RSE Ricerca Sistema Energetico | we move research

European Committee of the Regions

ENVE
8th term of office

9th meeting of the Commission for the Environment, Climate Change and Energy

Assisi, Italy, 18 June 2026, 10:00 – 15:10

Chair: Kostantinos BAKOYANNIS (EL/EPP)

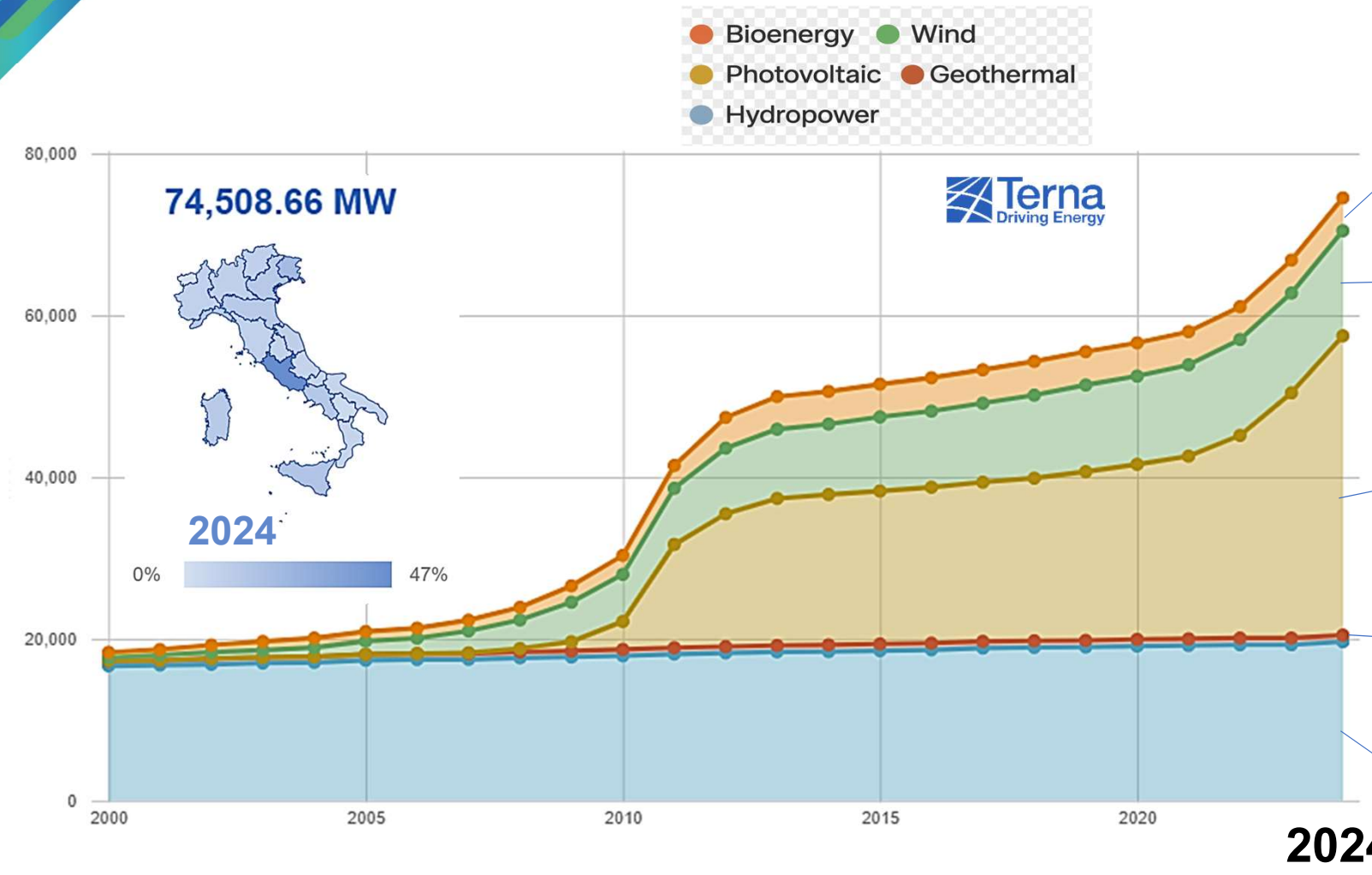
Domus Pacis Assisi
Piazza Porziuncola 1
06081 Assisi, Italy

