette Rücker-Hennen
Chief Personnel Officer
Appointed until 28 February 2027

Dirk Güsewell
Chief Operating Officer
Appointed until 31 May 2024

Thomas Kusterer
Chief Financial Officer
Appointed until 31 March 2024

Supervisory Board

Lutz Feldmann
Chairman of the Supervisory Board

20 members: 10 shareholder representatives, 10 employee representatives, of which three union representatives

Appointed until Annual General Meeting 2026

Appoints members of Board of Management and defines their remuneration

Supervises the Board of Management

Advises them on management of the company

Responsible Group management
Represents the company legally
## Allocation of responsibilities within the Board of Management

<table>
<thead>
<tr>
<th>Dr. Frank Mastiaux</th>
<th>Thomas Kusterer</th>
<th>Colette Rückert-Hennen</th>
<th>Dr. Georg Stamatelopoulos</th>
<th>Dirk Güsewell</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>CEO</strong></td>
<td><strong>CFO</strong></td>
<td><strong>Human Resources</strong></td>
<td><strong>Sustainable Generation Infrastructure</strong></td>
<td><strong>System Critical Infrastructure</strong></td>
</tr>
<tr>
<td>Corporate development, strategy and energy economy</td>
<td>Accounting and tax \nControlling and risk management / ICS \nRisk management for trading \nDigital finance and transformation \nFinance, M&amp;A and Investor Relations \nPurchasing \nEquity investment management \nPerformance in growth</td>
<td>HR strategy and transformation \nLaw, auditing, compliance and regulatory management \nHR business development and solutions \nBoards and shareholder relationships \nOccupational medicine and health management \nFacility and mobility management</td>
<td>Generation operations \nGeneration portfolio development \nCoordination generation infrastructure \nTrading \nResearch and development \nOccupational safety, crisis management and environmental protection</td>
<td>DSO² electricity / gas \nTSO³ electricity / gas \nGas value chain \nBusiness field development and coordination \nInnovation management \nCritical infrastructure \nTelecommunications</td>
</tr>
</tbody>
</table>

1 As of 1 June 2021
2 Distribution System Operator
3 Transmission System Operator

www.enbw.com/board-of-management
Remuneration system for members of the Board of Management and for members of the Supervisory Board

Board of Management

› The annual general meeting of a listed company must adopt a resolution on the approval of the remuneration system of the Board of Management at every material change and in any case at least every four years

› Last adopted by the Company’s Annual General Meeting on 5 May 2021 confirmed by 99.99%

› Resolution on the approval of the remuneration system for members of the Board of Management as well as the remuneration system itself must be published on the Company’s website

Supervisory Board

› The annual general meeting of a listed company must adopt a resolution on the approval of the remuneration system of the Supervisory Board at least every four years, with the resolution permitted to take the form of a resolution confirming remuneration

› Last adopted by the Company’s Annual General Meeting on 17 July 2020

› This resolution was confirmed by the Company’s Annual General Meeting on 5 May 2021 with 99.99%

› Resolution on the approval of the remuneration system for members of the Supervisory Board as well as the remuneration system itself must be published on the Company’s website
Compliance

Number of participants in compliance training events¹

- Management personnel
- New management personnel/employees
- Sensitive areas

<table>
<thead>
<tr>
<th>Year</th>
<th>Management Personnel</th>
<th>New Personnel</th>
<th>Sensitive Areas</th>
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<td>2016</td>
<td>754</td>
<td>184</td>
<td>523</td>
</tr>
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<td>2017</td>
<td>962</td>
<td>441</td>
<td>158</td>
</tr>
<tr>
<td>2018</td>
<td>941</td>
<td>182</td>
<td>746</td>
</tr>
<tr>
<td>2019</td>
<td>1,185</td>
<td>229</td>
<td>904</td>
</tr>
<tr>
<td>2020</td>
<td>1,283</td>
<td>369</td>
<td>839</td>
</tr>
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</table>

- +8.3% increase from 2019

Number of compliance breaches in 2020¹

- Material compliance breaches
- Simple compliance breaches

<table>
<thead>
<tr>
<th>Year</th>
<th>Material Breaches</th>
<th>Simple Breaches</th>
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</thead>
<tbody>
<tr>
<td>2019</td>
<td>9</td>
<td>0</td>
</tr>
<tr>
<td>2020</td>
<td>3</td>
<td>2</td>
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</table>

Compliance management system

- Serves to minimise risks and avoid liability issues and loss of reputation
- Focuses on company- and sector-specific risks and priorities
- Encompasses all controlled companies with employees in the EnBW Group
- Various tools used e.g. training/workshops – focused on compliance attitude – Code of Conduct, Annual Compliance Risk Assessment and Ombudsman

