





# ANNUAL STATISTICS 2021





We recognise that preserving our energy resources will be one of the greatest challenges in our drive towards sustainable development. This, however, will not materialise unless the different facets of our society adopt energy conservation principles in their core values. The future generation will be the chief beneficiary of our achievements and the best judge of what we accomplish in this field.

**His Highness Sheikh Mohammed bin Rashid Al Maktoum** Vice President and Prime Minister of the UAE and Ruler of Dubai

# **STRATEGIC DIRECTION**

# **Our Purpose**

Providing globally leading sustainable, efficient, and reliable power and water services, and related innovative smart solutions.

# **Our Vision**

A globally leading sustainable innovative corporation.

#### **Our Mission**

We are committed and aligned to Dubai's 8 Principles and 50-Year Charter supporting the UAE's directions through the delivery of global leading services and innovative energy solutions enriching lives and ensuring the happiness of our stakeholders in a sustainable manner.

#### **Our Values**

Stakeholders' Happiness, Sustainability, Innovation, Excellence, and Good Governance.

#### **Our Motto**

For generations to come.



# MD & CEO Message

To support the vision of HH Sheikh Mohammed bin Rashid Al Maktoum, Vice President and Prime Minister of the UAE and Ruler of Dubai, who said, **"Our end goal is number one globally in all fields and our development is remarkably progressing every day. The competitiveness will only make us more excellent,"** we work to improve performance, productivity, and quality of our services. DEWA's 2021 Plan is aligned with the Dubai 2040 Urban Master Plan and the UAE Centennial 2071, to ensure a happy and sustainable future and take the UAE to the number one position in all areas.

DEWA's investments totalled AED 86 billion over five years, to meet growing demand for electricity and water in the Emirate. This provides significant investment opportunities, contributes to the growth of the green economy, and creates a competitive advantage for the UAE in clean energy and energy efficiency technologies. DEWA currently has an installed capacity of 13,417 megawatts (MW) of electricity and 490 million gallons of desalinated water per day, providing its services to over one million customers in Dubai according to the highest levels of quality, availability, and efficiency.

DEWA has ensured numerous global achievements. Dubai recorded the world's lowest Customer Minutes Lost (CML) of 1.43 minutes per year; the lowest electricity transmission- and distribution-network-line losses of 3.3%, and one of the lowest water-network losses of 5.3%.

While DEWA's achievements have made it a global benchmark, this Statistics Booklet covers only our key achievements. All of us at DEWA are committed to continue this journey towards excellence and enhance our services to achieve the happiness of customers and society, and contribute to building a brighter future, for generations to come.

Saeed Mohammed Al Tayer MD & CEO Dubai Electricity and Water Authority

# **POWER GENERATION & WATER DESALINATION PLANTS INSTALLED CAPACITY**

| Chatiana.   |       | 2021   |  |  |
|---|-------|--------|--|--|
| Stations  | MIGD* | MW**   |  |  |
| Jebel Ali Station "D"                                   | 34.5  | 1,027  |  |  |
| Jebel Ali Station "E"                                   | 25    | 616    |  |  |
| Jebel Ali Station "G"                                   | 81    | 818    |  |  |
| Aweer Power Station "H" - Ph I                          | -     | 607    |  |  |
| Aweer Power Station "H" - Ph II                         | -     | 421    |  |  |
| Aweer Power Station "H" - Ph III                        | -     | 968    |  |  |
| Jebel Ali Station "K"                                   | 96    | 948    |  |  |
| Jebel Ali Station "L" - Ph I                            | 67.5  | 969    |  |  |
| Jebel Ali Station "L" - Ph II                           | 52    | 1,432  |  |  |
| Jebel Ali Station "M"                                   | 134   | 2,185  |  |  |
| Jebel Ali Station "M" Extension                         | -     | 700    |  |  |
| Mohammed bin Rashid Al Maktoum Solar Park - Ph I***     | -     | 10     |  |  |
| Mohammed bin Rashid Al Maktoum Solar Park - Ph II***    | -     | 200    |  |  |
| Mohammed bin Rashid Al Maktoum Solar Park - Ph III A*** | -     | 200    |  |  |
| Mohammed bin Rashid Al Maktoum Solar Park - Ph III B*** | -     | 300    |  |  |
| Mohammed bin Rashid Al Maktoum Solar Park - Ph III C*** | -     | 300    |  |  |
| Mohammed Bin Rashid Solar Park - Ph-IV (PV1)***         | -     | 217    |  |  |
| Mohammed Bin Rashid Solar Park - Ph-V A***              | -     | 300    |  |  |
| Hassyan Power Plant Phase-I &II****                     | -     | 1,200  |  |  |
| Total   | 490   | 13,417 |  |  |
| * MIGD - Million Imperial Gallons Per Day               |       |        |  |  |