EU Energy Security Framework

Franco Cotana
CEO RSE SPA

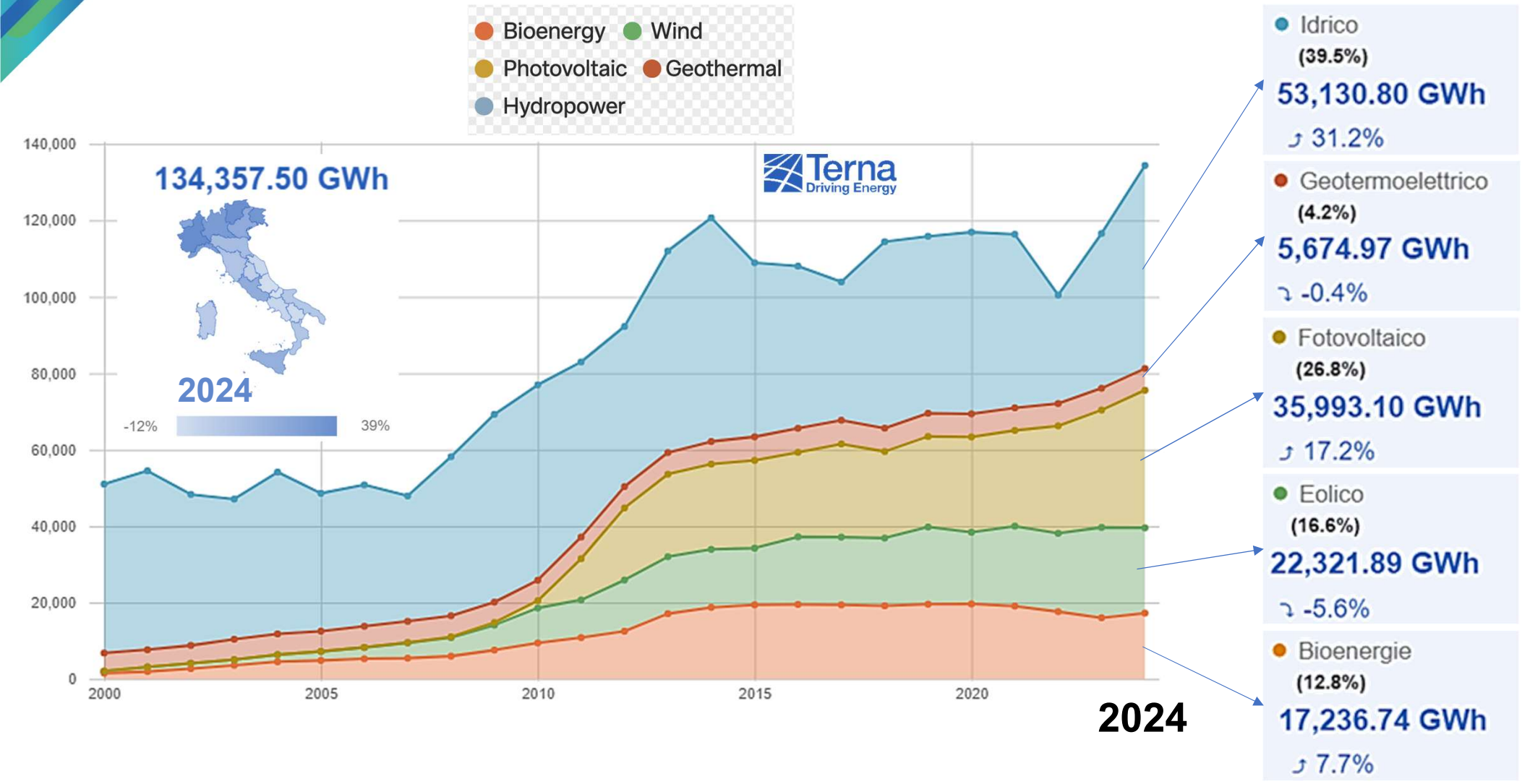
Assisi, 18° june 2026

Installed capacity trend by renewable

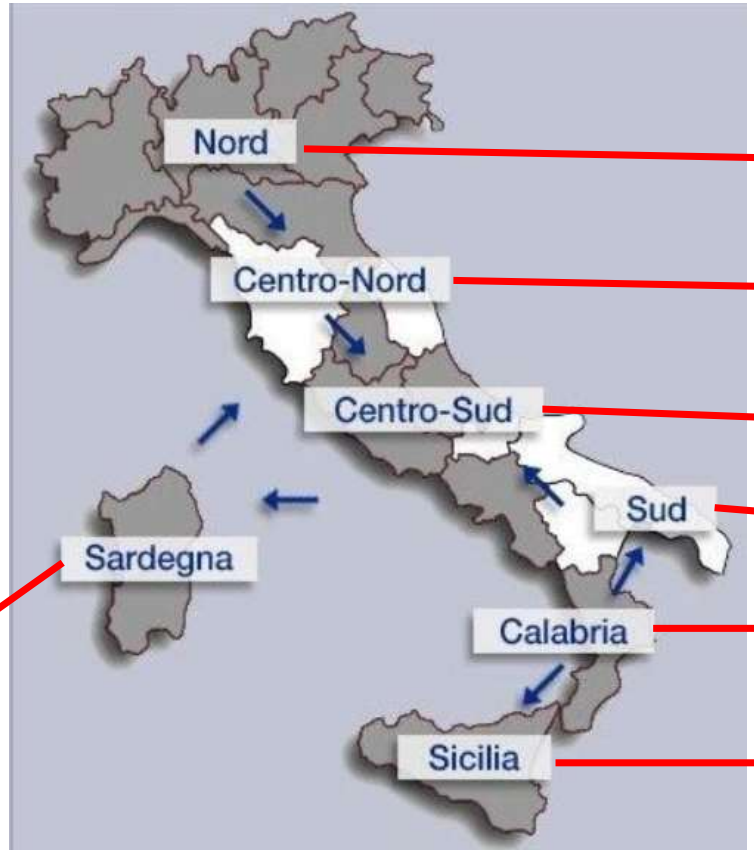


- Bioenergie **(5.5%)** **4,061.98 MW** ↴ -0.5%
- Eolico **(17.4%)** **12,990.30 MW** ⤴ 5.4%
- Fotovoltaico **(49.7%)** **37,002.14 MW** ⤴ 22.1%
- Geotermoelettrico **(1.1%)** **817.09 MW** → 0%
- Idrico **(26.4%)** **19,637.16 MW** ⤴ 1.9%

