CLOSED DISTRIBUTION SYSTEM OPERATOR

HELB

www.helb.hr

About HELB

More than:

- 30 years of experience
- 30% highly educated employees
- 130 employees
- 120 certificates
- 3.000 reference projects

UNICERT ISO 9001

UNICERT ISO 14001

Global Inspection Services
CERTIFIED QUALITY MANAGEMENT
ISO/TS 29001:2020

UNICERT ISO 27001

UNICERT ISO 45001

SICHERHEITS CERTIFIKAT CONTRACTOREN

Engineering for electric power infrastructure

Engineering services

Manufacturing

Plant construction

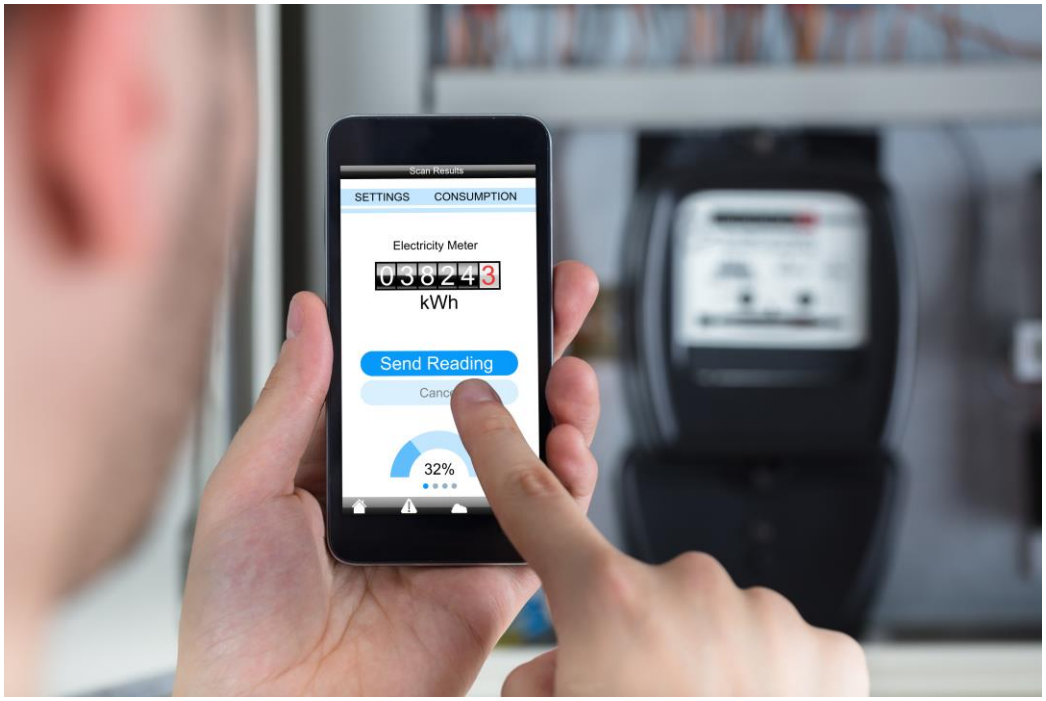
Oil and gas

Management and maintenance

What is a Closed Distribution System (CDS)?

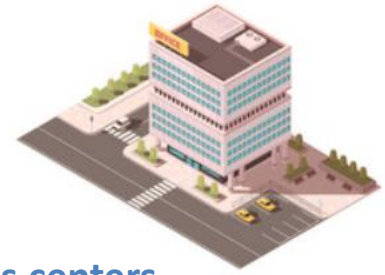
Any Business system:

- that distributes electricity within a **geographically limited industrial or commercial location** and
- where there is **more than one user** supplied with electricity through a **common metering point**



The most common examples of CDS's:

- Economic zones



- Shopping and business centers

- Health rehabilitation centers

- Transport and logistics systems

- Special purpose zones and facilities

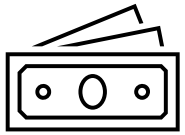
Legal assumptions of the CDS

The new ELECTRICITY MARKET LAW:

- system that distributes electricity within a geographically limited industrial or commercial location – **has to establish Closed distribution system**
- **The Owner** of the system **has to** choose **CDS Operator**
- CDS Operator connects each individual user via a **separate billing metering point**
- **CDS operator** must be **technically, professionally and financially qualified**
  - **Energy permit** from HERA
- **Fines:**
  - Up to €65,000 - legal entity
  - Up to €6,500 - responsible person
  - Up to €6,500 - individual

