

Energy Efficiency Workshop

IEA, Paris, 6-7 June 2012

How to improve visibility and effectiveness of indicators

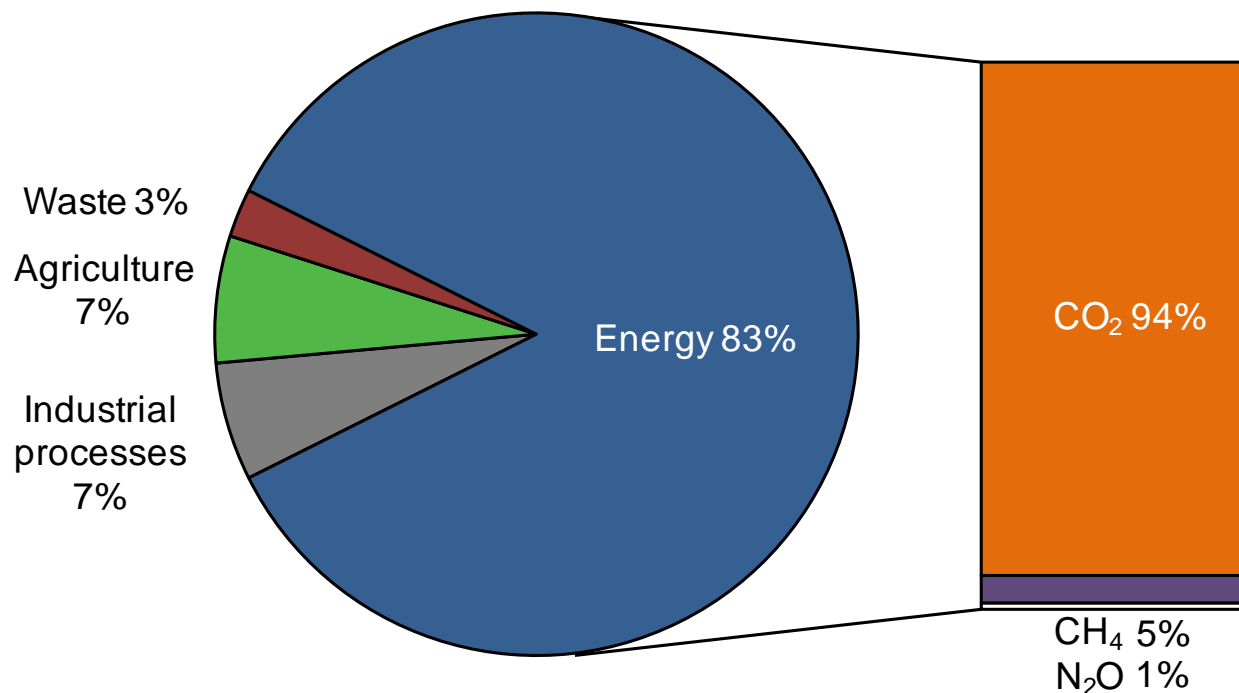
Jean-Yves Garnier
Head, Energy Statistics Division



