

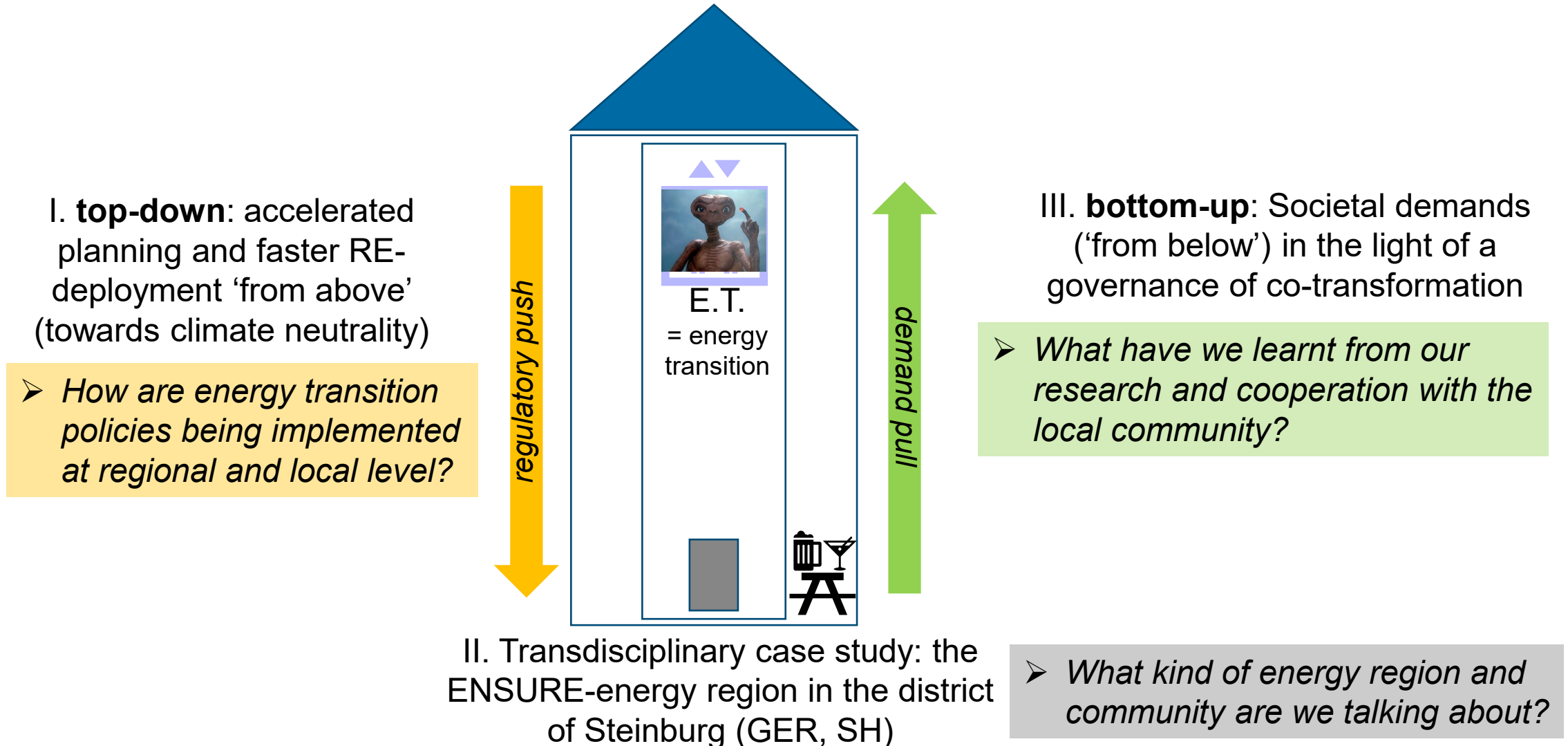


## Regional challenges of the energy transformation – top-down acceleration versus bottom-up demands

**Ryan Kelly, Dr. Melanie