



European Green Deal

Eero Ailio, Adviser Energy Transition, European Commission DG Energy

Eixo Atlantico, Viano do Castelo 10 March 2023

European Green Deal

A growth strategy to make EU's economy sustainable by turning climate and environmental challenges into opportunities across all policies by means of an inclusive, green transition



Become climate-neutral by 2050



Help companies become world leaders in clean products and technologies



Help ensure a just and inclusive transition

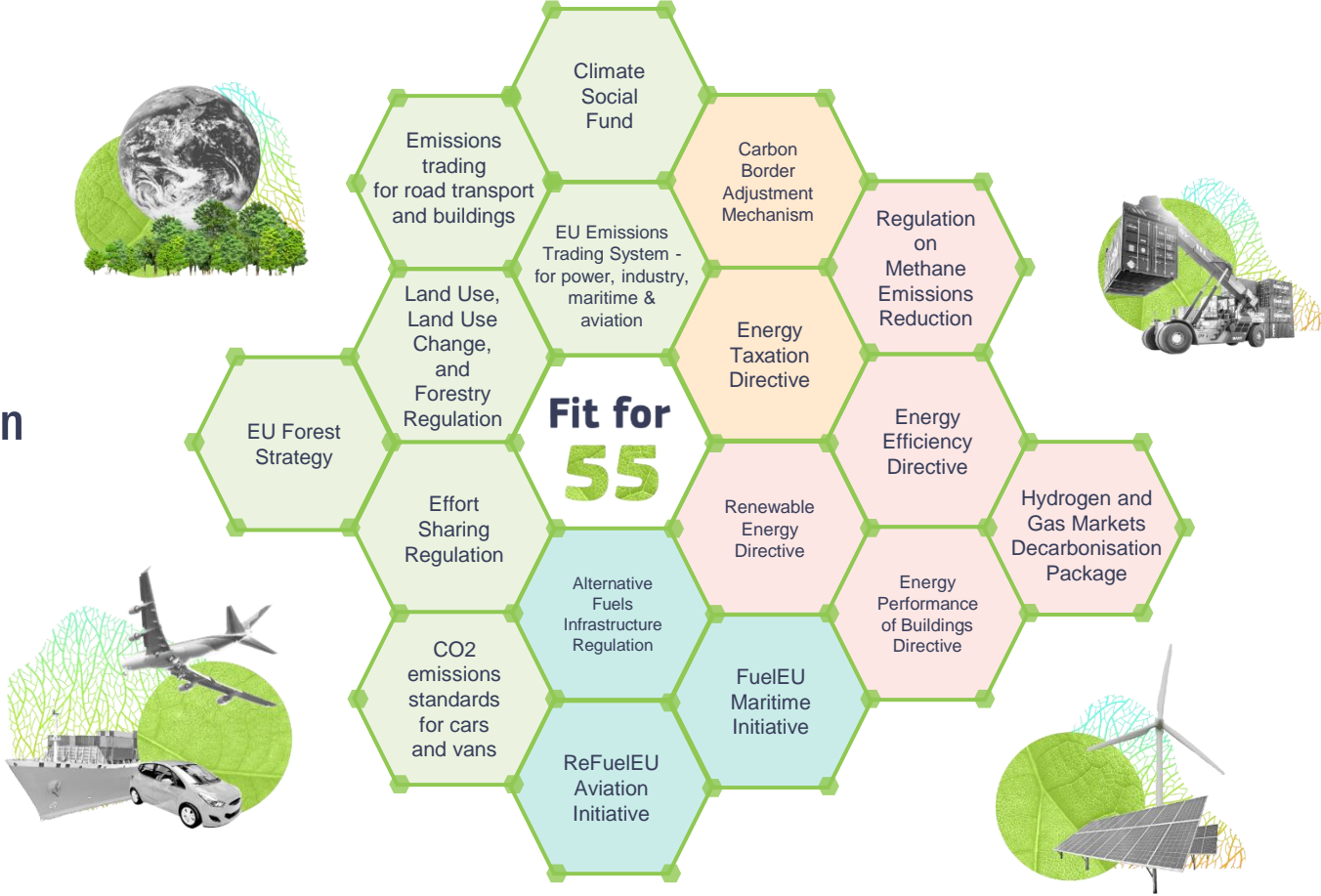


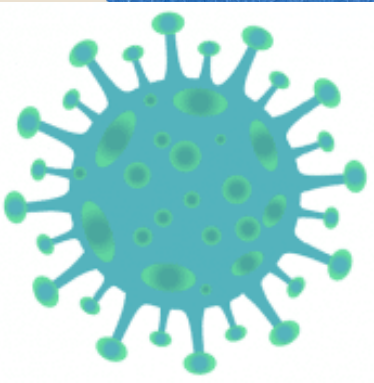
Protect human life, animals and plants, by cutting pollution



Upgrading EU legislation to cut GHGs to 55% by 2030 on the road to climate neutrality by 2050

Climate, energy, transport and taxation measures





First crisis: the virus -> Recovery and Resilience facility (2020)

□ Two-fold response to fund post-pandemic recovery:



Next Generation EU to boost financial firepower of the EU with funds raised on the capital markets
– **€750 billion**
(37% to climate action)



Stronger long-term budget of the EU for 2021-2027
– **€1100 billion**
(30% to climate action)

- A package for workers, businesses and sovereigns – **€540 billion**
- Funds to be spent before end 2026 following national **RR Plans** (coherence, green & digital goals)

Covid inflation-> price moderation toolbox to MS

URGENT ACTION ON PRICES

Keeping retail energy prices in check by confirming the possibility of price regulation to help protect consumers and our economy.

Guidance on temporary tax measures on windfall profits and use of emissions trading revenues, so governments can ease the pressure on household consumers.



State Aid measures: consultation with Member States on a potential Temporary Framework to grant aid to companies facing high energy costs.

Market actions assessing options to improve the electricity market design.