Existing condition

- Owner's **additional expenses** related to the use of the services of companies dealing with **facility management**

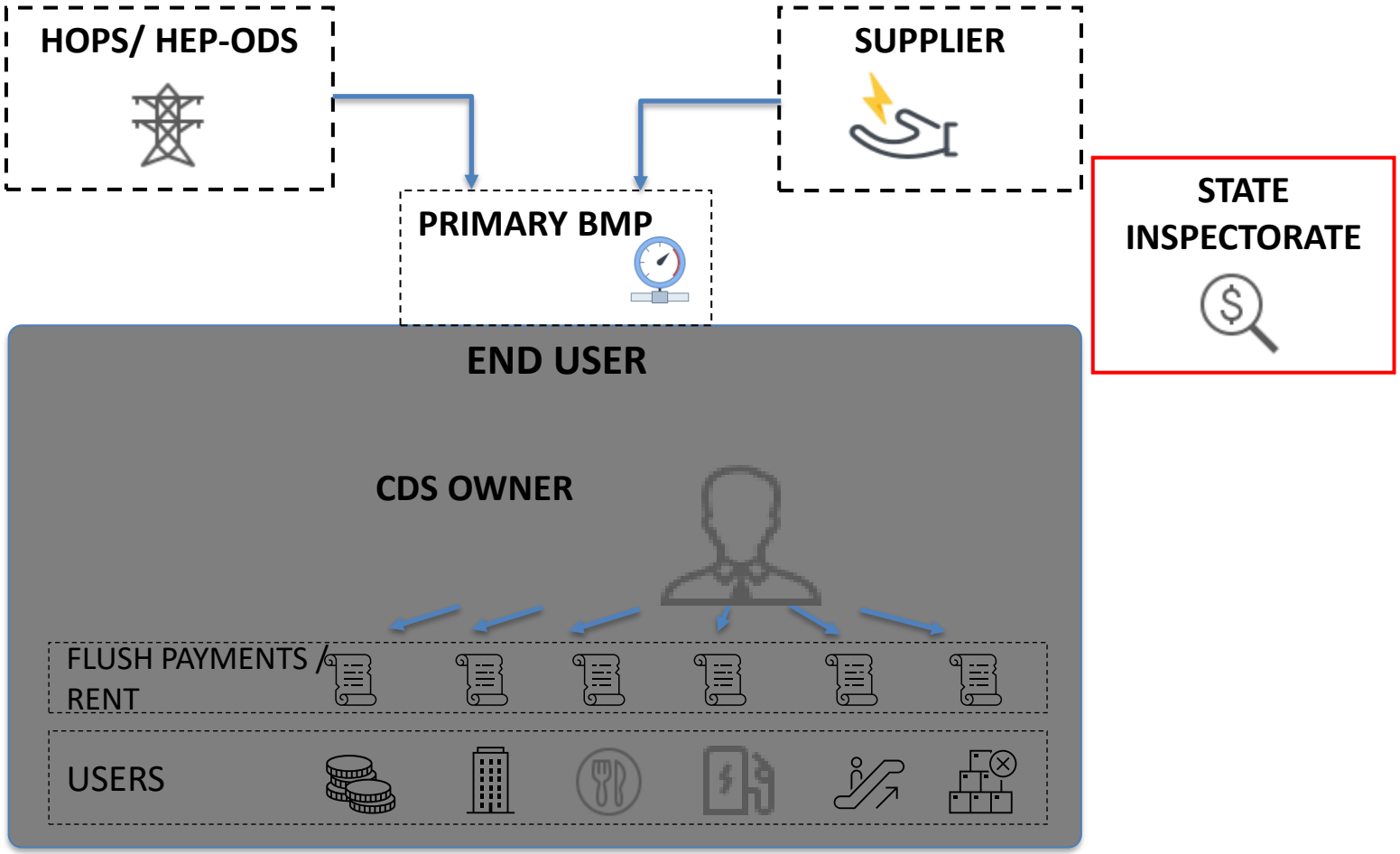


- **Responsibility** for safety and reliability of supply **not defined**

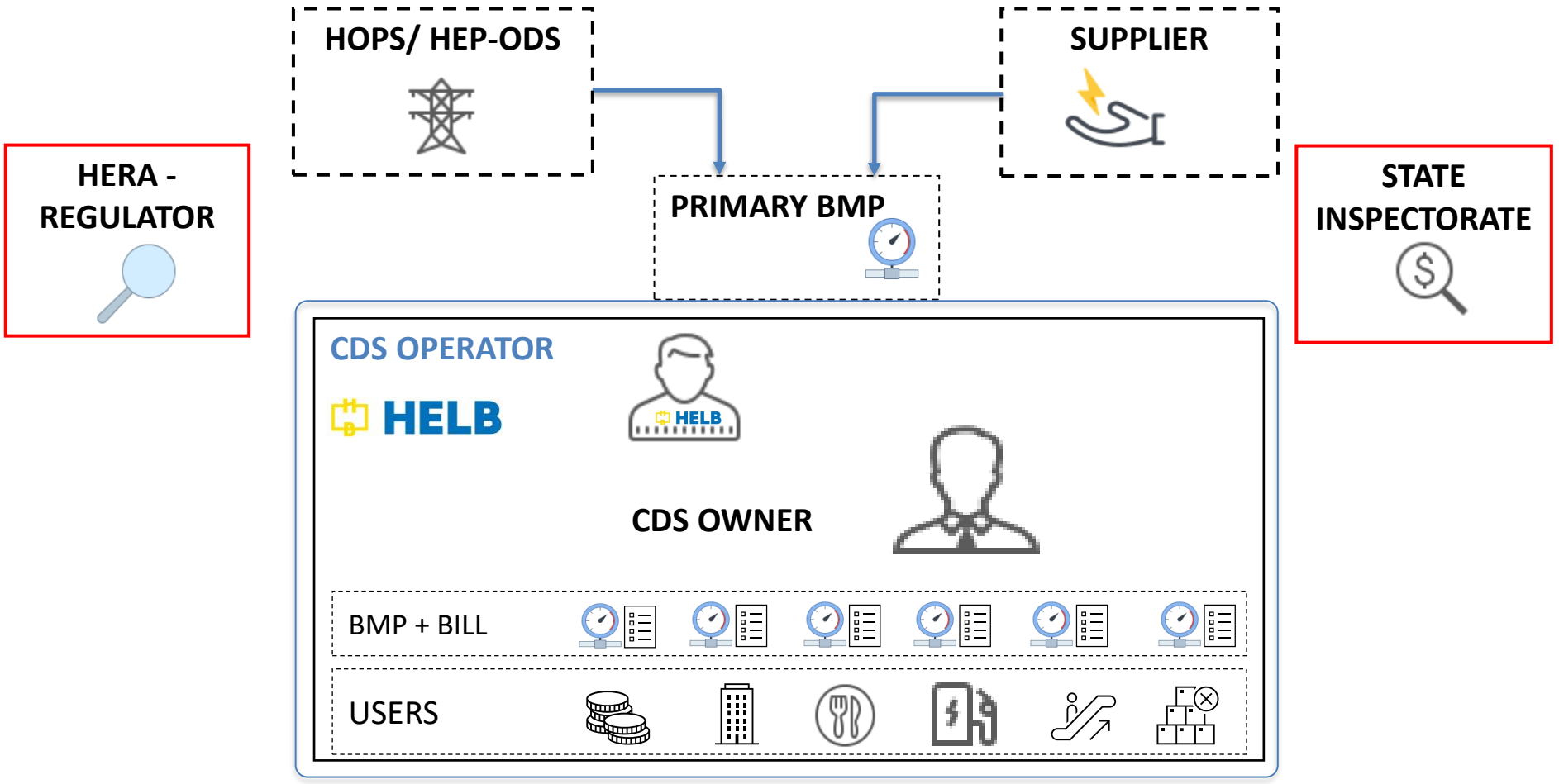
- **End users** of the grid **can not** achieve **customer status**

- **Potential new users** in these zones **cannot get an EE connection** - making investment much more difficult

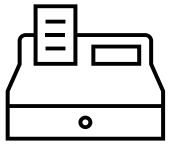
Relations between participants - the current state



What is the solution?

