



Renewable Energy In Israel, The “Eilat Eilot model” Innovation, Regulations & Opportunities

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Five important facts about Israel regarding Planning the electricity sector

High growth rates and crowded country

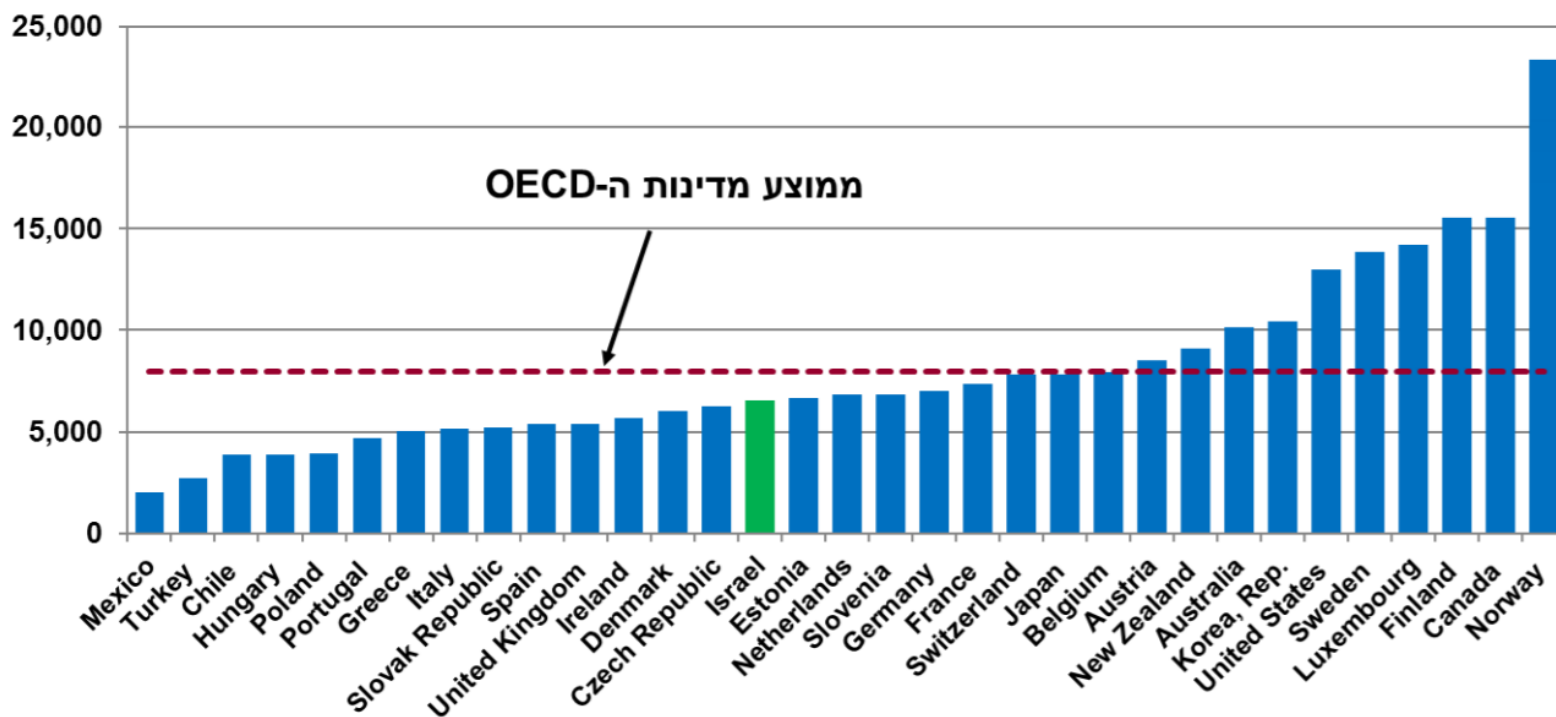


