

Standard Measurement

applications of today and tomorrow (often) require simple and complex measurement concepts to meet technical, legal and commercial needs

Goals that we are pursuing together

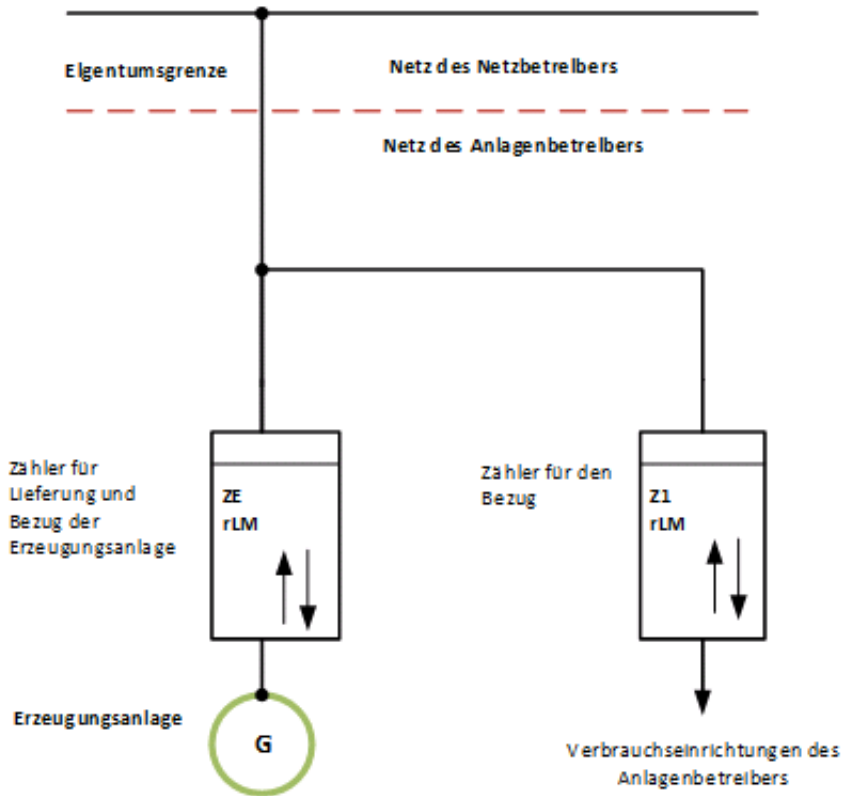
- Production Optimization
- Energy management
- Reduction of network fees
- Electricity costs reduction
- Revenue , Revenue Optimization
- consumption optimization

Based on the nationwide independent metering point operation system, Acteno energy delivers measurement concepts for plant operators, industrial sites, direct marketers and network operators. Standard concepts can be realized for SLP and RLM measurements, as well as individual measurement concepts according to user requirements.

The following provides an overview of current measurement concepts:

Single surplus-supply

Surplus without own consumption (Full supply)