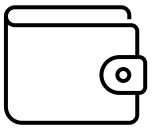


What does the CDS enable?



TRANSPARENCY OF COSTS

- Measurement of actual electricity consumption
- Market conditions for the supply



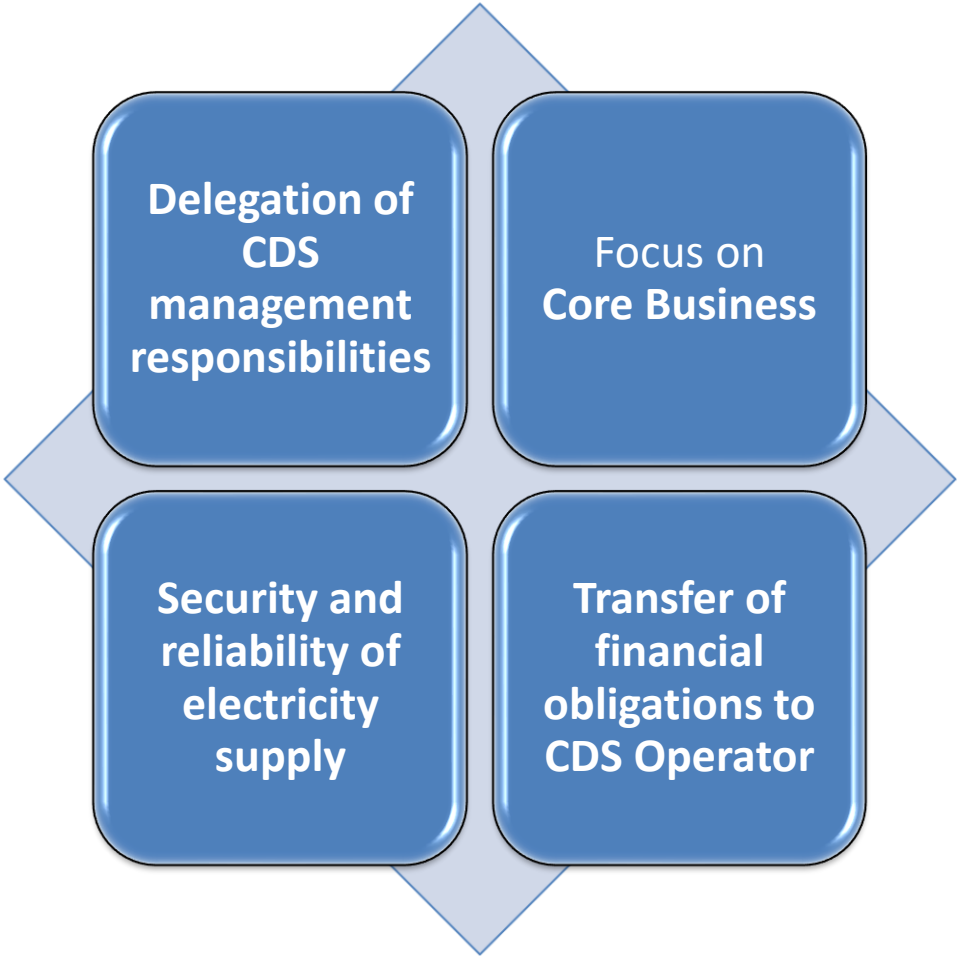
RATIONALIZATION OF COSTS

- Management of measurement data
- Energy efficiency measures

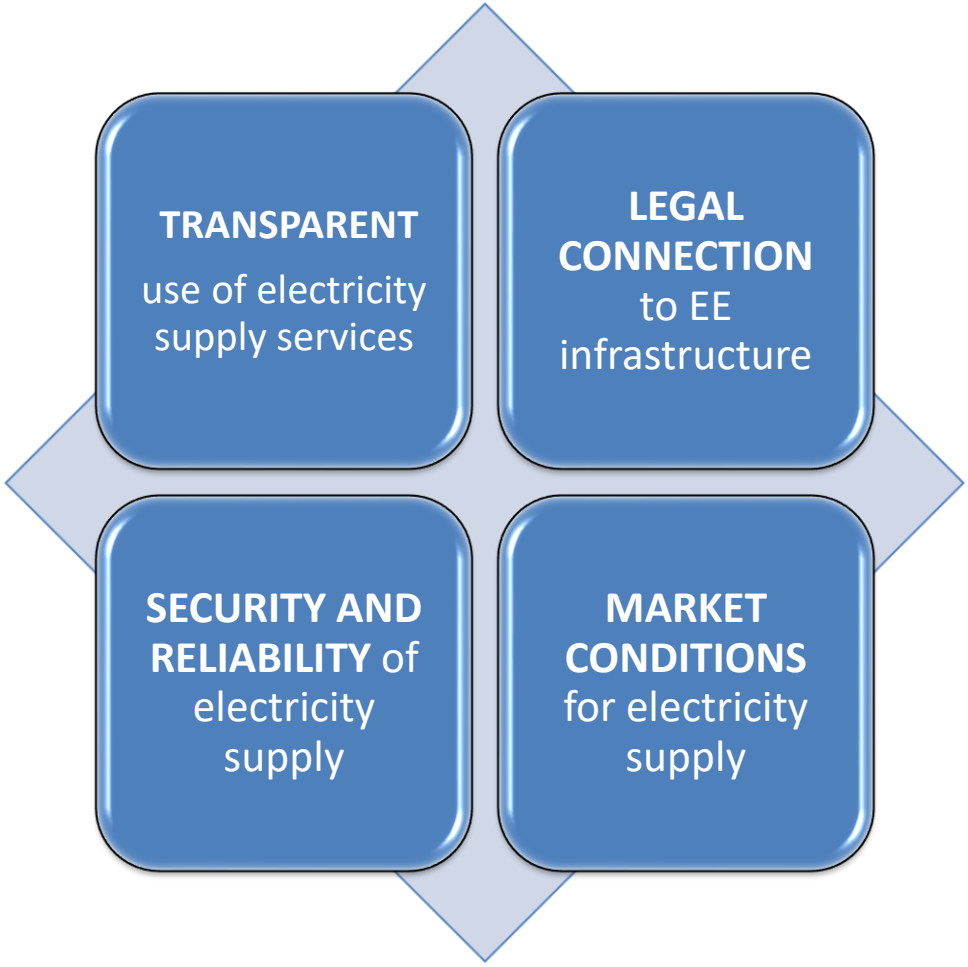
GREEN AND DIGITAL TRANSITION

- Green certificates (GoO)
- Distributed production from RES
- Advanced measurement system
- Power plant management system

System values – for CDS OWNERS



System values – for CDS USERS



HELB as a partner in CDS

HELB is technically, professionally and financially qualified to perform operator activities in CDS

It enables all users of ZDS to access and use electricity in a maximally transparent and efficient manner

Users are guaranteed a minimum service standard as in the public distribution system

Digital platforms enable the user to manage and monitor electricity consumption

Use of RES, green certificates, increase in energy efficiency, and reduction of losses in electricity distribution

CDS establishment process

1. CDS Acquisition

2. CDS Licensing

3. ADMINISTRATIVE – TECHNICAL PREPARATION

4. ELECTRICAL ENERGY MANAGEMENT AND DELIVERY

1) **Letter of intent**
   (HELB-CDSO → CDS Owner)
2) **Confidentiality Agreement**
   (CDS Owner and HELB-CDSO)
3) **In-depth recording**
   (HELB-CDSO)
4) **Technical and commercial study**
   (HELB-CDSO)
5) **Offer for the provision of OZDS services**
   (HELB-CDSO → CDS Owner)
6) Signing of the **CDS management contract**
   (CDS Owner and HELB-CDSO)
7) **Appointment of CDS operator**
   (CDS Owner)