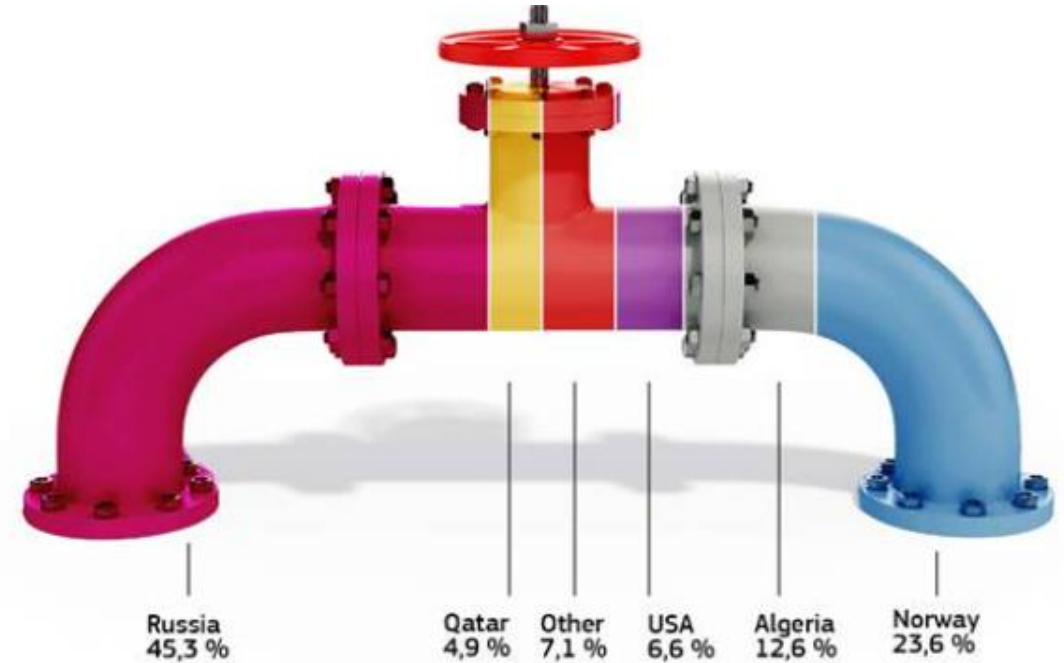
COVID Recovery plans



Share of RRP's estimated expenditure towards climate and digital objectives



Second crisis: Russian invasion of Ukraine Febr. 2022



Source: European Commission



REPowerEU

A roadmap to reduce the dependence on Russian fossil fuels and fast forward the energy transition without leaving anyone behind

- Based on **3 pillars:**



Energy saving and energy efficiency



Diversification of our energy supplies



Massive acceleration of investment in renewables

REPowerEU: gas independence & clean energy transition

REPOWEREU TO CUT OUR DEPENDENCE ON RUSSIAN GAS