International
Energy Agency

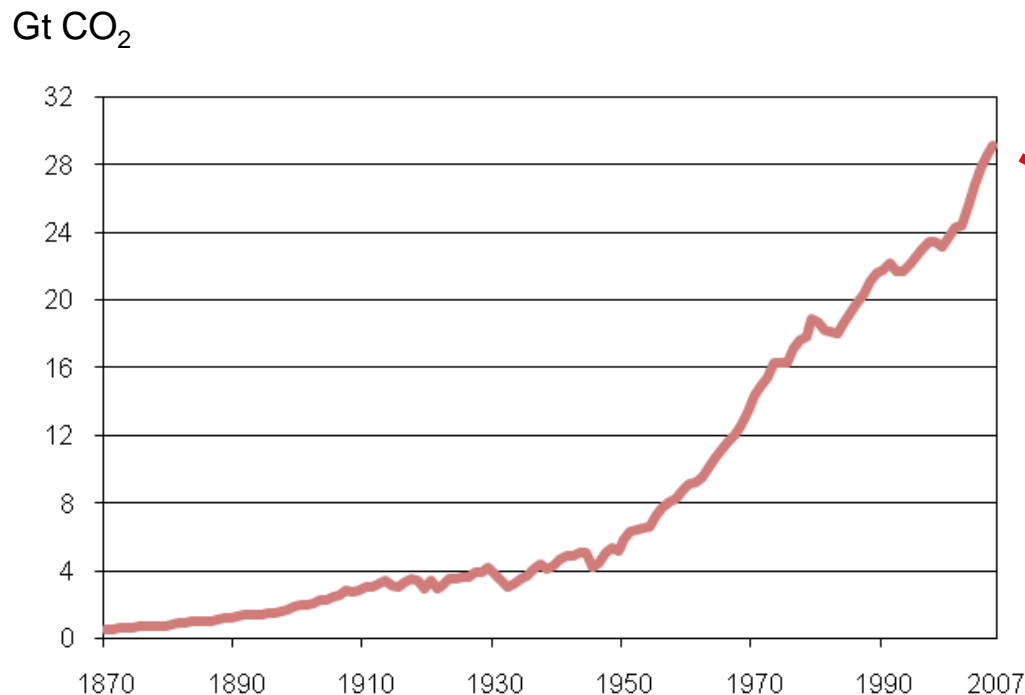


Share of sectors in global greenhouse gas emissions



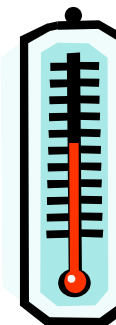
Accounting for the largest share of global GHG emissions, energy emissions are predominantly CO₂.

Evolution of global CO₂ emissions from fuel combustion



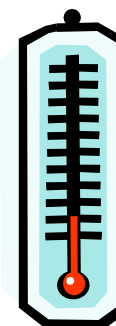
Since 1870, CO₂ emissions from fuel combustion have risen exponentially.