Special Features

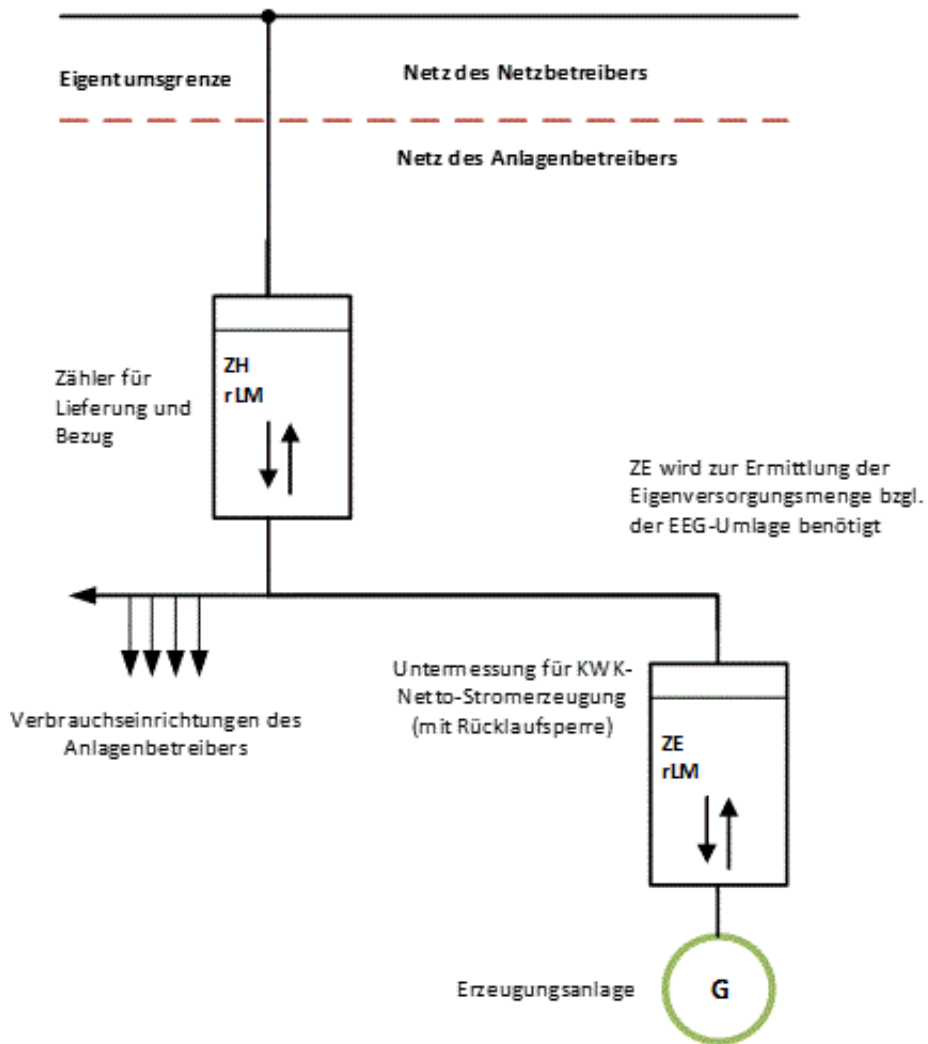
Characteristics

Meter

Application Examples

- Feed the total amount of energy produced directly into the grid of VNB
- Full supply and consumption on the same grid connection point
- Detection by separate meters
- Two direction meter to the generating plant (Z2), since captive use
- PV-plants, wind power plants
- Uninteresting for cogeneration units, as low rate

Surplus-supply without own consumption



Particularities

Charakteristik

- Own consumption and surplus feed
- Remuneration of PV-produced locally only for commissioning before the 01.04.2012
- Meter ZE is only necessary for systems with zoning according to rated power
- PV-captive use= ZE -ZH
- 10 kWp PV plant > Self-sufficiency, or > 10 MWh p. a. (Without proof of self-sufficiency: $EZA \leq 10\text{kWp}$ and ≤ 10 MWh p. a. Self-sufficiency)
- Meter ZE is only necessary for systems with zoning according to rated

Meter

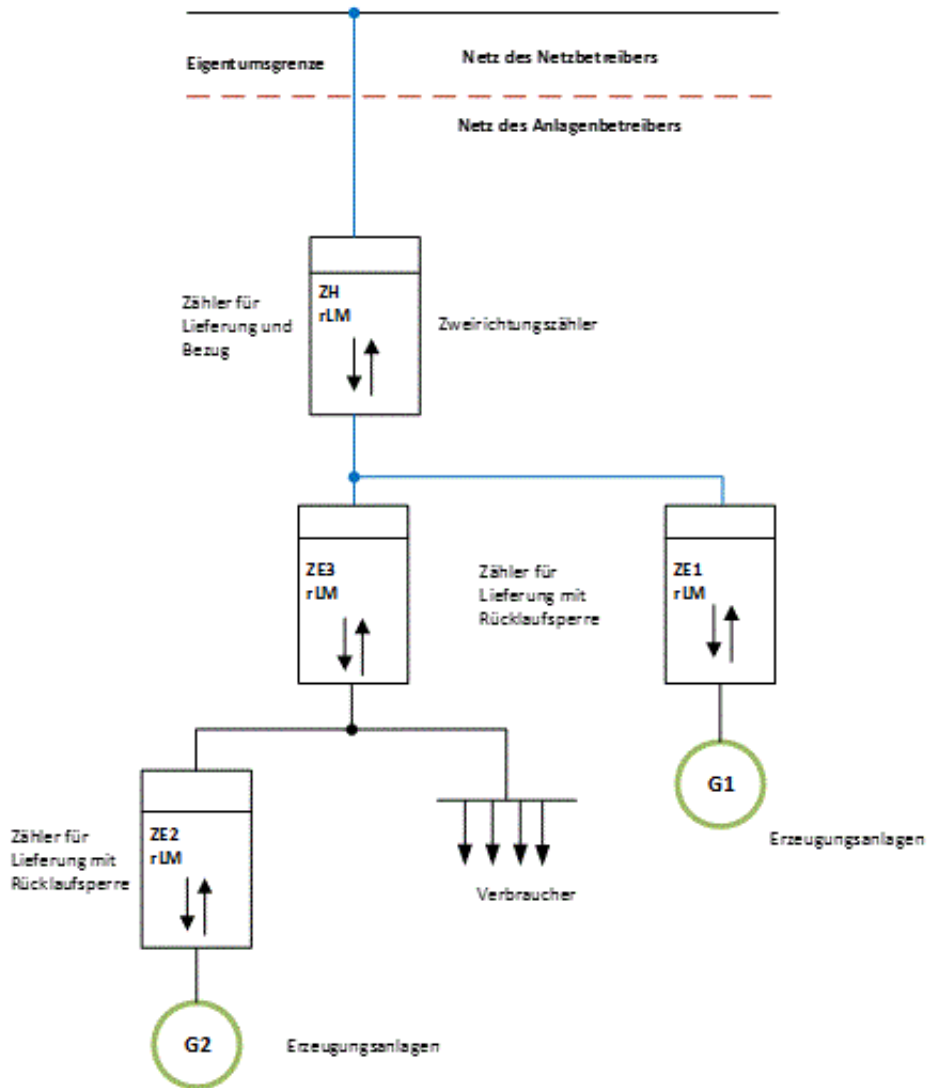
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Application Examples