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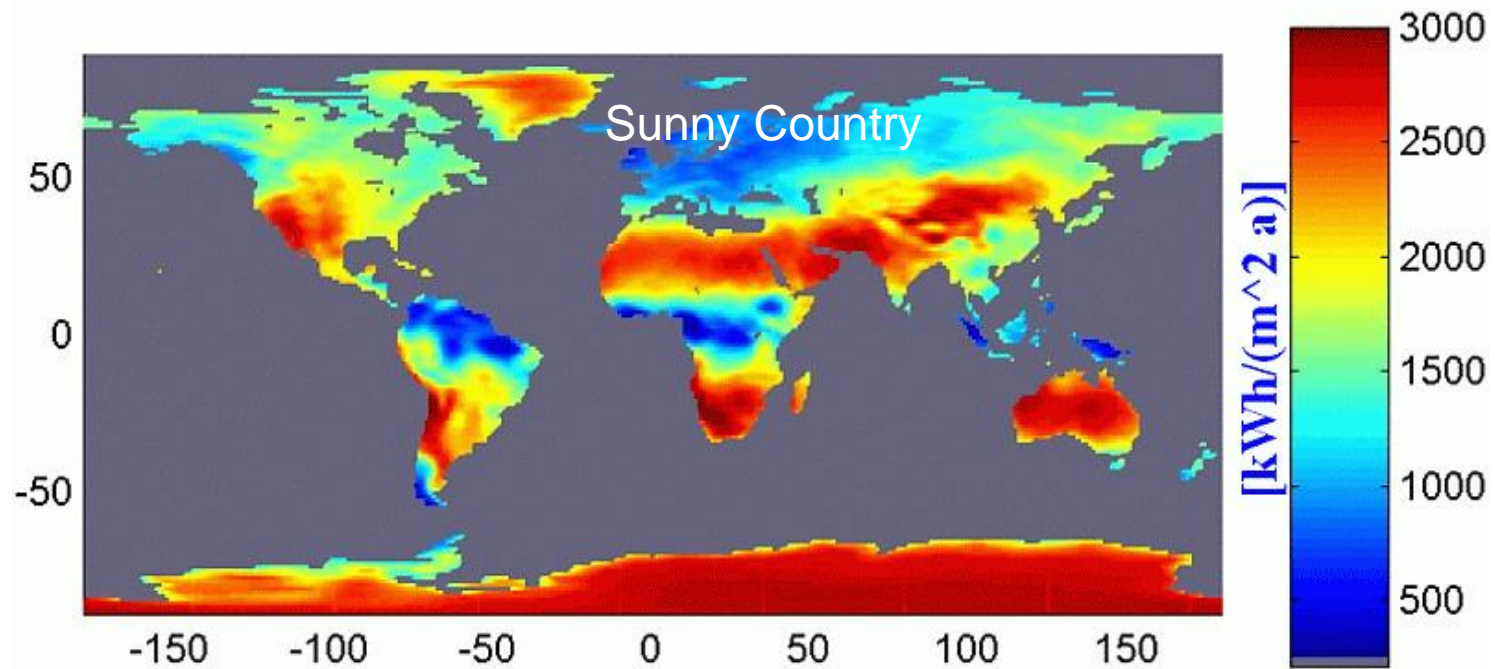
- **energy island of 16,500 Mw installed (with Security reserve of 19%)**
- Population 8.7 Mil
- Households 2.1 Mil
- demographic growth calculated for the electricity sector growth 2.7%
- If taking in consider electric cars 3.6%
- GDP growth rate till 2030 3.4 %