650 ppm
scenario



+6°

450 ppm
scenario

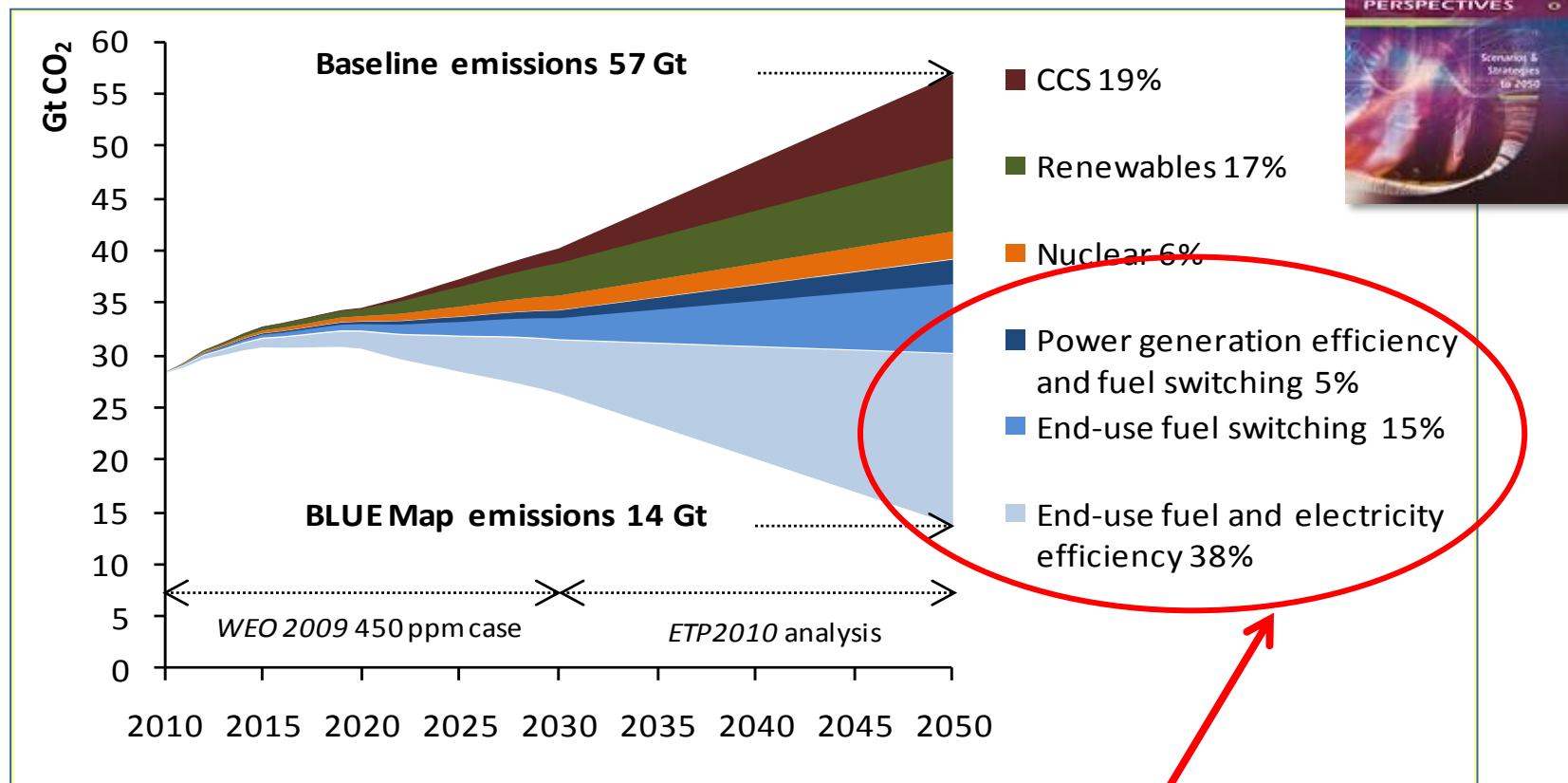


+2°

The way countries produce and consume energy is fundamental for global warming and climate change

What role energy efficiency can play in global climate policy

Is there a role for energy efficiency?

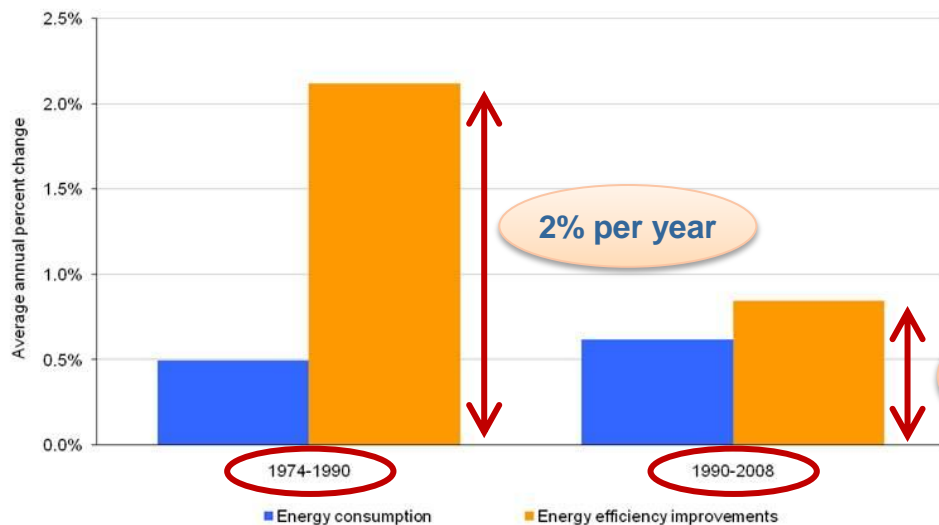


➔ Energy efficiency will account for almost half of the reduction

So, why so little on energy efficiency?