- Personal consumption
- Their own consumption by EEG
- Personal consumption of CHP

Further definitions

Cascade-circuit



Special Features

Characteristics

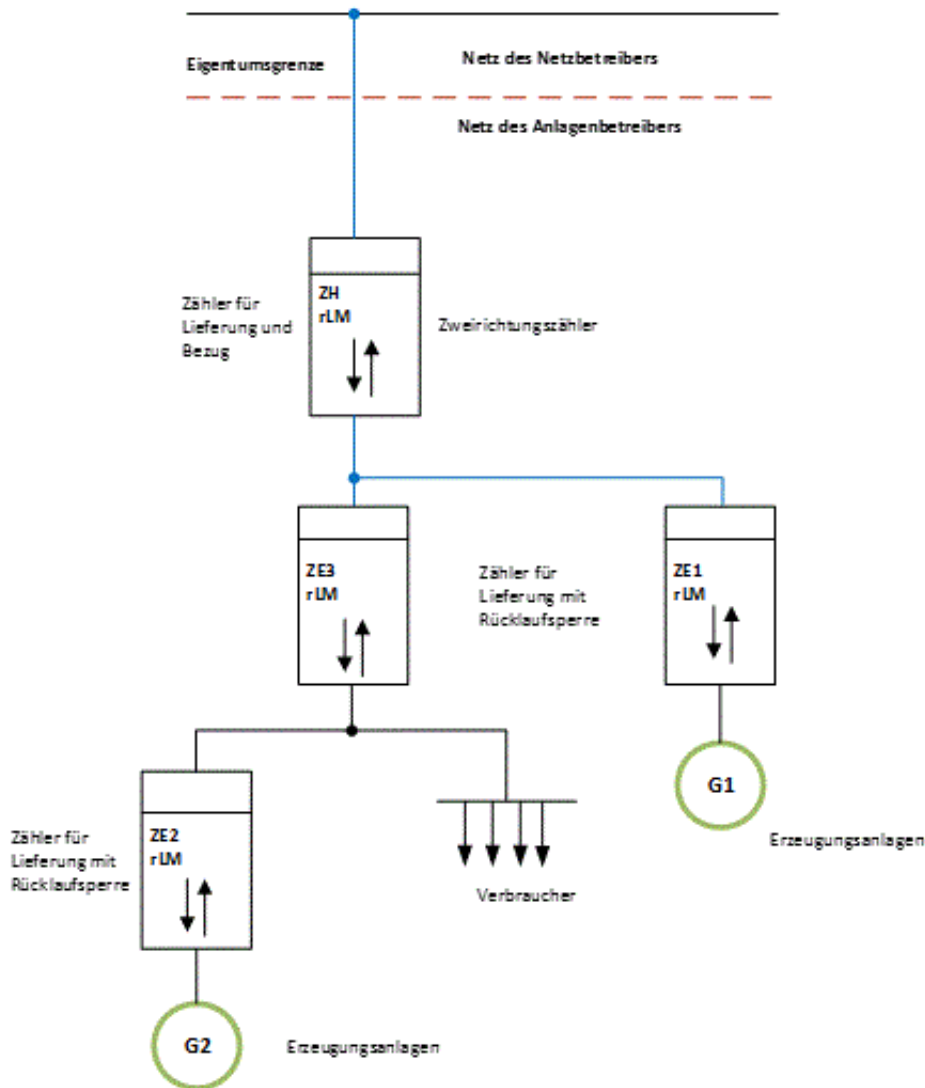
Zähler

- Separate production Meter
- Grid generation 1 Priority
- Generation 2 as a priority for self-sufficiency
- No consumers highlighted in blue area
- ZE1= generation PV-system
- ZE2= generation CHP-plant
- Grid connection CHP-plant= ZE3
- Grid connected PV-system= ZH ZE3
- Combinations of WWCA-equipment and EEG-equipment (PV)
- Self-sufficiency at >10kWp or >10MWh per annum.

Application Examples

- Attachment size limits, so that the measurement does not distort consumption!

KWK- und EEG-metering below



Special Features

Characteristics

If several different types of generating capacity (e.g. PV and CHP plants) feed into the grid. The background to this is that the remuneration of the respective type of system accordingly and must therefore be registered separately. For this reason, an additional meter