electricity consumption Per capita in OECD countries



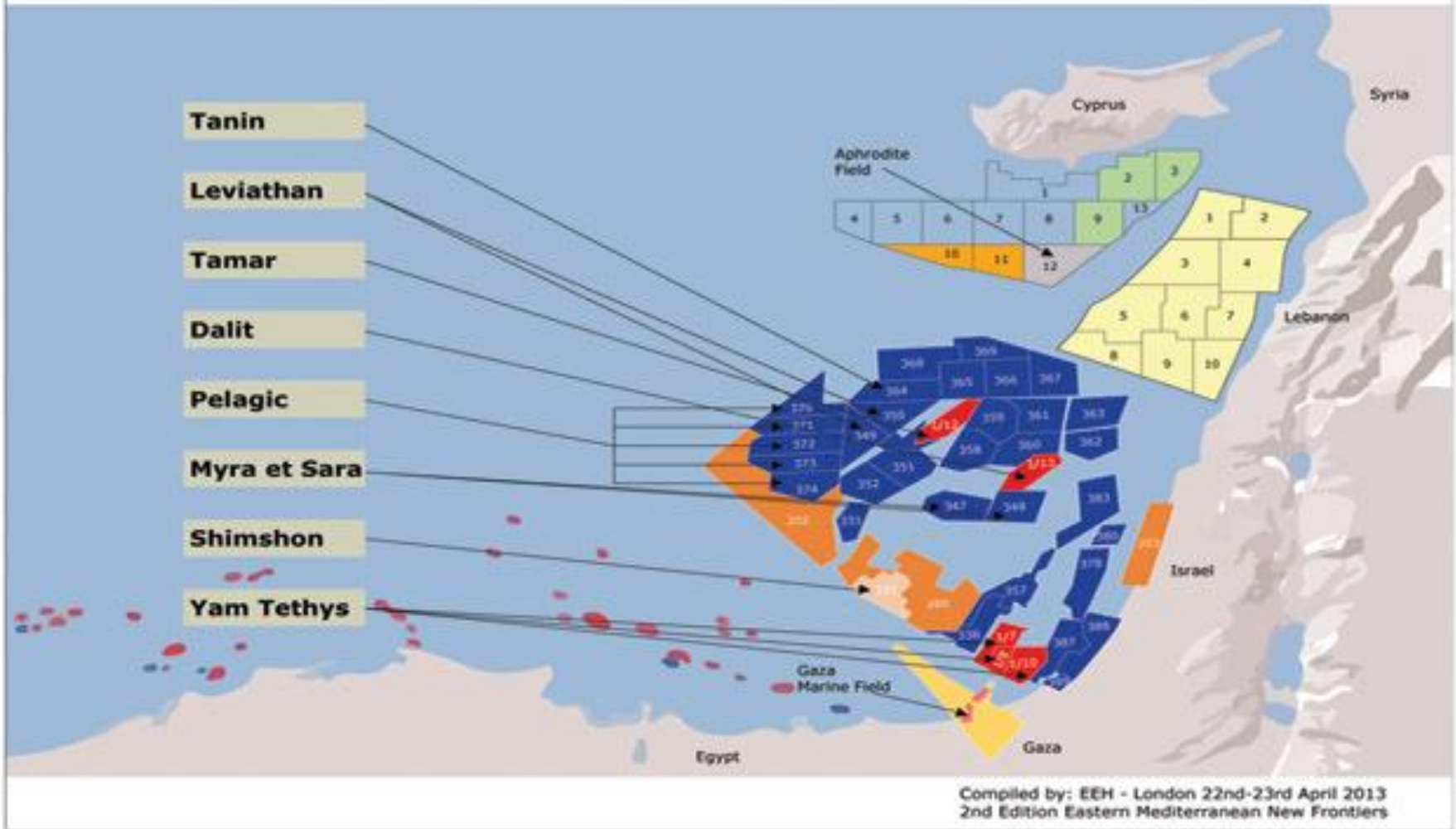
Israel is No. 69 among 100 world's best radiation zones



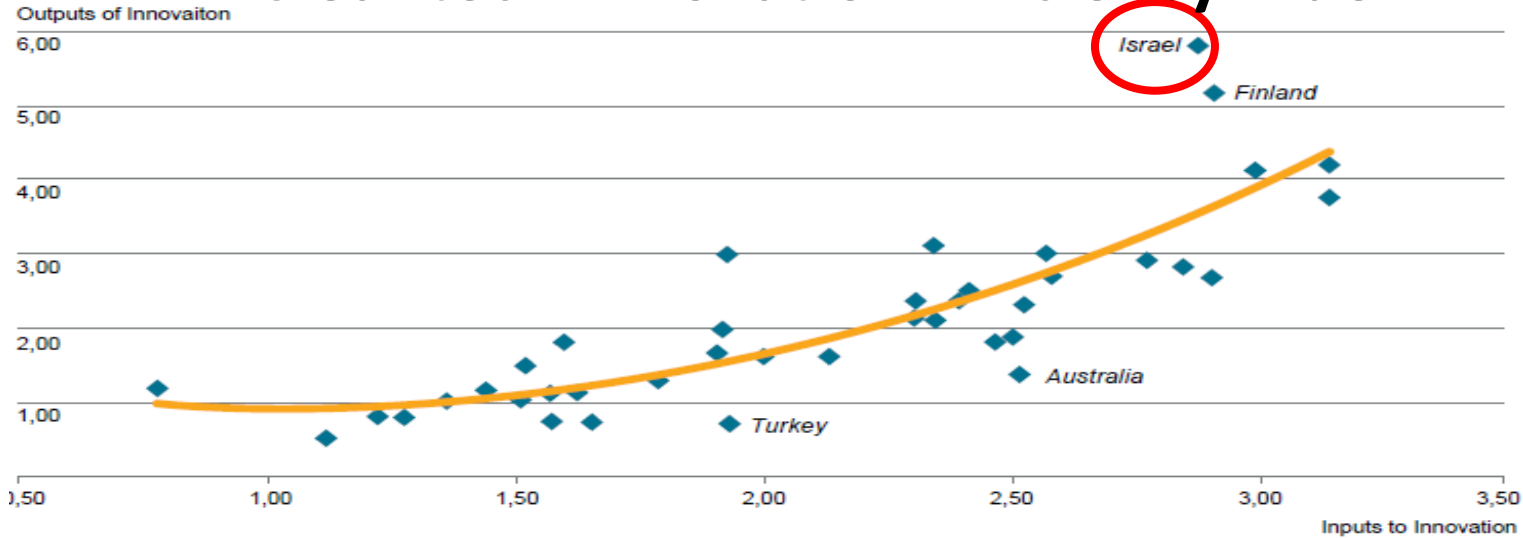
Natural gas reserves were found along the shore

