

1. List four basic elements of energy chain

- 1.
 - 2.
 - 3.
 - 4.
-

2. List names of three basic voltages used in power grid

- 1.
 - 2.
 - 3.
-

3. Name the two levels of power delivery in the power grid

- 1.
 - 2.
-

4. Correct the text so that the following statements are true

Negative regulation energy means, that the energy is $\left(\begin{smallmatrix} \text{consumed} \\ \text{produced} \end{smallmatrix}\right)$ by the regulation energy provider.

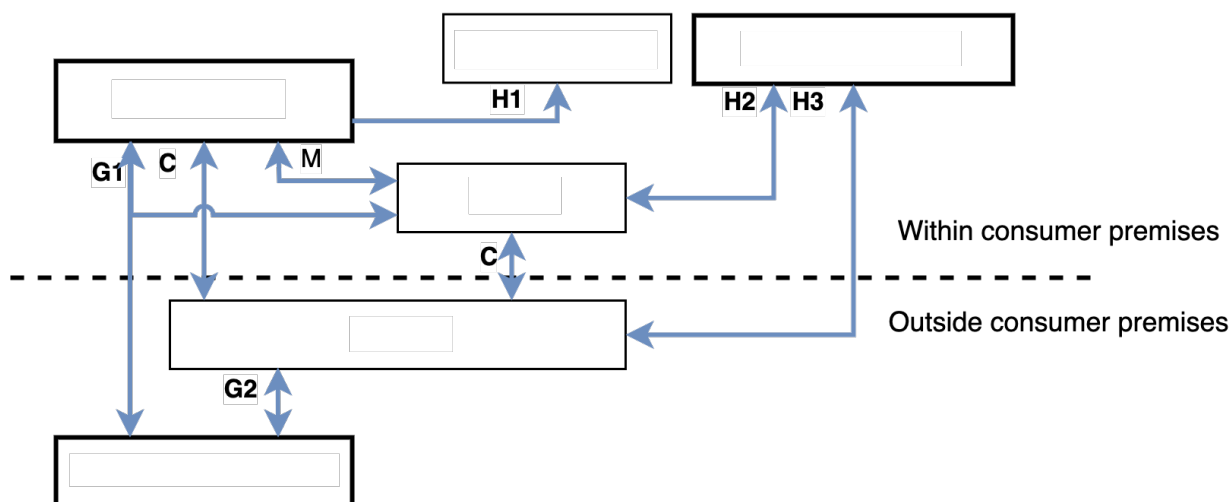
Positive regulation energy means, that the energy is $\left(\begin{smallmatrix} \text{consumed} \\ \text{produced} \end{smallmatrix}\right)$ by the regulation energy provider.

To make the grid stabile, the system imbalance shall be $\left(\begin{smallmatrix} \text{stored} \\ \text{neutralized} \\ \text{predicted} \end{smallmatrix}\right)$.

$\left(\begin{smallmatrix} \text{Producer} \\ \text{Balancing responsible party} \\ \text{Customer} \end{smallmatrix}\right)$ forecasts and dispatches the schedules for the grid operator and overtakes the responsibility for their imbalance and their settlement.



5. Choose correct labels from list and write them into the image to describe Interfaces of smart meter



Choices: Smart meter, Home Automation, AMI HeadEnd System, NNAP, LNAP, External Display,

6. Assign the group of requirements from the left column to the corresponding descriptions on the right.

Smart metering requirements for the metering operator	Provide data readings directly to consumer and/or any 3rd party
Smart metering requirements for the customer	Fraud prevention and detection
Smart metering requirements for security and data protection	Provide 2-way communication for maintenance and control
Smart metering requirements for commercial aspects of energy supply	Remote ON/OFF control of the supply AND/OR flow or power limitation