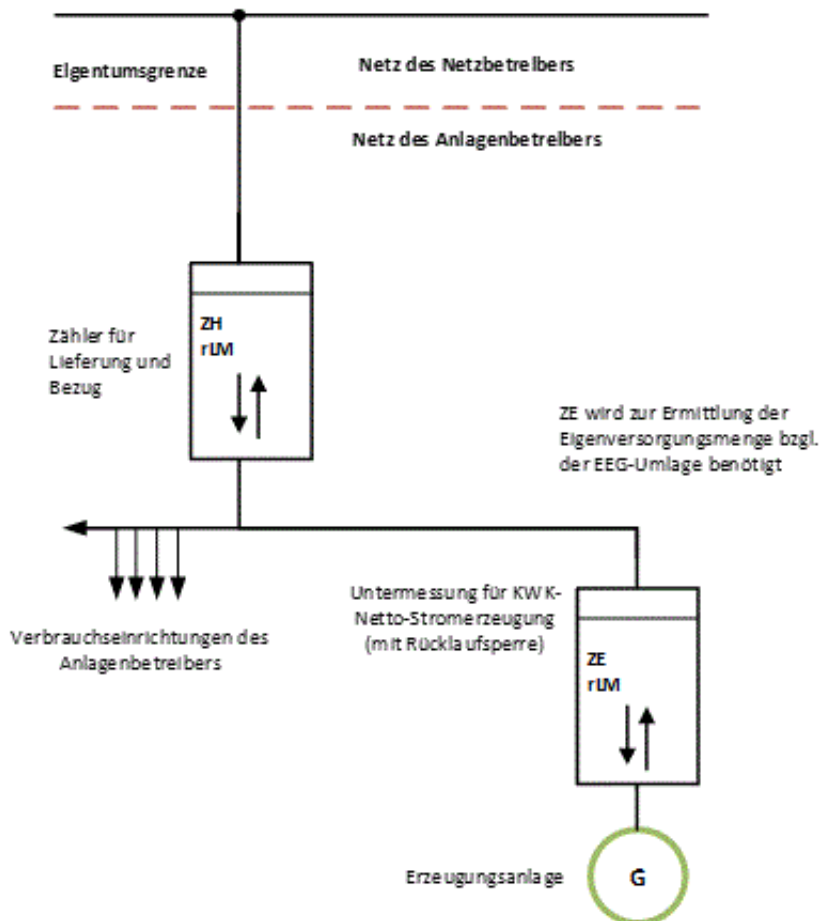
(here: Z2 - Changeset payer) is required, a clear identification of the individual by the generated electrical work is possible.

Meter

Application Examples

- ZE1= generation PV-system
- ZE2= generation CHP-plant
- Grid connection CHP-plant= ZE3
- Grid connected PV-system= ZH ZE3
- Combinations of WWCA-equipment and EEG-equipment (PV)
- Self-sufficiency at >10kWp or >10MWh per annum.
- Attachment size limits, so that the measurement does not distort consumption!

Mercantile balance-sheet transfer under EEG



Special Features

Characteristics	<p>§ notional full feed</p> <p>§ Billing side: total amount of current is fed directly into the net</p> <p>§ computational determination of electricity purchases by virtual metering points</p>
Meter	<p>§</p> <p>Actual electricity = electricity produced (PA) + net fabric(ZH) - feed(ZH)</p> <p>§ Meter Data should conform with the conditions for accounting (to MABI's terms) are in accordance with</p>
Application Examples	<p>§ Sale of CHP-electricity to tenants</p>