3

Artistic Map Of East Mediterranean Offshore Blocks Illustration



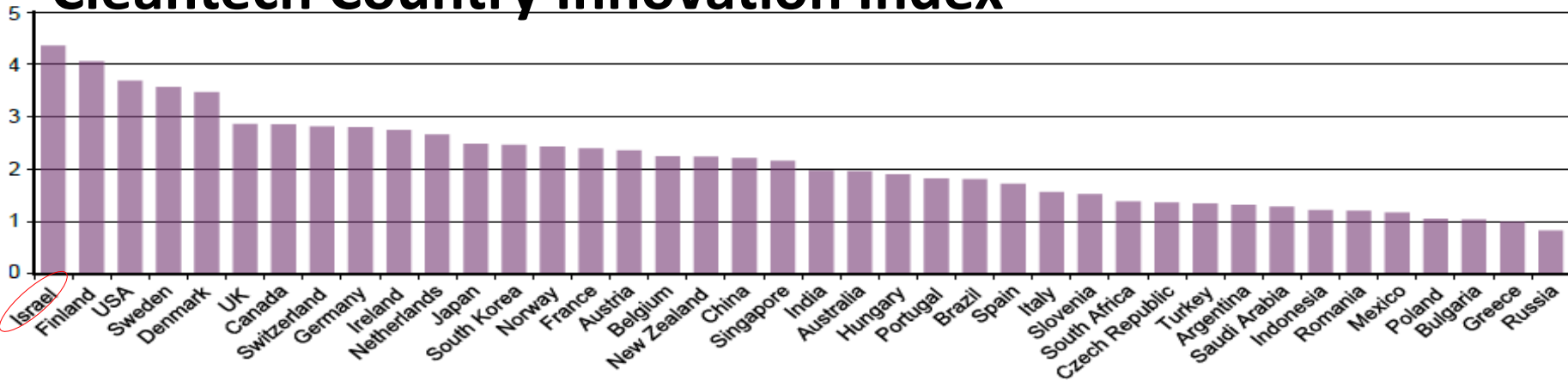
Cleantech Innovation Efficiency Index



The country is *the* cleantech innovation archetype. Relative to the size of its economy, Israel has had a disproportionate number of cleantech companies