Mbah | BEHAVE 2023**

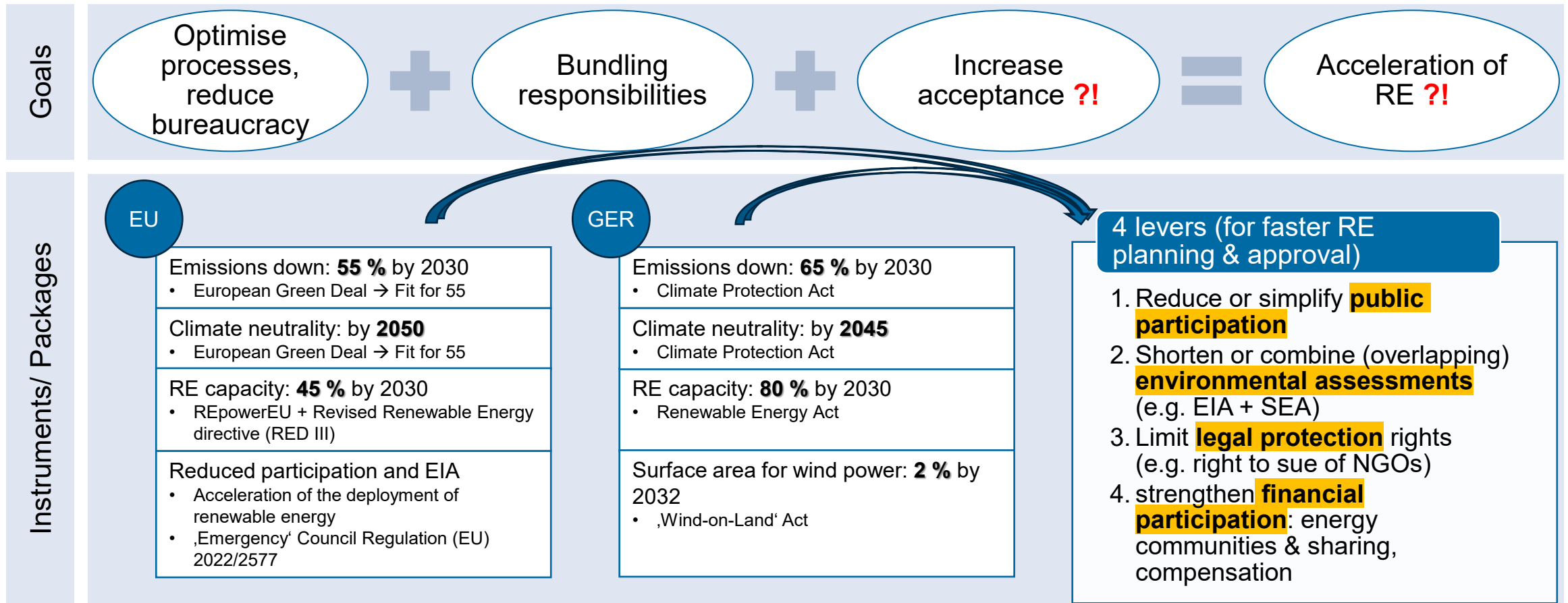
7th European Conference on Behaviour Change and Energy Efficiency, Maastricht, 28-29 November 2023