\*\* MW - Megawatt \*\*\* Solar PV Plant capacity Maximum MWac

\*\*\*\* Net Generation Capacity for Hassyan Power Plant

# SUBSTATIONS (TRANSMISSION & DISTRIBUTION)

| 2020   | 2021            |
|--------|-----------------|
| 23     | 25              |
| 307    | 319             |
| 85     | 81*             |
| 40,588 | 41,814          |
|        | 23<br>307<br>85 |

\*Decomissioning of 4 substations

| Length of Transmission 8 | Oistribution Lines | 2020   | 2021   |
|--------------------------|--------------------|--------|--------|
| Overhead Lines           |                    |        |        |
| 400 kV                   | km                 | 1,168  | 1,386  |
| 132 kV                   | km                 | 402    | 369    |
| 33 kV                    | km                 | 104    | 100    |
| 11 & 6.6 kV              | km                 | 608    | 606    |
| Underground Cables       |                    |        |        |
| 400 kV                   | km                 | 24     | 25     |
| 132 kV                   | km                 | 2,249  | 2,335  |
| 33 kV                    | km                 | 2,119  | 2,108  |
| 11 & 6.6 kV              | km                 | 34,475 | 35,001 |

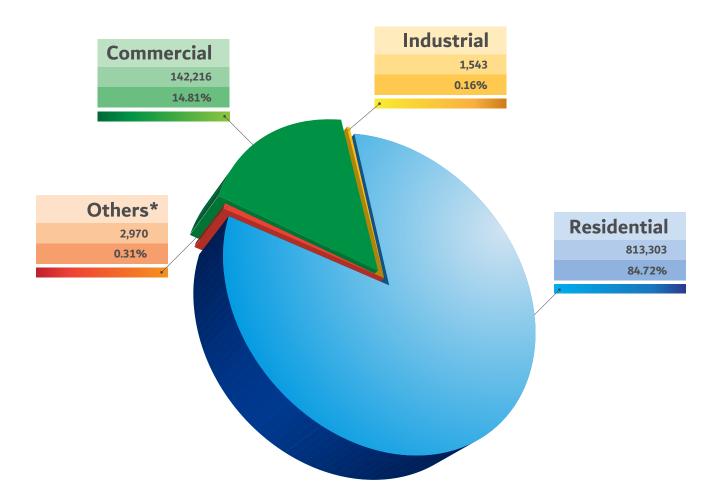


#### LARGEST SINGLE-SITE SOLAR PARK IN THE WORLD



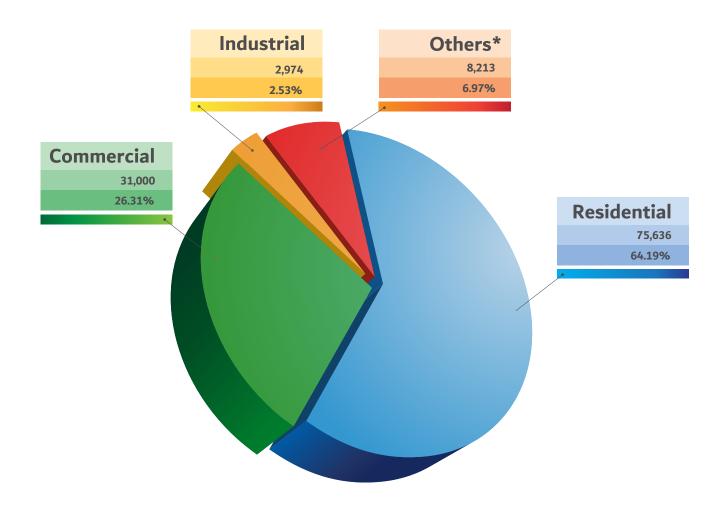
#### NUMBER OF WATER CUSTOMERS 2021

| Water            | 2020    | 2021    |
|------------------|---------|---------|
| No. of Customers | 884,404 | 960,032 |