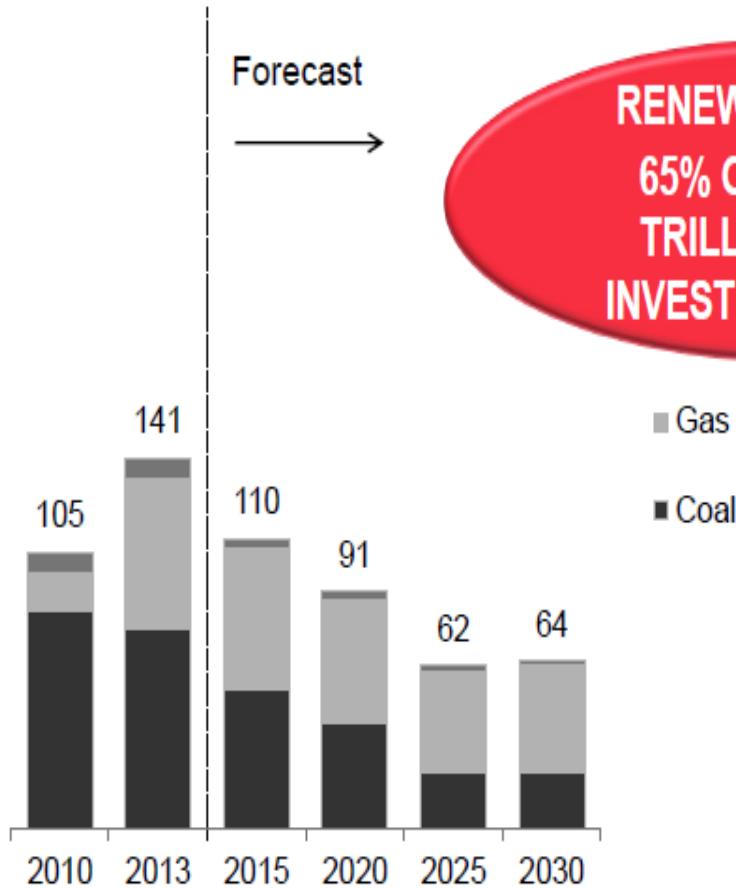
Global Cleantech 100 index

Cleantech Country Innovation Index

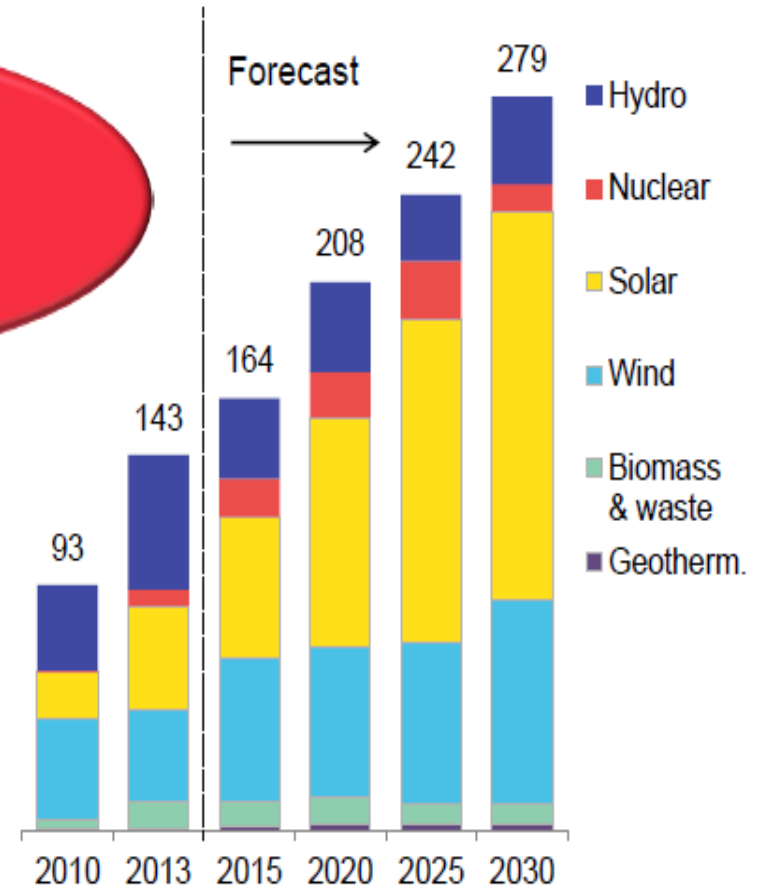


GLOBAL GROSS POWER GENERATION CAPACITY ADDITIONS, 2010–30 (GW)