# Structure: „E.T. in the (regulatory) elevator“ – or pushing down hard = scaling-up fast?

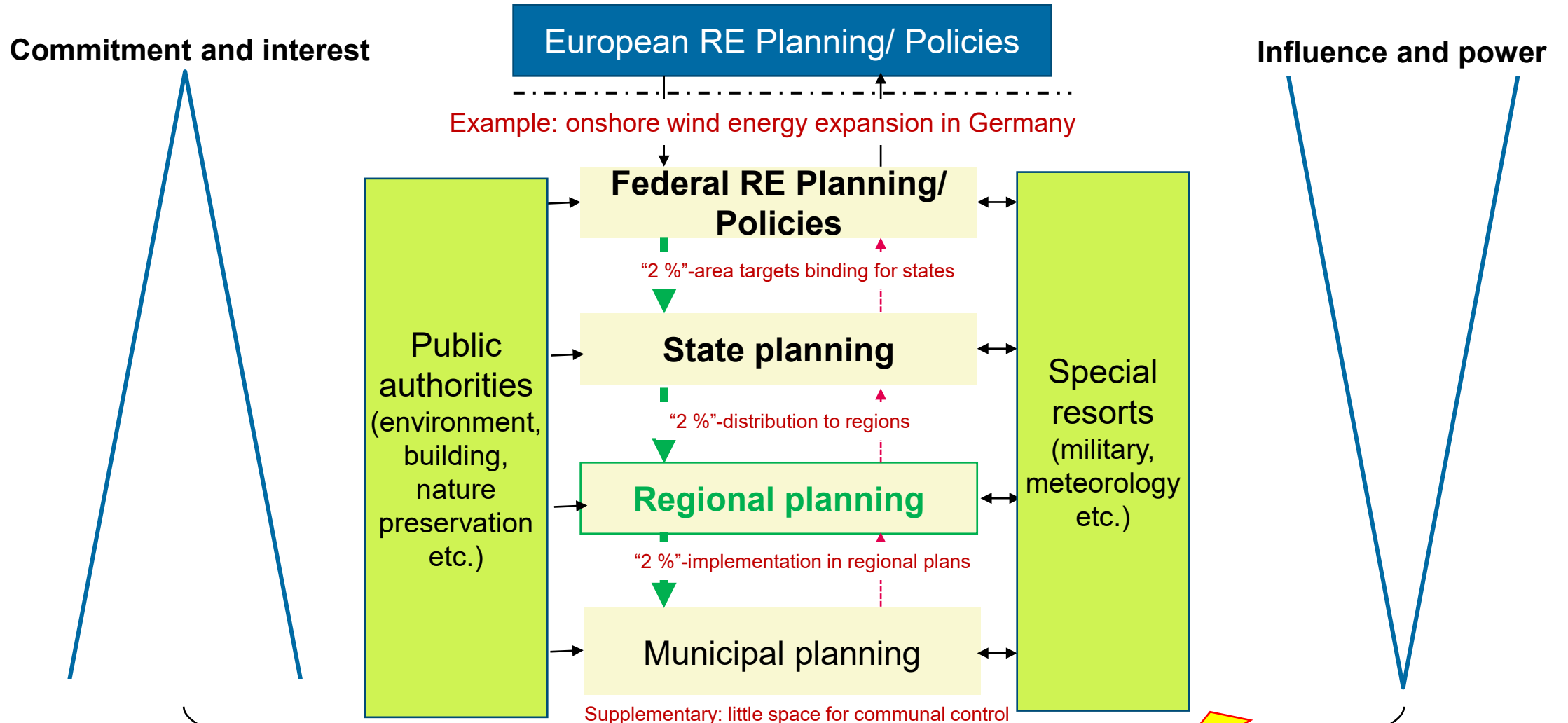


# I. Top-down: EU's legislation to accelerate the rollout of RE infrastructure

Acceleration in the sectors of renewable energy (especially wind turbines) and electricity grids



# I. Top-down: participation paradox and multi-level governance



Potential for **conflicts** and **resistance** during local implementation!

→ fair and participatory governance of the regional energy transition, but how?