More rooftop solar panels, heat pumps and energy savings to reduce our dependence on fossil fuels, making our homes and buildings more energy efficient.



Decarbonising Industry by accelerating the switch to electrification and renewable hydrogen and enhancing our low-carbon manufacturing capabilities.



Speeding up renewables permitting to minimise the time for roll-out of renewable projects and grid infrastructure improvements.



Doubling the EU ambition for biomethane to produce 35 bcm per year by 2030, in particular from agricultural waste and residues.



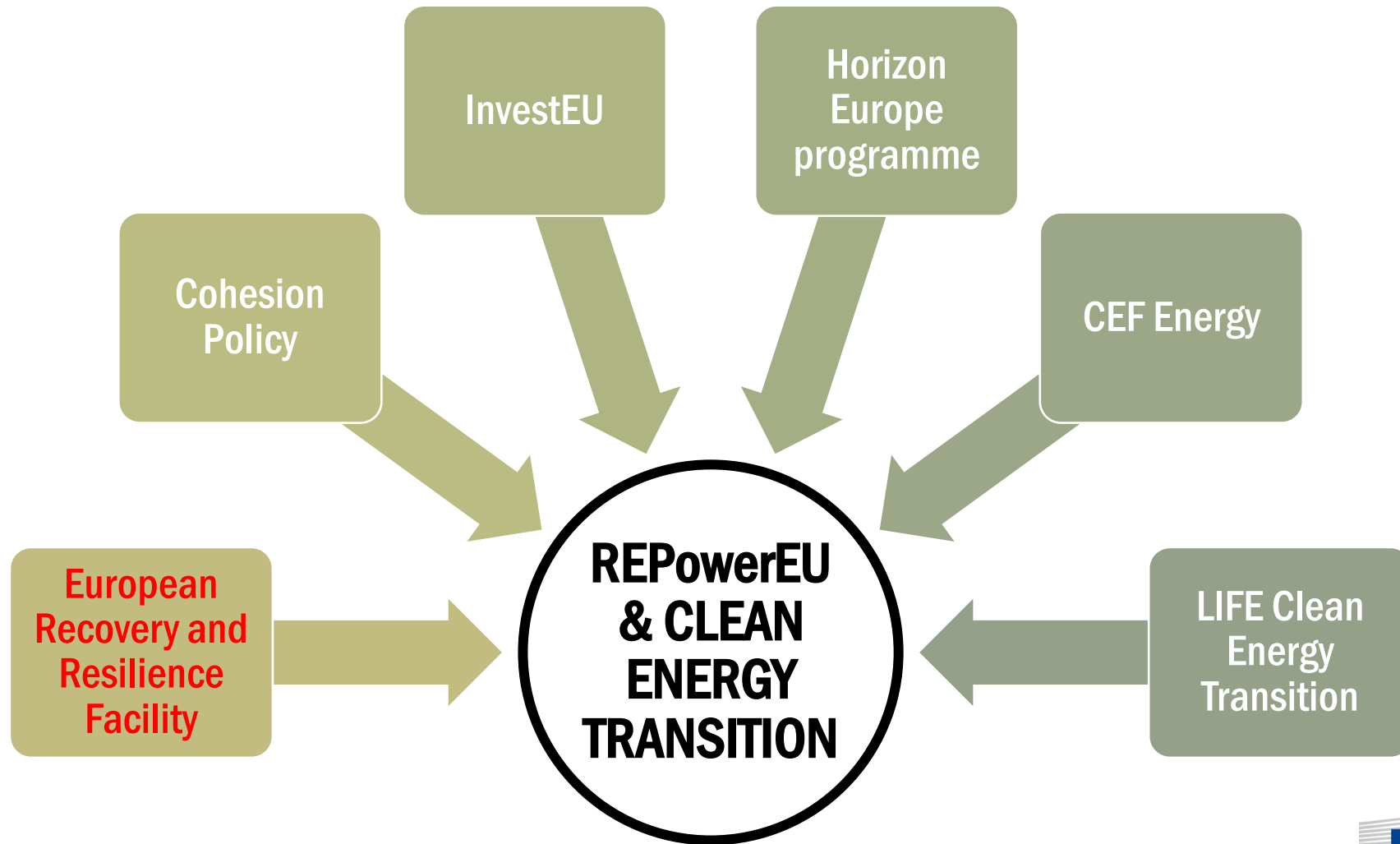
Diversifying gas supplies and working with international partners to move away from Russian gas, and investing in the necessary infrastructure.