¹ At EnBW AG and directly controlled companies with employees
² Corruption allegations have confirmed
Data protection in the value chain

Data protection compliance cycle

Processes involving data protection in all parts of the value chain

This has so far involved:

› Implementation of a group-wide uniform record of processing activities as replacement for in-house system
› Finishing virtual audits of all main suppliers/processors in each value chain
› Completion of an unreasonable cross-sectional examination of GDPR-readiness by the local authority (LDI NRW) with a positive result
› Ongoing training of employees in virtual classroom concepts and using the corporate social media platform
› Supporting HR in several initiatives for digitisation
› Advancement of the Data Protection Management System (DPMS) based on the IDW AsS 980 standard with focus in identifying essential roles in the operative units

Processes involving data protection in all parts of the value chain

› Central organisation of data protection at the EnBW Group
› 1 Head of compliance and data protection
› 2 Data protection officers²
› 5 Central data protection employees
› 24 Local data protection managers³

---

¹ As of 31 December 2020
² Data Protection Officer under Article 37-39 of the GDPR
³ Managers in the following business areas: 1 Human Resources, 1 IT, 1 Trading, 1 Generation, 1 Nuclear, 2 Operation & Sales, 1 Grids, 16 Other Businesses
EnBW Factbook 2021

EnBW at a glance .............................................................................................................. 02
Market environment ........................................................................................................ 05
Strategy ............................................................................................................................. 34
Corporate sustainability ................................................................................................. 49
Business segments ......................................................................................................... 69
Key financials and non-financials .................................................................................. 126
Capital markets .............................................................................................................. 137
Corporate governance ................................................................................................. 150

Service

› Financial calendar
› IR contact
› Important links
# Financial calendar

<table>
<thead>
<tr>
<th>Date</th>
<th>Event Description</th>
<th>Time</th>
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<tr>
<td>12 November 2021</td>
<td>Publication figures Q3 2021</td>
<td>1:00 pm</td>
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<tr>
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<td>Investor and analyst conference call</td>
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<td>23 March 2022</td>
<td>Publication figures full year 2021</td>
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<td>5 May 2022</td>
<td>Annual General Meeting 2022</td>
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<td>13 May 2022</td>
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<td>12 August 2022</td>
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<td>Investor and analyst conference call</td>
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<td>Publication figures Q3 2022</td>
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<tr>
<td>Name</td>
<td>Position</td>
<td>Contact Information</td>
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<td>-----------------------------------------------</td>
<td>-----------------------</td>
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<tr>
<td>Marcel Münch</td>
<td>Head of Finance, M&amp;A and Investor Relations</td>
<td>+49 721 – 63 16 102</td>
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<tr>
<td>Peter Berlin</td>
<td>Director Capital Markets</td>
<td>+49 721 – 63 12 844</td>
</tr>
<tr>
<td>Julia von Wietersheim</td>
<td>Senior Manager Investor Relations</td>
<td>+49 721 – 63 12 060</td>
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<tr>
<td>Lea Gantz</td>
<td>Manager Investor Relations</td>
<td>+49 721 – 63 13 646</td>
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<tr>
<td>Regina Martin</td>
<td>Manager Investor Relations</td>
<td>+49 721 – 63 13 613</td>
</tr>
<tr>
<td>Julia Reinhardt</td>
<td>Manager Investor Relations</td>
<td>+49 721 – 63 12 697</td>
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“EnBW’s corporate and financing strategy are the focus of our investor communication. To us, investor relations means providing capital market participants with comprehensive and timely information, and also reflecting how they view EnBW back to the Company. That is why we attach great importance to continuous dialogue with investors.”

[Marcel Münch]
<table>
<thead>
<tr>
<th>Important links</th>
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<td><a href="https://www.enbw.com/company/the-group/">https://www.enbw.com/company/the-group/</a></td>
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Unless indicated otherwise, all data contained hereinafter refers to the EnBW Group and is calculated according to IFRS.

No offer or investment recommendation

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By nature, future-oriented statements are subject to risks and uncertainties that cannot be controlled or accurately predicted by EnBW. Actual events, future results, the financial position, development or performance of EnBW and the companies of the EnBW Group may therefore diverge considerably from the future-oriented statements made in this presentation. Therefore it cannot be guaranteed nor can any liability be assumed otherwise that these future-oriented statements will prove complete, correct or precise or that expected and forecast results will actually occur in the future.

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