## II. Case study: ENSURE-region district of Steinburg

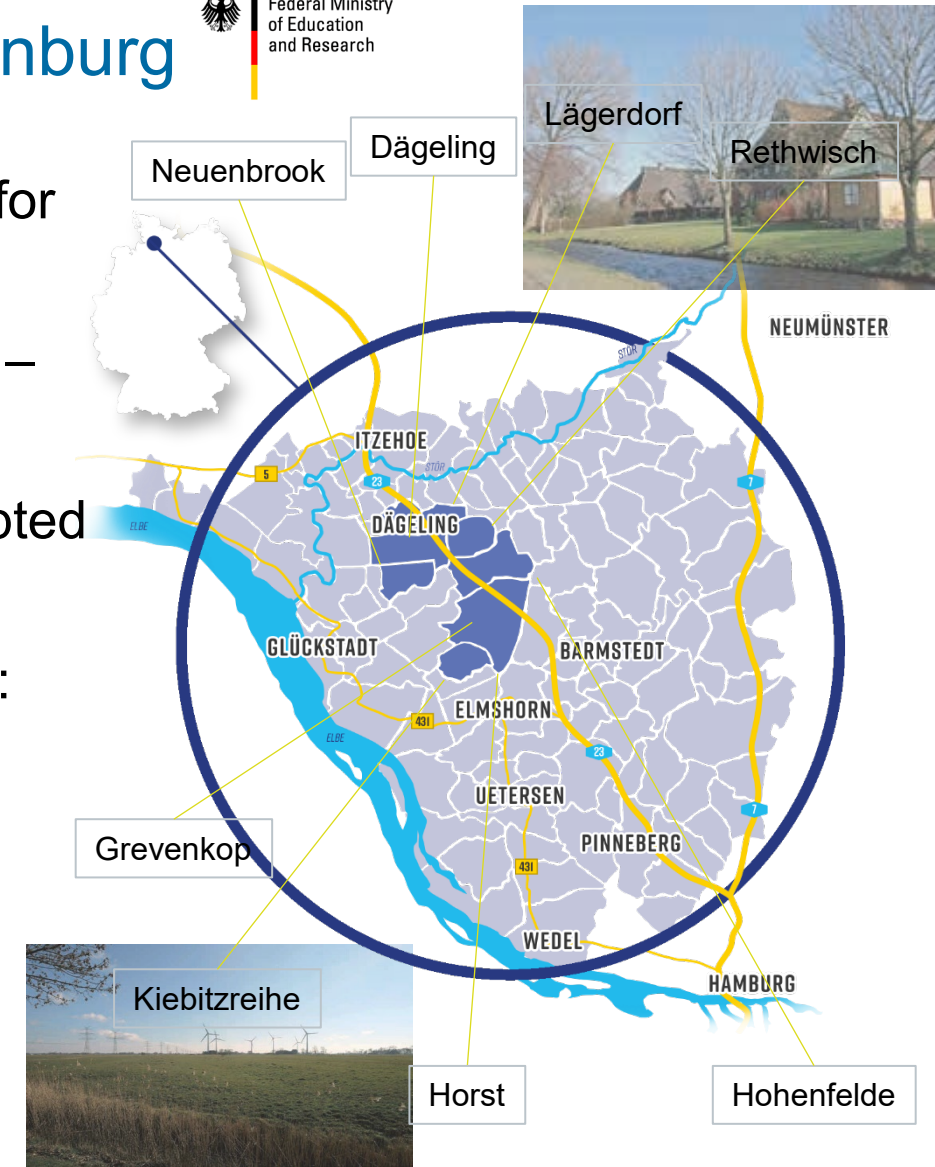
**Copernicus project ENSURE:** new energy grid structures for the energy transition

**Goals:** making the power grid fit for a climate-neutral future – theoretically, practically, *collaboratively*

**Our focus in the project:** societal demands for locally adapted planning & participation, context-sensitive Governance

**Case study** of the ENSURE region in Steinburg (GER, SH):

- Desk research and literature review,
- 13 guide-based semi-structured interviews,
- 2 stakeholder WS on RE planning & participation,
- 2 stakeholder WS on co-visioning and -narration,
- 1 reflection workshop with ENSURE-scientists