FOSSIL FUEL



CLEAN ENERGY



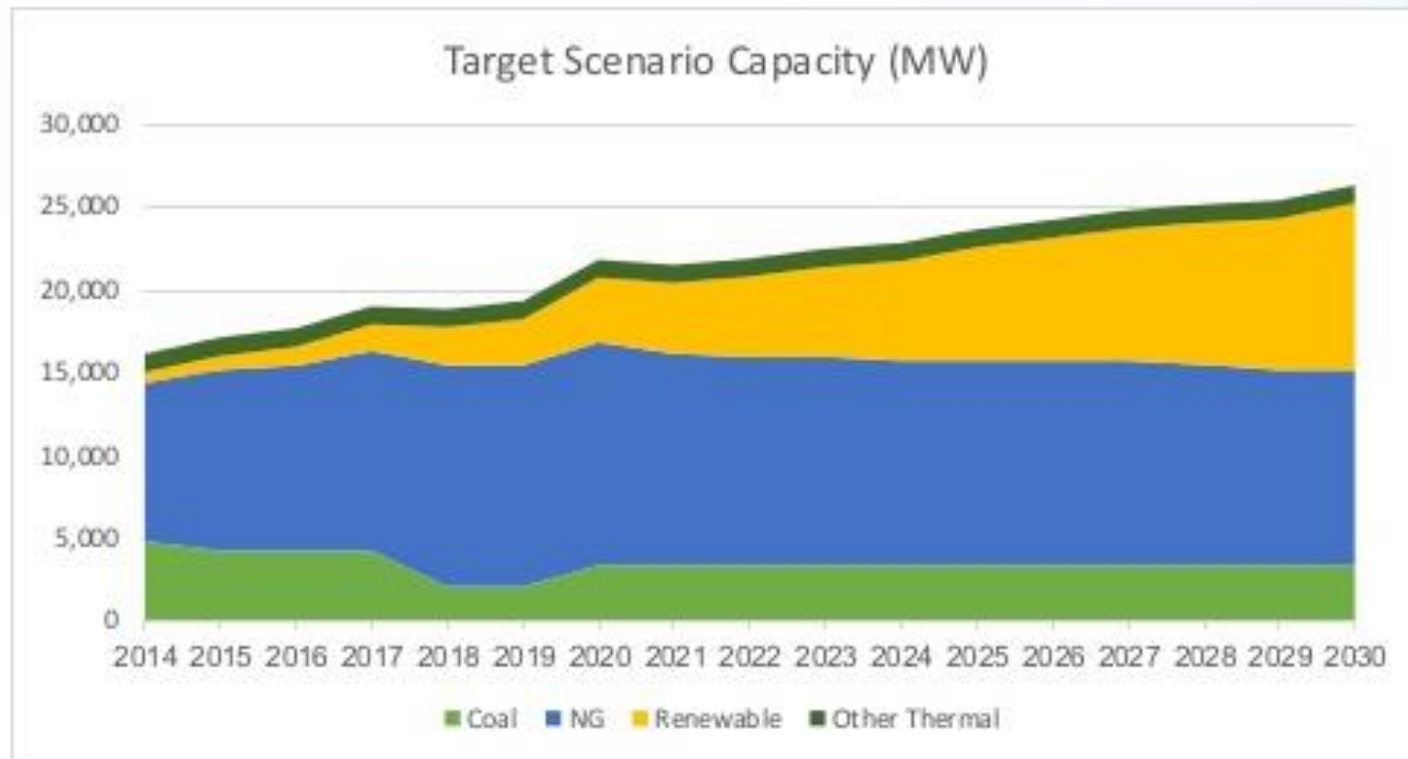
Note: Underlying data is from GREMO 2014