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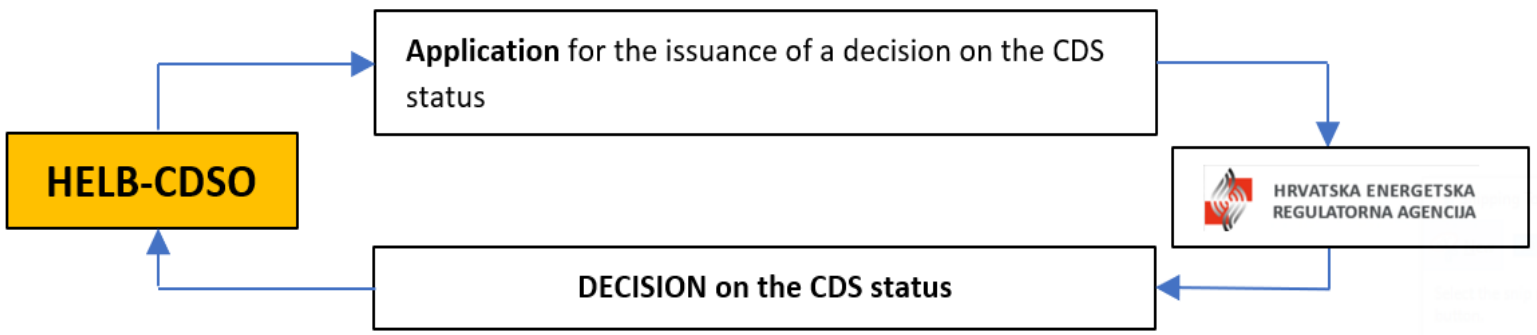


CDS establishment process

1. CDS Acquisition

2. CDS Licensing

3. ADMINISTRATIVE – TECHNICAL PREPARATION

4. ELECTRICAL ENERGY MANAGEMENT AND DELIVERY

3.1. ARRANGEMENT OF ELECTRICAL INFRASTRUCTURE
(TS 35/20/0,4 kV; MV and LV lines…)

3.2. CDS USER CONNECTION
1) **Letter of intent** – offer to use the network in CDS
2) **Connection agreement + EE consent**
3) Construction of **EE connections**
4) Equipping and establishment of **billing metering points** (**BMP**)
5) **Contract on the use of network and electricity supply**

3.3. STATUS CHANGE ON THE PRIMARY BMP
1) Request for temporary transfer of the Network Usage Agreement
2) Signing of the Contract on the transfer of the Network Usage Agreement
3) Signing of the new Electricity Supply Agreement