# III. Bottom-up: Energy Transition Governance of Co-Transformation

## 1. Dilemma: Coordination

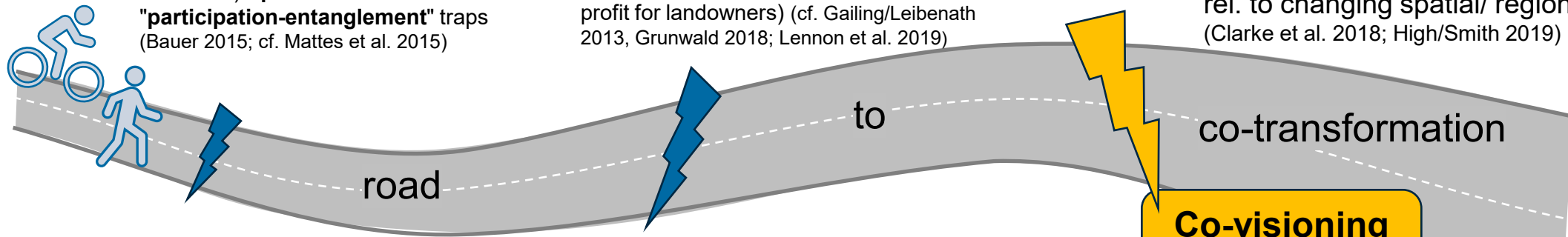
interdependencies and friction in multi-level governance (vertical and horizontal): "**political-**" and "**participation-entanglement**" traps (Bauer 2015; cf. Mattes et al. 2015)

## 2. Dilemma: Distribution

asynchrony between **tangible burdens** (e.g. visibility, landscape) and **intangible benefits** (e.g. climate protection, security, profit for landowners) (cf. Gailing/Leibenath 2013, Grunwald 2018; Lennon et al. 2019)

## 3. Dilemma: Imagination

challenge of weighing **today's burdens** and **effects** vs. **future benefits** of RE → rel. to changing spatial/ regional identities (Clarke et al. 2018; High/Smith 2019)



### Co-regulation

→ cf. *procedural justice*

Participation on the basis of binding rights of **co-determination** (Olbrich/Fünfgeld 2022) as well as **participatory** and experimental forms of **regulation** (Bauknecht et al. 2019; van der Waal et al. 2020) → important: socio-spatial and cultural-historical specifications of a region

### Co-allocation

→ cf. *distributive justice*

Collaborative rules for fair allocation of **financial benefits** from local RE projects (cf. Mundaca et al. 2018), regarding financial participation opportunities (e.g. citizen energy), value creation and public services

### Co-visioning & -narration

→ cf. *intergenerational justice*

Co-Development of collectively shared **visions** of desired **futures** ("goal orientation") and supporting **narratives** ("action orientation") (Chabay et al. 2019; Chateau et al. 2021); reflection on historical, current practices and collective imaginations of desirable futures

### III. Bottom-up: Co-visioning and -narration process

Assumption: Energy landscapes as socially constituted spaces are not only created through historical and contemporary practices, but also change through a collective practice of imagination (cf. Chateau et al. 2021; Späth/Rohracher 2010).



#### Approach:

- 3 x workshops on co-visioning and -narration with locally anchored stakeholders in Steinburg + 13 semi-structured interviews
  1. Co-development of an "Energy and Spatial Vision 2040: Steinburg"
  2. Reflection on identified narratives "about the region" (researchers)
  3. Co-dissemination of narratives „from the region“ (stakeholders)