A Hydrogen Accelerator to develop infrastructure, storage facilities and ports, and replace demand for Russian gas with additional 10 mt of imported renewable hydrogen from diverse sources and additional 5 mt of domestic renewable hydrogen.



EU financial mechanisms





Solidarity contribution from fossil fuel companies



Calculated based on profits currently taxable in the EU under corporate income taxation.



Calculated on surplus profits in 2022 made by companies in the fields of extraction, mining, refining of petroleum or manufacture of coke oven products.



Surplus profits are defined as profits which are above a 20% increase on the average profits of the reference period



A rate of at least 33% will be applied to the surplus profits.

Temporary solidarity contribution on surplus profits generated from activities in the **fossil fuel sectors** in 2022 • Member States will collect excess profits in 2022 and redistribute them to final consumers of energy

Decarbonising our energy system + REPowerEU extra

- Reducing greenhouse gas emissions by at least 55% by 2030 requires **higher shares of renewable energy** in electricity production and **greater energy efficiency**.

40% **45%**
new renewable energy target for 2030

36-39%
new 2030 energy efficiency targets for
final and primary energy consumption

600 GW solar by 2030
Solar Rooftops Initiative
Solar PV industry Alliance
Skills partnership



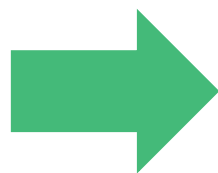
Decarbonisation, GHG emissions & Renewable Energy

Key findings



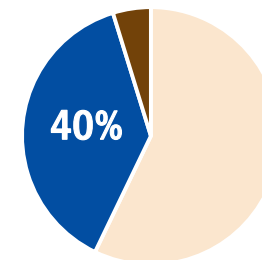
The EU has made substantial progress on delivering the European Green Deal and Fit-for-55 package:

- ✓ 2020 emission reduction target (32%) and renewable energy target (22.1%) surpassed
- ✓ A record 12% of EU electricity generated from solar (May to August 2022) & 13% from wind
- ✓ Expected growth in share of renewables in electricity mix from 37% in 2021 to 69% in 2030



Permitting procedures, grid integration issues and supply chain difficulties must be addressed.

