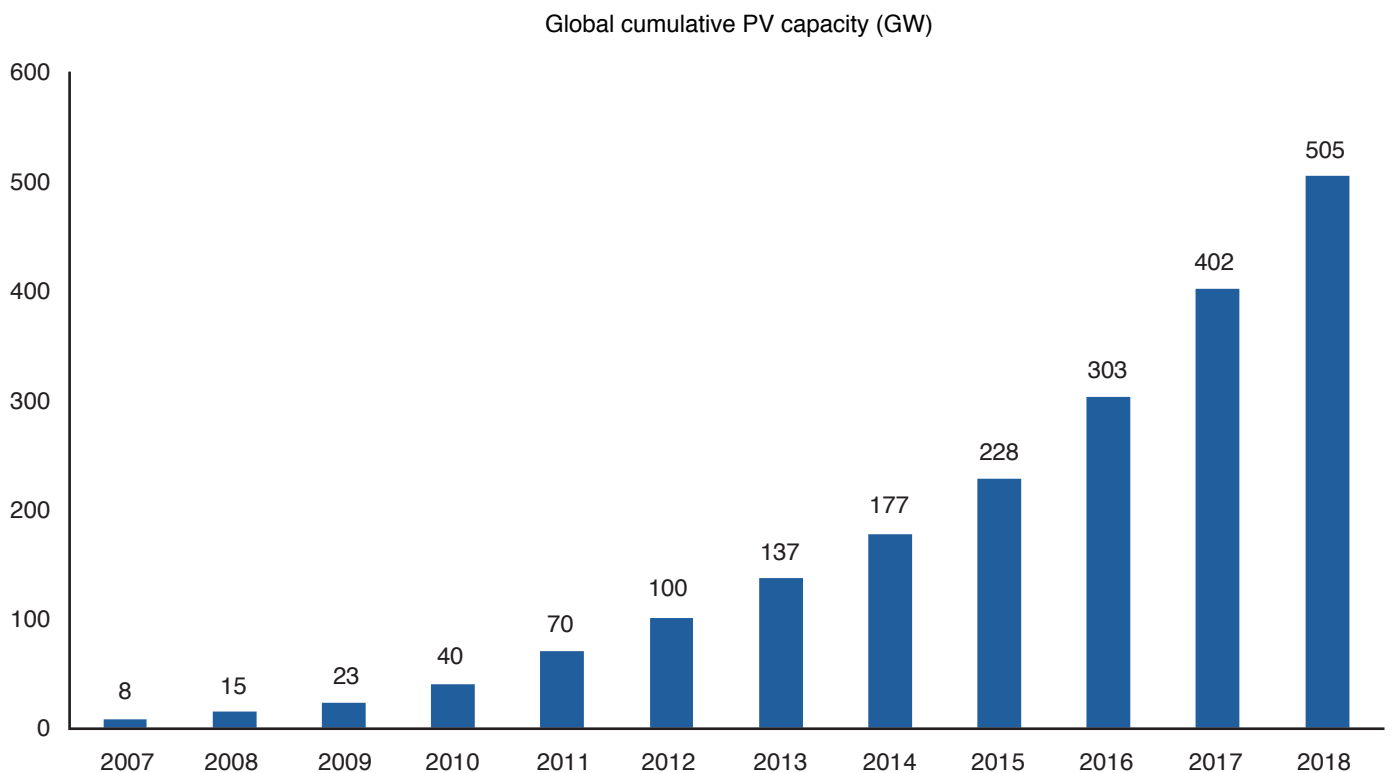


# Data Insight

03/10/2019

## Trends in Global Solar PV Installation



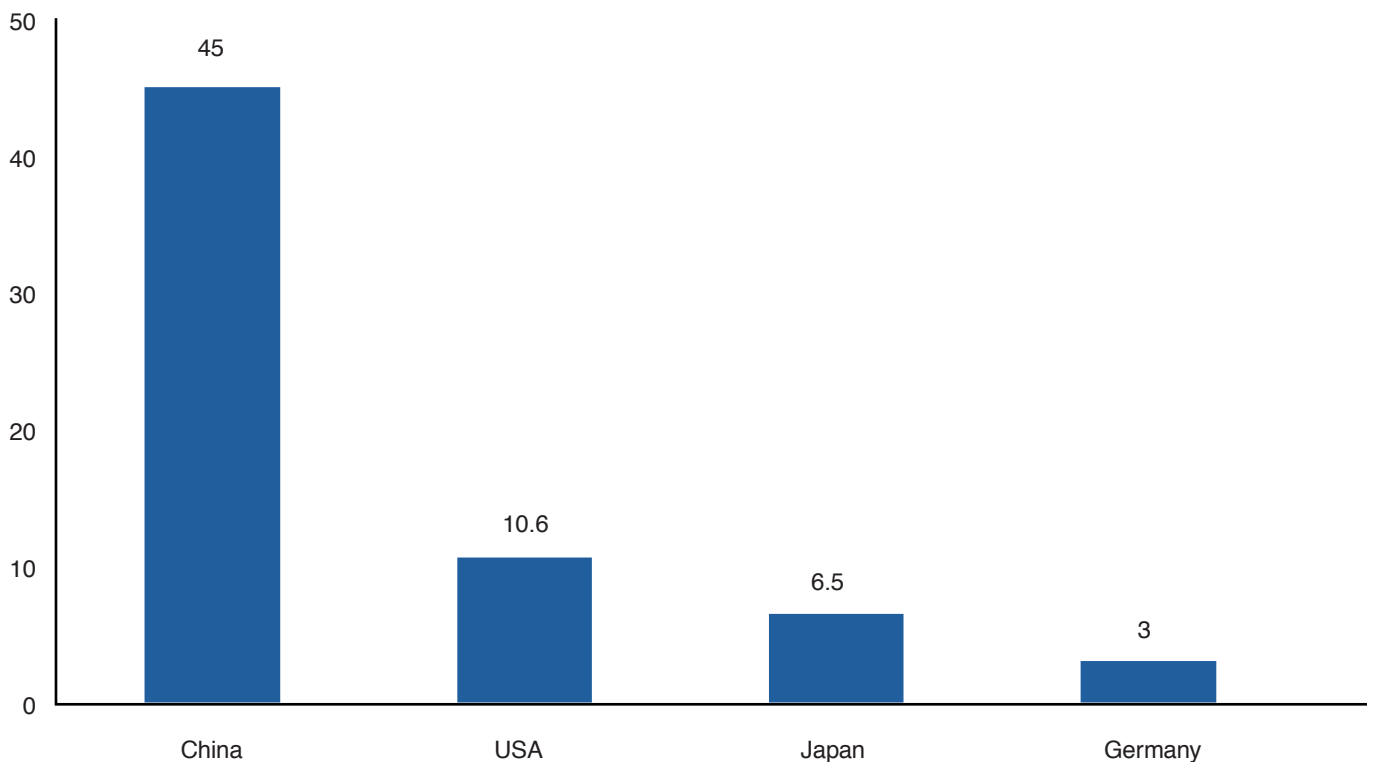
### Context

- Dozens of governments around the world have supported, and still support, renewable energy technology deployment, including solar photovoltaics (PV). This has been driven by their ambitions to be energy independent, meet carbon emission reduction targets, and contribute to their domestic economies through industry creation.
- Policy support and falling solar PV prices have been two major contributing factors to the expeditious global PV installation rate in the past decade.
- Every year since 2007 has been a record year for new installations.
- At the end of 2018, the total global capacity of PV installations was 505 gigawatts (GW).

## The data under the microscope

- In 2018, PV capacity increased by approximately 102 GW globally.
- Nearly half of this new capacity (around 45 GW) was installed in China. On average, the country added some 3.75 GW every month, or 125 megawatts (MW) per day.
- Solar PV capital costs (utility and fixed axis) have declined from \$3.53 per Watt direct current ( $\text{US}\$/\text{W}_{\text{DC}}$ ) in 2010 to 0.89  $\text{\$/W}_{\text{DC}}$  in 2018.
- China's manufacturing capacity and government policies were the two main drivers behind its significant growth in PV installation. However, China's recent announcements that it will restrict solar installations that require subsidies may slow the rate of solar PV installation in 2019 and beyond.

New PV capacity added in 2017 by country (GW)



## Key takeaways

- Policy support and falling solar PV technology capital costs are two major factors behind the exponential growth rate of PV deployment globally.
  - At the end of 2018, the total global PV capacity was 505 GW.
  - China is leading the world in solar PV installation with 176 GW of installed capacity.
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## Endnotes

Global PV Market Outlook, 2019 Q1: Bloomberg New Energy Finance.  
Renewables 2019 Global Status Report: REN21.

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Author: **Amro M. Elshurafa**