Vision

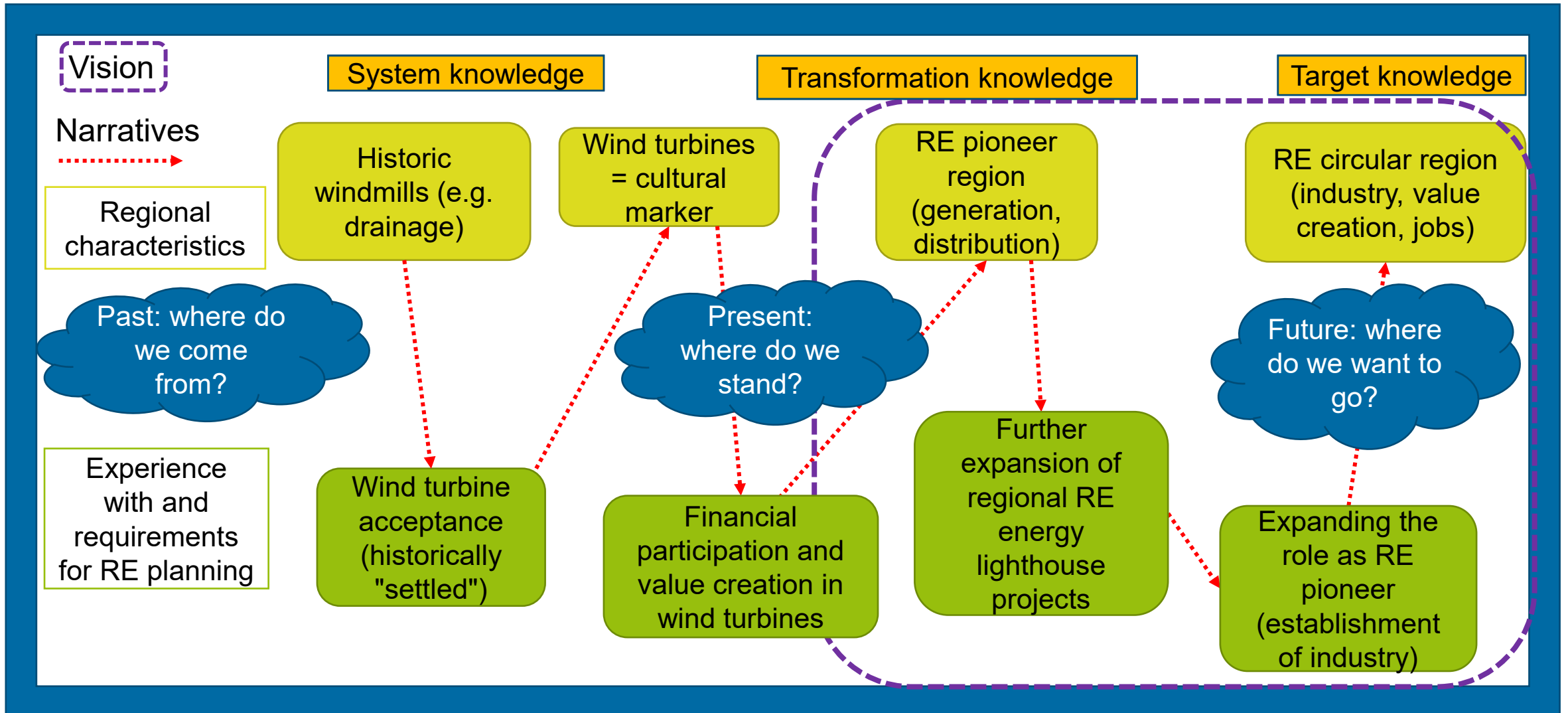
= a future-oriented, ambitious **target** that outlines a **desired future state** or outcome in the sense of a '*goal orientation*' (cf. David et al. 2013)