Rate of energy efficiency improvement, IEA11



Source: IEA Indicators Database, 2011

The oil price shocks in the 1970s did considerably more to restrain growth in energy demand than the energy efficiency policies implemented since the 1990s

© OECD/IEA - 2012



From 1974 to 1990, energy efficiency contributed to 2% per year to maintain growth



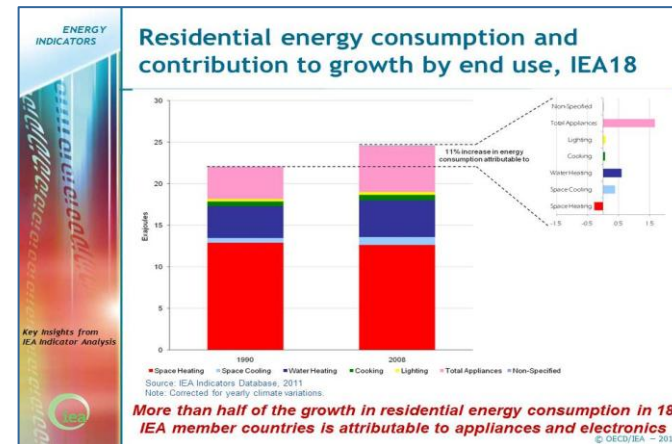
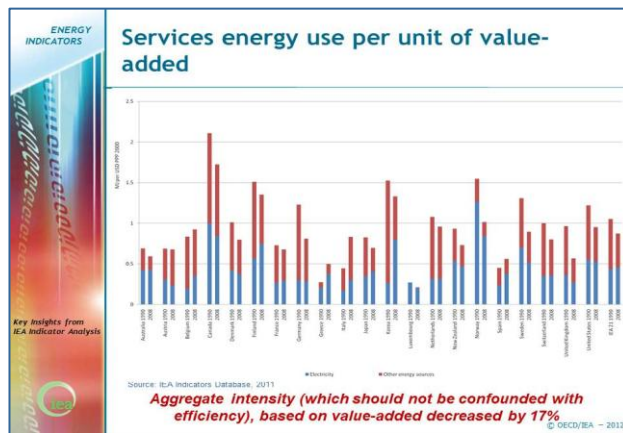
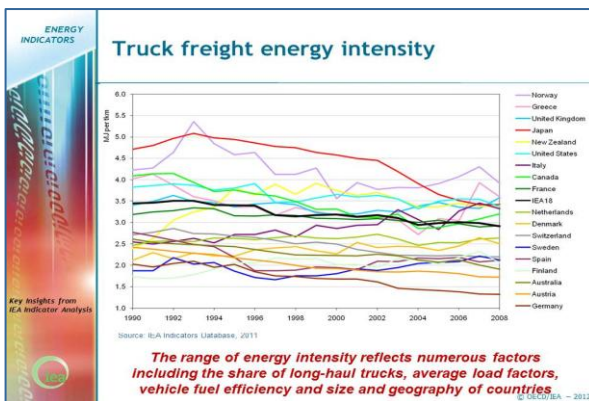
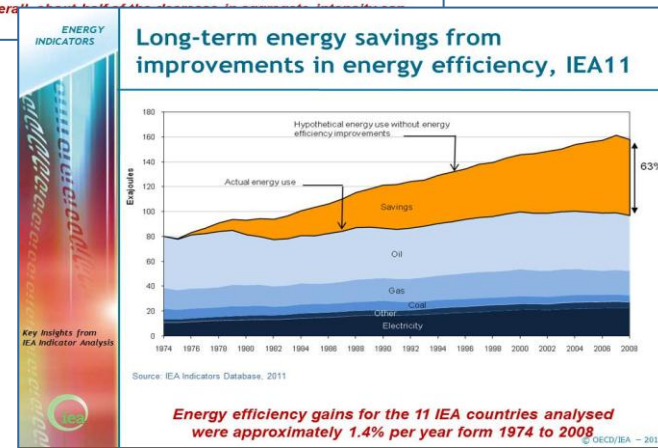
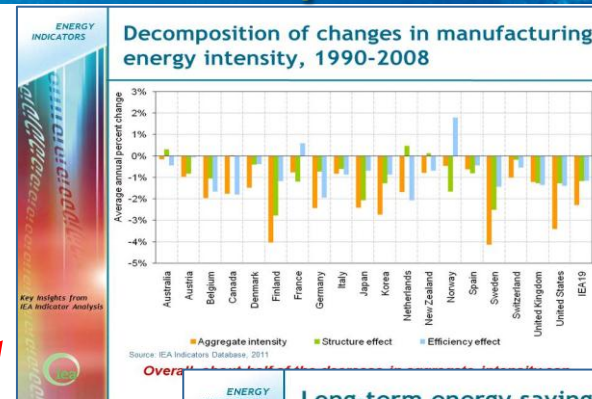
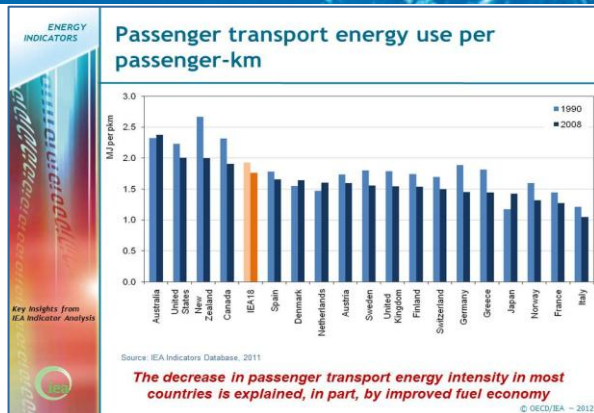
From 1990 to 2008 it contributed to less than 1% per year