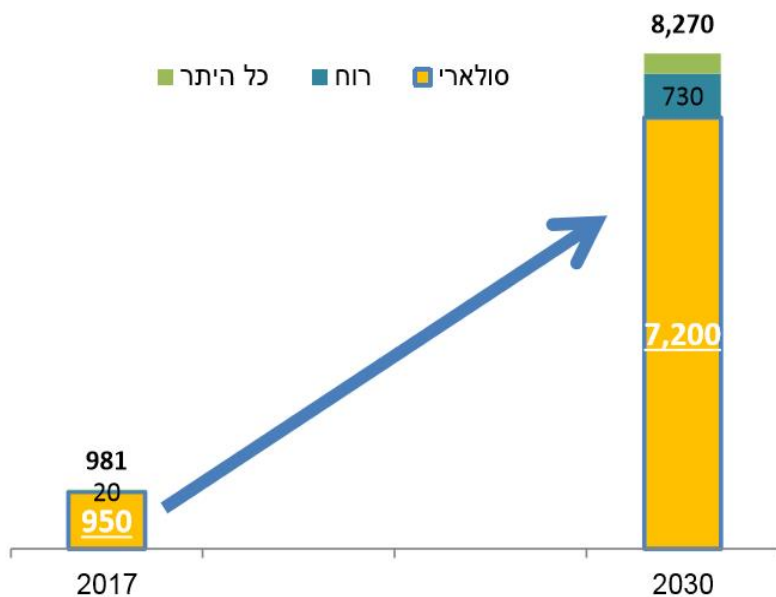
Source: Bloomberg New Energy Finance

“Solar will boom, accounting for 35% of global capacity additions”



Given the facts, this is Israel target scenario capacity for 2030





The required development of renewable energy supplier in the year 2030





So, in the next 12 years the investments required in the electricity market in Israel are going to be **15 billion \$** (with out taking in consider the infrastructures to the electric cars).

Energy efficiency

Smart grid technologies

Transmission electricity lines

Grinding old station

Taarifs for solar al storage

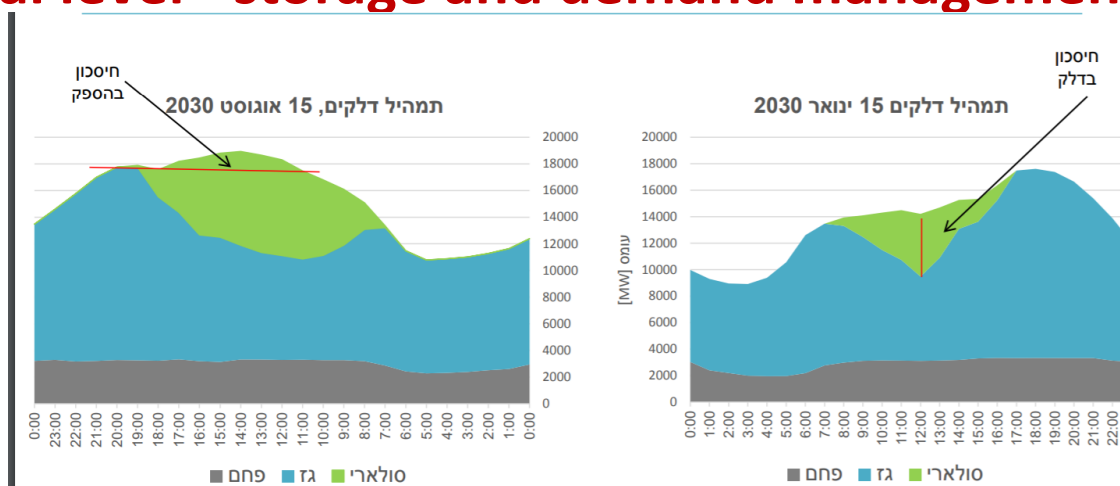
Gas transmission infrastructures

New gas power stations



The challenges and the opportunity to increase the percentage of renewable

1. How to introduce Massive amount of solar energy to a very loaded grid.
2. How to make solar energy a reliable source for use on a national level - storage and demand management.





3. Avoiding the construction of new transmission lines and the creation of local microgrid lines that are backed up to the large grid
4. Encouraging infrastructures for “Prosumers”
5. Demand management based on weather forecasting
6. Cyber Infrastructure Prevention



A leader in PV Power Electronics

- SolarEdge
- solararound
- SolarBead





Meeting the Challenge of the Smart Grid

- Greenlet - energy management and Peak Shaving
- Panoramic Power - full transparency of energy flow and usage
- Grid On - Fault Current Limiter (FCL) platform of solutions engineered to protect electrical distribution and transmission networks
- PowerCom - Smart Metering Technology
- Peak Dynamics - Meter data analytics
- Incom - Demand response and peak shifting





The Sleeping Giant

Energy Efficiency Start-ups

- Metrolight - electronic ballast solutions for HID lighting systems
- Phoebus Energy - hybrid water heating system
- PowerSines - energy efficiency and electrical savings in outdoor lighting



Government Pushing Forward

- Renewable Energy Technological Center (Capital Nature)
- Energy Academia Excellence Program
- Industrial Consortium for Batteries
- Supporting Beta Sites and Pilot Projects
- International Cooperation



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