Narrative



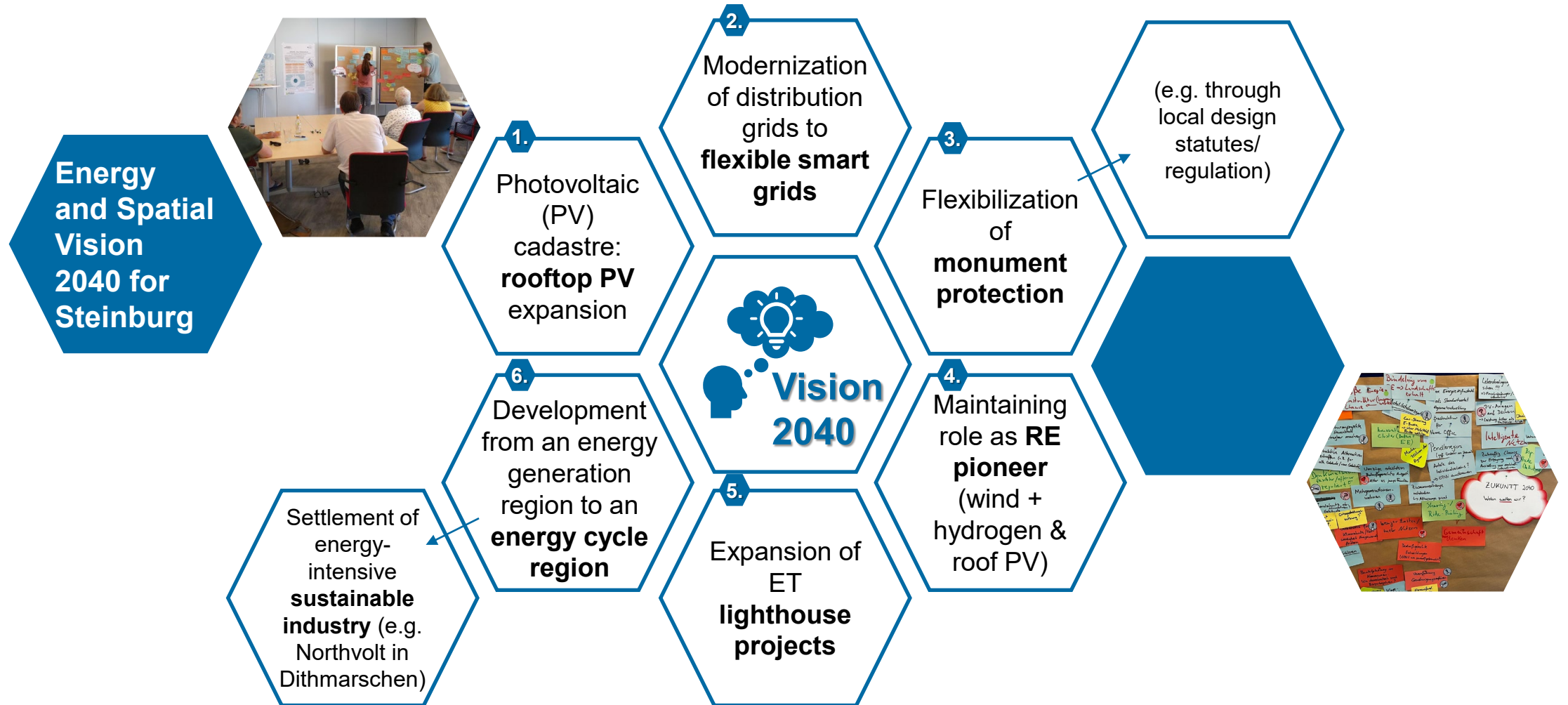
= narrative patterns provide a **contextual** and often **chronological** basis for describing events and thus **construct social realities** as the basis for a '*(transformative) action orientation*' (cf. Espinosa et al. 2017; Fina/Georgakopoulou 2011)

### III. Bottom-up: co-visioning and -narration process





### III. Bottom-up: co-developed vision in the district of Steinburg



# III. Bottom-up: co-developed narratives in the district of Steinburg

## Co-developed meaningful, action-guiding narratives .....➔

### Narrative 1

**"Hand in hand for the preservation of the cultural landscape":** sense of "emotional we" and historical community of support in the context of collective landscape management for services of general interest (keyword: "below sea mentality")