So, why so little on energy efficiency?



- **Save energy in all sectors:**
 - Residential, Transports, Industry, Services
 - Electricity generation
- **Increase exports - reduce imports**
- **Increase domestic (and global) energy security**
- **Strengthen RD&D**
- **Create jobs**
- **Reduce greenhouse gas (mainly CO₂) emissions**

And why so little done on indicators when so much can be provided?



Is money a real issue?

88 Mbl/day

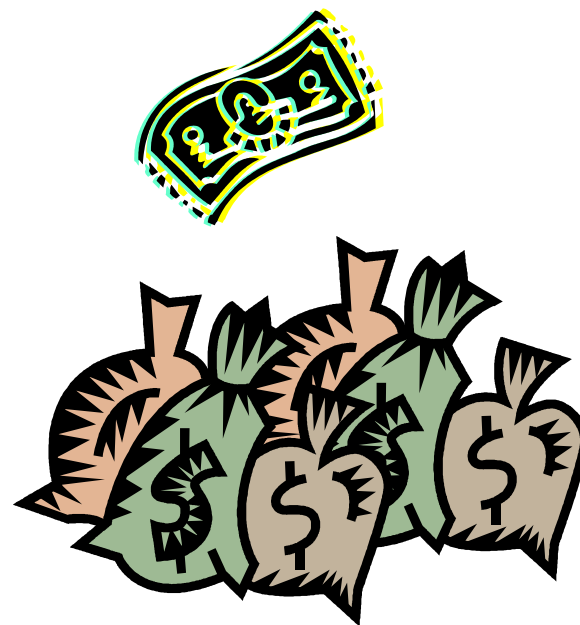
X 365 days/year

32 000 Mbl

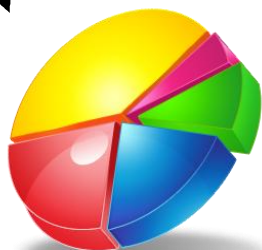
X 100 \$ /bl

3 200 000 M\$

= 3 200 x 10⁹ \$



Is money a real issue?