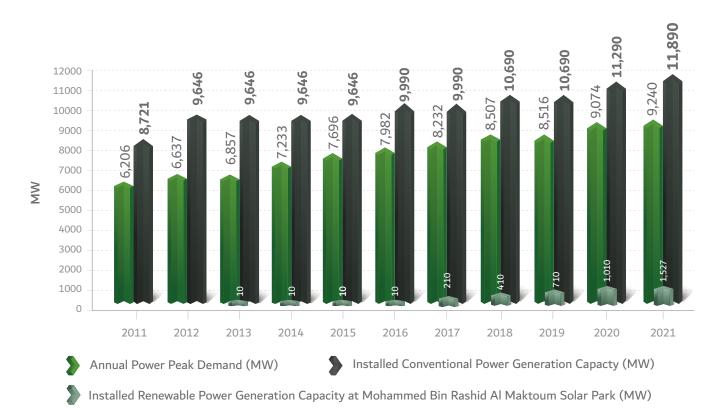


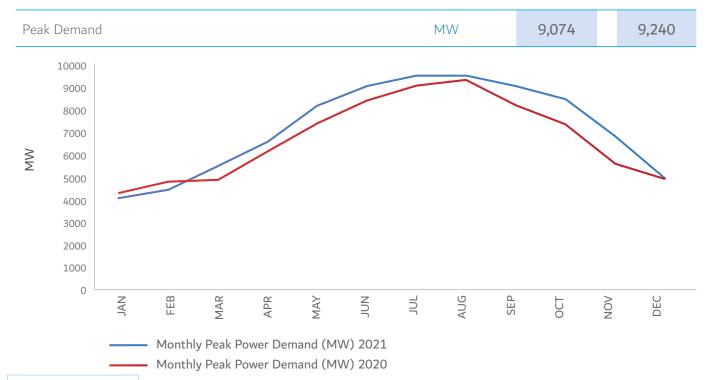
# WATER CONSUMPTION (MIG) 2021

| Water (Total System Requirement) | 2020    | 2021    |
|----------------------------------|---------|---------|
| Desalinated Water MIG            | 125,685 | 128,606 |
| Groundwater MIG                  | 466     | 559     |



| Electricity        |    | 2020   | 2021   |
|--------------------|----|--------|--------|
| Installed Capacity | MW | 12,300 | 13,417 |
| Gas Turbines       | MW | 7,975  | 7,975  |
| Steam Turbines     | MW | 3,315  | 3,915  |
| Solar PV           | MW | 1,010  | 1,527  |





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| Water                                |       | 2020 | 2021 |
|--------------------------------------|-------|------|------|
| Installed Capacity                   |       |      |      |
| Desalination                         | MIGD* | 470  | 490  |
| Wells                                | MIGD* | 32   | 36   |
| Annual Desalinated Water Peak Demand | MIGD* | 378  | 380  |

\*MIGD - Million Imperial Gallons Per Day

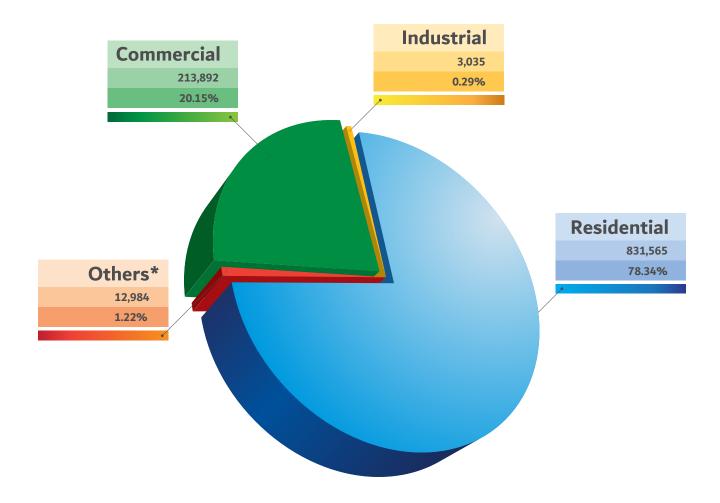


| Length of Transmission Pipe | ines | 2020  | 2021  |
|-----------------------------|------|-------|-------|
| 1200 mm                     | km   | 1,257 | 1,298 |
| 900 mm                      | km   | 344   | 348   |
| Reservoirs Capacity         | MIG* | 815   | 822   |

\*MIG - Million Imperial Gallons

# NUMBER OF ELECTRICITY CUSTOMERS 2021

| Electricity      | 2020    | 2021      |
|------------------|---------|-----------|
| No. of Customers | 990,258 | 1,061,476 |



# **ELECTRICITY CONSUMPTION (GWH) 2021**

| Electricity               |      | 2020   | 2021   |
|---------------------------|------|--------|--------|
| System Energy Requirement | GWh* | 45,712 | 50,401 |

\*GWh – Gigawatt hour