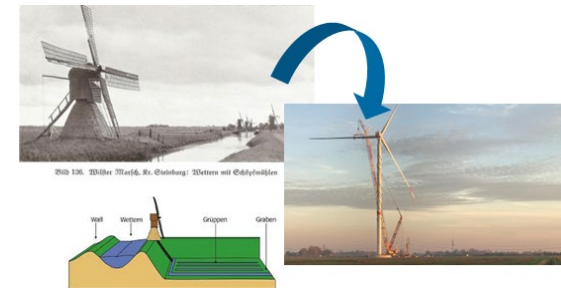
➔ *ex. "Landscape and spatial identity (for us) has to do with becoming and having become, (in the sense of) historical descent and an 'emotional we'"*



### Narrative 2

**"Energy region from past, present to future":** Wind (power) as an important resource, part of the regional identity and cultural landscape marker in the flat marshlands (keyword: "culture of wind farming")

➔ *ex. "Wind here is a cultural-historical component and an identity marker, (there is) no categorical refusal. (...) But the critical point is fair distribution"*



### Narrative 3

**"From the region for the region":** Local value creation and regionality are of particular importance in the expansion of renewable energies (keyword: "energy cycle region")

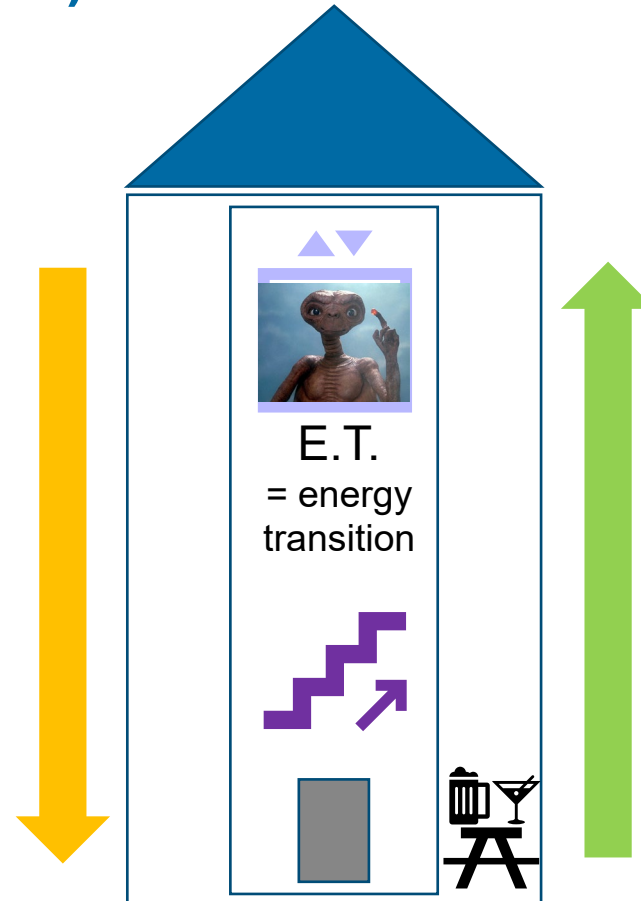
➔ *ex. "In addition to participation (...), the influence, i.e. the idea of ownership and empowerment of the citizens, is very important. (...) local benefits must be transparent"*



# Conclusion „E.T. in the (regulatory) elevator – or maybe take the (social) stairs once in a while

➤ *How are energy transition policies being implemented at regional and local level?*

- Current transition policies are strongly **top-down orientated**
- Practitioners + R&D focus on technology and regulation
- Despite failure in local implementation due to socio-spatial factors
- Risk: further **pressure** on & **disengagement** of **local communities**



➤ *What have we learnt from our research and cooperation with the local community?*

- Energy transition = social community project  
→ bottom-up demands can be supported by **transdisciplinary planning** approaches and **context-sensitive participation**
- Co-development of **regional visions** (as 'goal orientation') and **narratives** ('as action orientation') can support regional **co-transformation**

➤ *What kind of energy region and community are we talking about?*

- historical rural (wind) energy region with a strong sense of **regional identity, connection to landscape** and **community spirit**

Thank you for your attention!



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