1% allocated to surveys



Expensive survey



$$= 3\,200 \times 10^9 \$$$



$$= 32 \times 10^9 \$$$


$$1 \times 10^6 \$$$

32 000 surveys

The Three Faces of the Same Coin

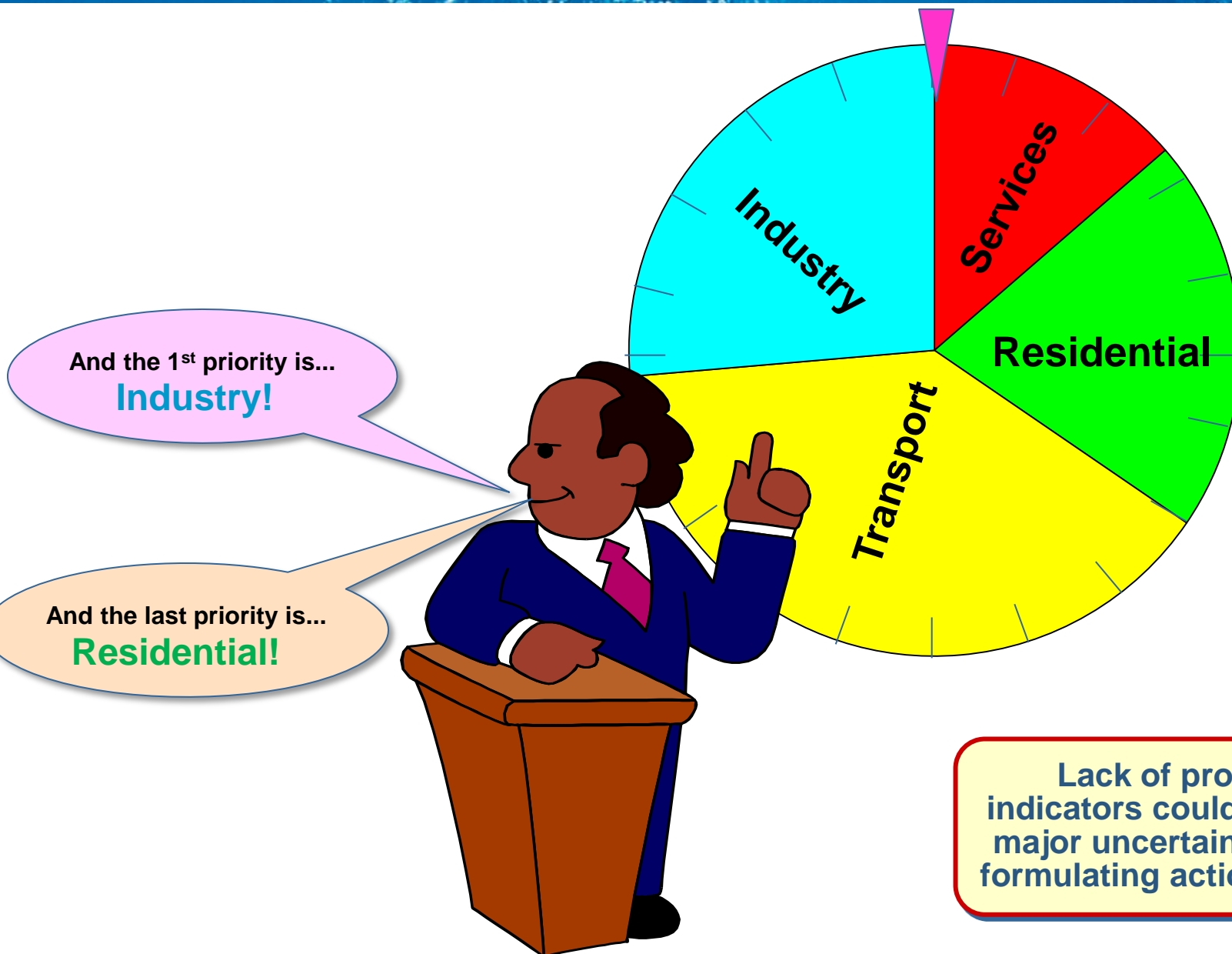


Collect, process, release the necessary detailed statistics



**What can be done by the three
groups of players to increase
the visibility and the role of
energy efficiency indicators?**

Energy efficiency is becoming a priority, but in many cases there is no data to launch sound energy efficiency policy and actions



Lack of proper indicators could lead to major uncertainties for formulating action plans

The other extreme would be to have too many data and indicators



... but it would be a much easier situation!

Number of articles on a particular topic in today's IEA Press Review



Oil 3



Coal, Gas, Electricity 5



Renewables 6



CO₂, CCS 4







Energy Efficiency 1

House adapts measure to halt light bulb efficiency law.....

A few points for discussion

Everybody more or less follows the price of oil, people talk about nuclear, shale gas, new wind farms but where do we hear about energy efficiency...

-  Why does energy efficiency have a low visibility in the policy makers' circle (despite announcements at the highest level), media, people?
-  Why do energy efficiency indicators have a low profile?
-  How to make the **invisible** more visible? How to increase the visibility and usefulness of the work on energy efficiency indicators?
-  What could (should) organisations do to (further) increase the visibility and usefulness of energy efficiency indicators?