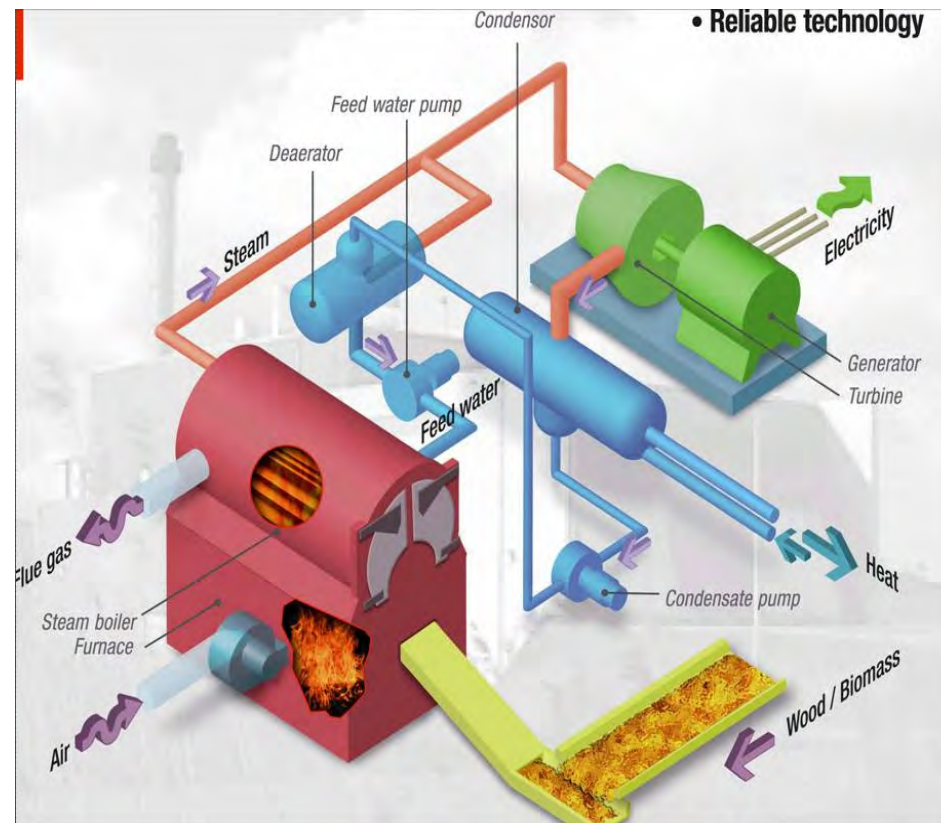


Evolution of the legislative framework of Cogeneration of Heat and power (CHP)



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LEGISLATOR'S SCOPE: **TO PROMOTE CHP**

- **Why to promote CHP?**

By producing both electricity and heat, CHP is the technology that exploits at most the energy sources available. A typical CHP unit may have efficiency higher than 80%. So, CHP is economically efficient and environmentally friendly.

- **How to promote CHP?**

By giving priority for absorption to electricity produced by CHP units and remunerating such electricity at a fixed price.(feed-in tariff)



Law 2244/94

- The first legal approach of CHP in the Greek legal system.
- The CHP Producer can sell the produced energy not directly to the consumers but only to PPC.
- The duration of those PPAs (power purchase agreements) is for 10 years with the option of renewal.
- Remuneration of CHP consists of energy and power part. Both parts are linked to the PPC's regulated retail tariffs.



Law 2773/99

- **The Electricity Market is gradually liberalized. An Independent System & Market Operator (HTSO) is established. From this time on, HTSO manages the power purchase agreements .**
- **CHP's total efficiency rate (sum of heat and power rates) must be at least 65% or 75% with reference to a combined cycle plant.**
- **HTSO is obligated to absorb the electricity produced by CHP plants when their power is less than 35 MWe.**



Law 3175/03

- The only reference regarding the cogeneration in this statute, is the possibility of issuance of an integrated license for both thermal energy distribution and electricity production upon the request of producer.



Directive 2004/8/EC

This directive is the major regulatory framework at EU level considering Cogeneration.

It intends to:

- Promote the high efficiency CHP,**
- Harmonize the method of assessment of CHP within the Member States,**
- Establish a uniform definition of electricity from CHP and of the high efficient CHP**



Law 3468/2006

•CHP rewarding is decoupled from PPC tariffs. The price that CHP energy receives is now strictly defined in the law.

However, CHP producers are looking forward to having an amendment of CHP pricing framework so as the feed-in tariff to be connected to the fuel prices.

•The payment to CHP plants is based only on energy produced and not on installed power.

•Definition of high efficiency CHP is given as the CHP that results to at least 10% primary energy savings.



Law 3739/2009

- **Implementation of 2004/8/EC directive**

- **Calculations of PESR(primary energy savings rate).The PESR is the criterion whether a CHP plant is a high efficiency CHP or not.**



Support of construction cost

- **Another tool for the promotion of CHP is the subsidization of the construction and the interconnection cost of CHP plants.**
- **CHP investment plans are eligible to be granted the incentives of: the Investment Incentives Law and the National Strategic Reference Framework 2007-'13**



Still pending...

•Issues to be regulated through ministerial decisions following and fully implementing the Law 3739/2009 and thus the 2004/8/EC directive:

A)Amendment in the Grid Code in order to include the CHP technology

B)Reference efficiency rates for PESR calculation

C)Equations and algorithms in order to determine the electrical and thermal efficiency rates of CHP plant.

D)CHP's Licensing Regulation

E)Remuneration regime of non high efficiency CHP