2030



45%

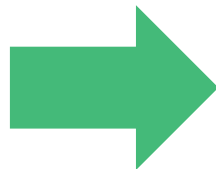
Energy Efficiency

Key findings

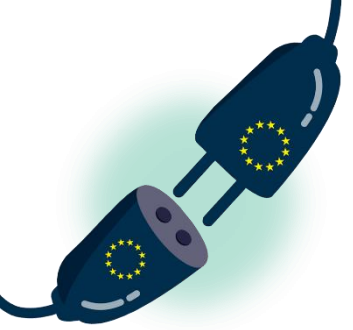


Energy efficiency remains the cheapest way to reduce EU's dependence on Russian energy and key to reduce GHG emissions:

- ✓ 2020 energy efficiency target surpassed (5-6% lower than the 20% target)
- ✓ Renovation Wave action plan has made significant advances with the aim of doubling the annual energy renovation rate of buildings by 2030.



More effort needed to achieve structural reduction and meet 13% target proposed in REPowerEU.



Top down + Bottom-up strategy



[Covenant of Mayors - Cities Energy Saving Sprint \(eumayors.eu\)](http://eumayors.eu)



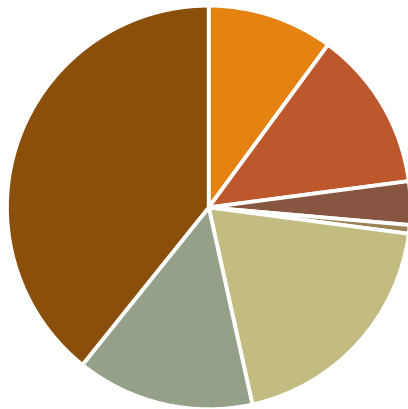
Cities is where the success of the Green Deal will be tested.

[Delivering the European Green Deal | European Commission \(europa.eu\)](#)



Financing REPowerEU

€210 billion by 2027



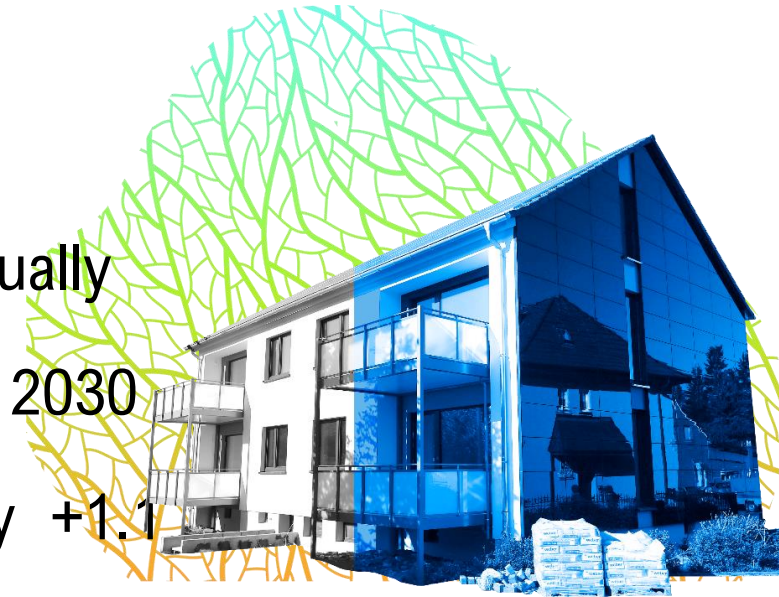
- Power grid
- Increase biomethane production
- Import sufficient LNG and pipeline gas
- Security of supply
- Energy efficiency and heat pumps
- Adapting industry to use less fossil fuels
- Renewables and key hydrogen infrastructure

- Additional investments of **€210 billion** are needed between now and 2027 to phase out Russian fossil fuel imports, which are currently costing European taxpayers nearly €100 billion per year.
- The **Recovery and Resilience Facility** is at the heart of the REPowerEU, providing additional EU funding.
- Member States should add a REPowerEU chapter to their **Recovery and Resilience Plans** to channel investments to REPowerEU priorities and make the necessary reforms.
- Other sources of REPowerEU financing include: Cohesion Policy funds, European Agricultural Fund for Rural Development, Connecting Europe Facility, Innovation Fund, national and EU funding in support of REPowerEU objectives, national fiscal measures, private investment, the European Investment Bank