3.4. IMPLEMENTATION OF THE MEASUREMENT DATA MANAGEMENT SYSTEM

3.5. IMPLEMENTATION OF THE REMOTE GUIDANCE SYSTEM

CDS establishment process

1. CDS Acquisition

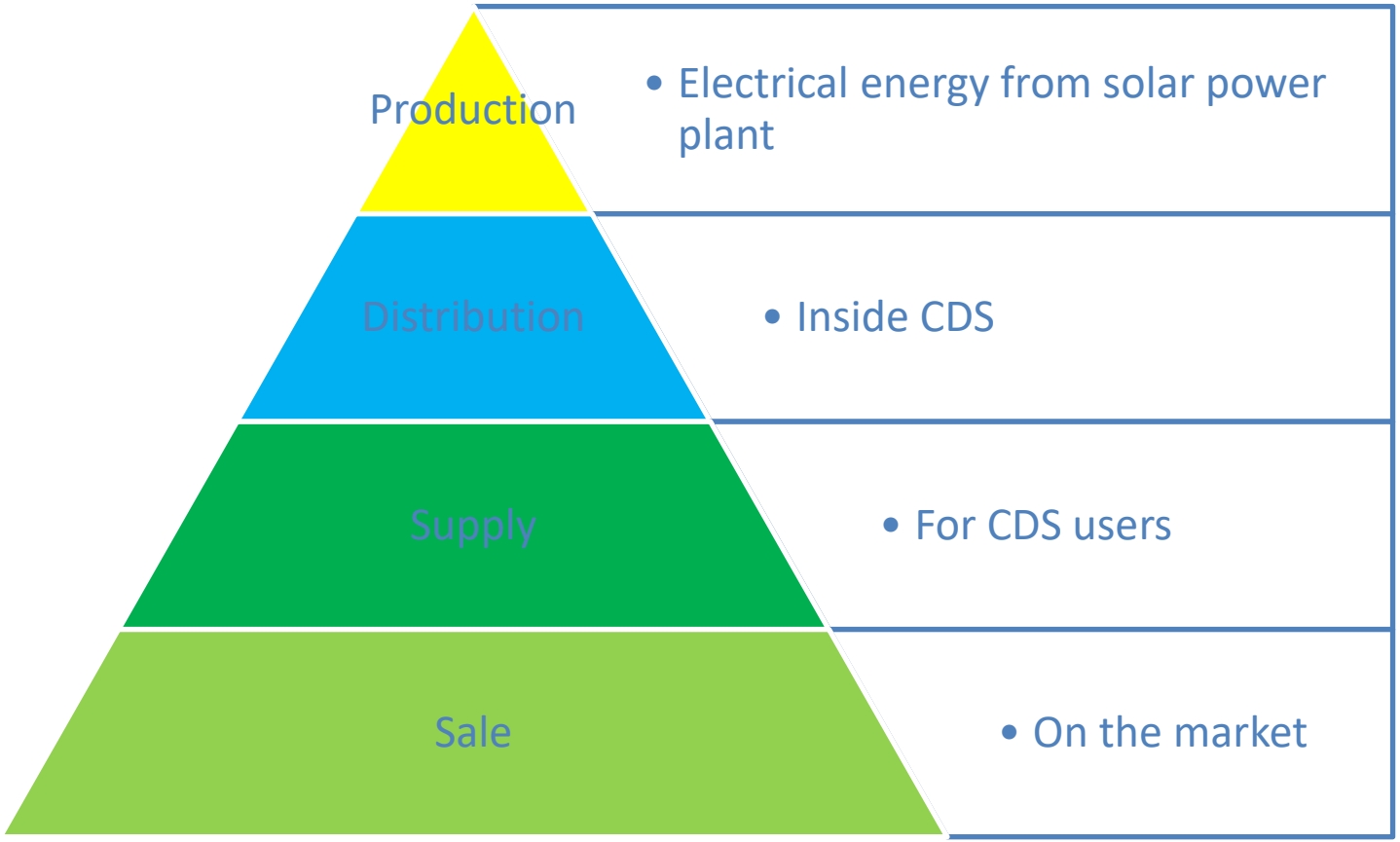
2. CDS Licensing

3. ADMINISTRATIVE – TECHNICAL PREPARATION

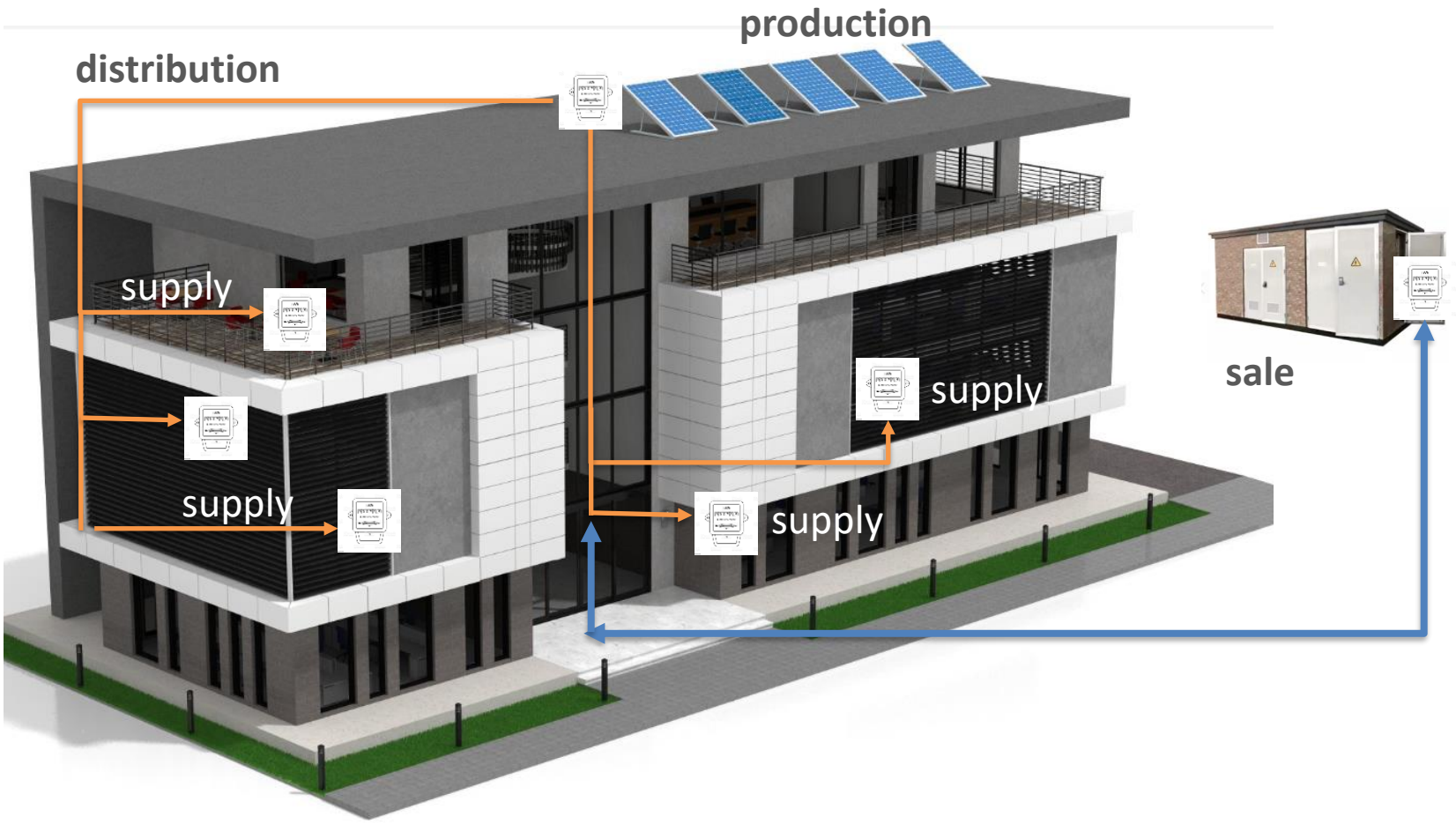
4. ELECTRICAL ENERGY MANAGEMENT AND DELIVERY

1) **Supply of electricity**
   (Supplier/HEP-ODS/HOPS → HELB-CDSO)
2) **Supply of electricity within CDS**
   (HELB-CDSO → CDS user)
3) **Supervision and management of CDS**
   (HELB-CDSO)
4) **Collection (reading) and processing of measurement data**
   (HELB-CDSO)
5) **Calculation and collection of payment for electricity consumption**
   (HELB-CDSO → CDS user)

Electrical energy from solar power plant in CDS



Own production in CDS

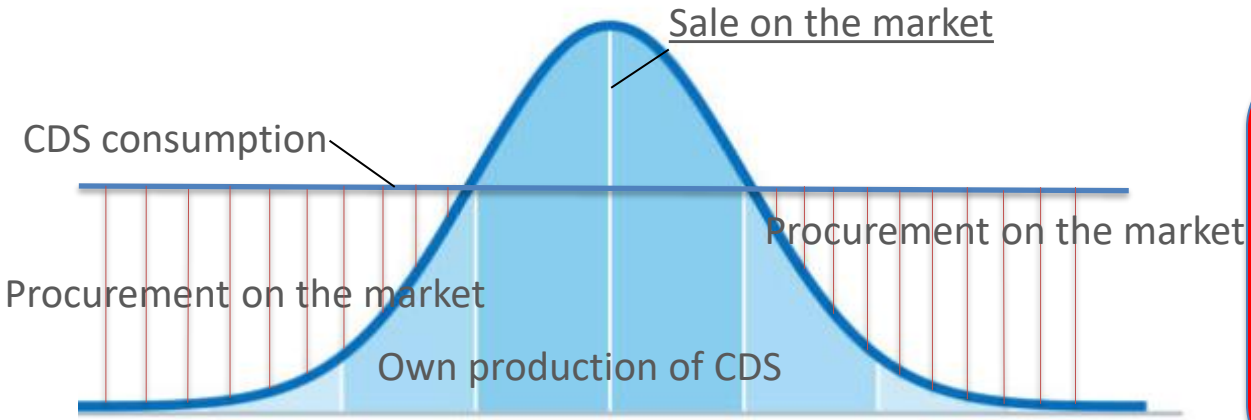


Ensuring maximum self-sufficiency in CDS

- model: Customer with own production (Active customer)
- optimization of SE production capacity
- procurement of electricity on the market under the most favourable conditions
- placement of surplus electricity according to market conditions (aggregation)

Active customer

Customer with own production



Electrical energy exchange diagram

Producer (requires additional connection power)

Customer with own production

What are the key steps?

1. Choice of licensed CDSO
2. Decision on the establishment of CDS
3. Technical and commercial preparation of CDS
4. Design, construction and commissioning of SE
5. Production, distribution and supply of electricity for users of CDS

Can we HELB you ?

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