Renovating buildings for greener lifestyles

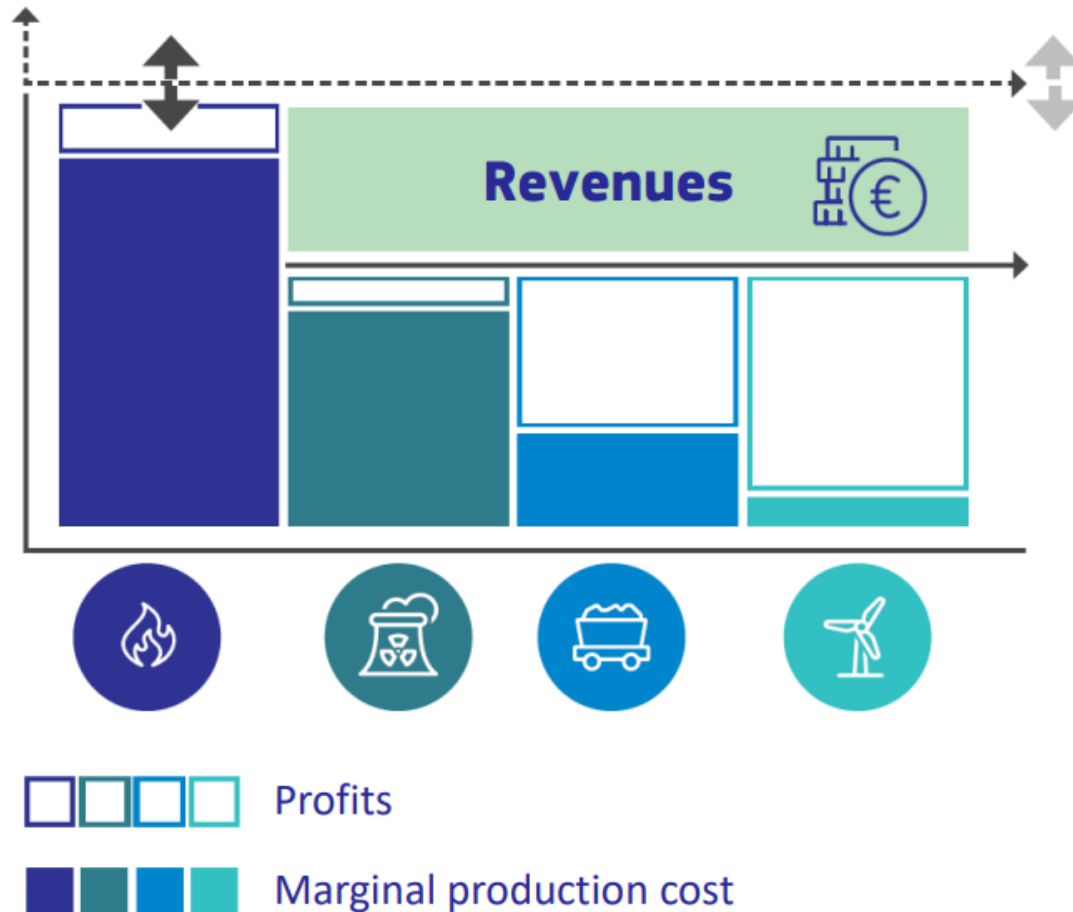
The Commission proposes to:

- Cut GHG emissions from **buildings by 60%** by 2030
- Require MS to renovate at least **3% of** all public buildings annually
- Reach a **49% renewable share** in energy used in buildings by 2030
- Require MS to increase **renewables in heating and cooling** by **+1.1** percentage points each year, until 2030
- **Set up a Social Climate Fund** to help vulnerable households renovate and change their heating/cooling systems
- **Double renovations** by 2030 & foster deep renovation (Renovation Wave)





1. Energy savings – electricity prices



Revenue cap of EUR 180/MWh for **electricity** produced from nuclear, lignite and renewables

- Revenue above this level will be collected by the Member States and redistributed to energy consumers (households, SMEs..)