Generation trend by renewable



Burden Sharing vs Connection requests



38,0% / 6,3%

8,2% / 2,9%

15,7% / 10,2%

13,1% / 36,3%

4,0% / 4,4%

13,1% / 23,9%

NCEP distribution of RES capacity

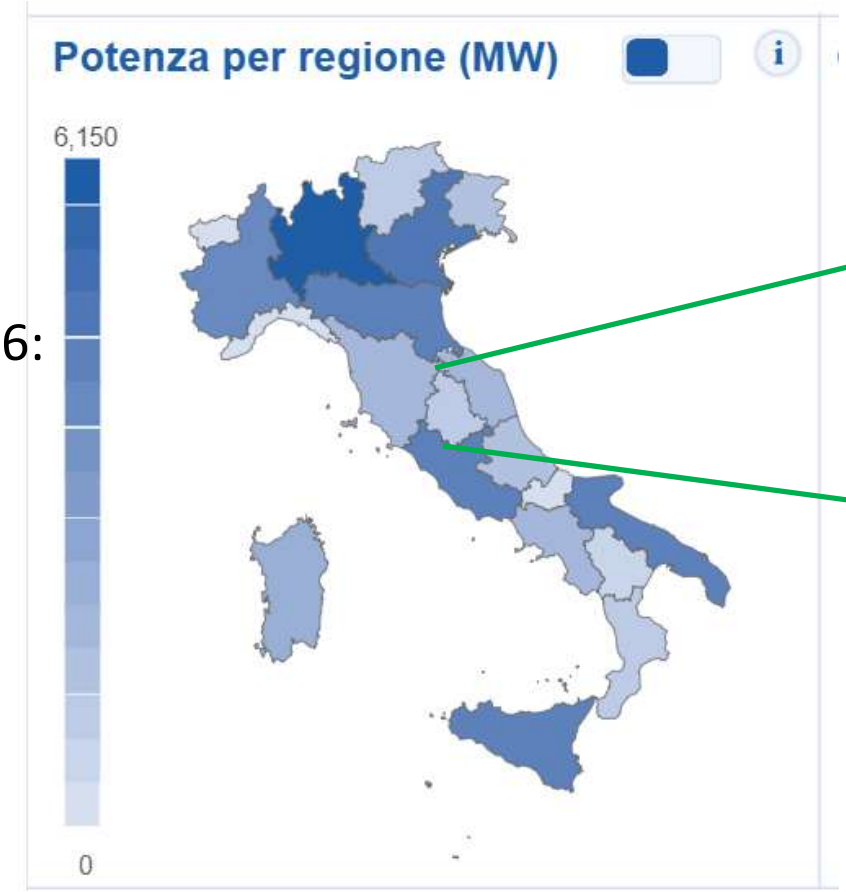
7,8% / 15,9%

Distribution according to connection requests to the TSO (TERNA)

PV in Umbria

Italy (HV, MV, LV) @May 2026:

No. 2.166,235 plants
46,1 GW capacity



Umbria (HV, MV, LV) :

No. 41.984 plants (1.9%)
0,833 GW capacity (1.8%)

[Generazione Energia | Dati Terna Driving Energy]

Suitable Areas Decree: annual burden sharing

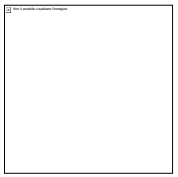
TABELLA A- RIPARTIZIONE REGIONALE DI POTENZA MINIMA PER ANNO ESPRESSA IN MW

Regione	Obiettivi di potenza aggiuntiva [MW]									
	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030
Abruzzo	4	65	196	454	640	850	1.086	1.350	1.648	2.092
Basilicata	145	204	329	543	748	973	1.218	1.486	1.779	2.105
Calabria	45	95	210	549	857	1.206	1.603	2.055	2.568	3.173
Campania	74	237	569	909	1.297	1.728	2.206	2.736	3.325	3.976
Emilia-Romagna	100	343	860	1.288	1.851	2.504	3.263	4.143	5.164	6.330
Friuli-Venezia Giulia	30	96	321	404	573	772	1.006	1.280	1.603	1.960
Lazio	82	305	544	933	1.346	1.829	2.396	3.059	3.835	4.757
Liguria	29	80	122	198	281	382	504	653	834	1.059
Lombardia	184	622	1.521	1.963	2.714	3.592	4.616	5.812	7.208	8.766
Marche	32	110	241	457	679	930	1.217	1.544	1.916	2.346
Molise	2	38	59	175	273	383	509	651	812	1.003
Piemonte	78	285	851	1.098	1.541	2.053	2.645	3.330	4.121	4.991
Puglia	163	507	876	1.672	2.405	3.213	4.104	5.084	6.165	7.387
Sardegna	34	175	468	998	1.553	2.207	2.980	3.892	4.969	6.264
Sicilia	144	473	952	1.842	2.764	3.847	5.120	6.616	8.375	10.485
Toscana	42	150	359	667	1.019	1.444	1.958	2.580	3.332	4.250
TrAA - Bolzano	11	41	120	139	186	239	298	364	438	515
TrAA - Trento	11	41	108	140	195	258	333	419	520	631
Umbria	15	60	135	279	429	609	823	1.079	1.384	1.756
Valle d' Aosta	1	4	10	27	47	75	112	162	231	328
Veneto	125	413	1.088	1.373	1.889	2.483	3.164	3.947	4.847	5.828
Totale	1.348	4.344	9.940	16.109	23.287	31.578	41.160	52.243	65.075	80.001

+80 GW by 2030.

Additional RES-E capacity compared to 2020

- Increase in renewable capacity attributable only to wind and solar sources
- Choice of energy mix entrusted to Regions and Autonomous Provinces
- Criteria by source underlying burden sharing:



Onshore wind capacity

- Theoretical development potential, quantified based on resource availability and eligible areas
- Maximum wind turbine density threshold
- Repowering of end-of-life plants

Photovoltaic capacity

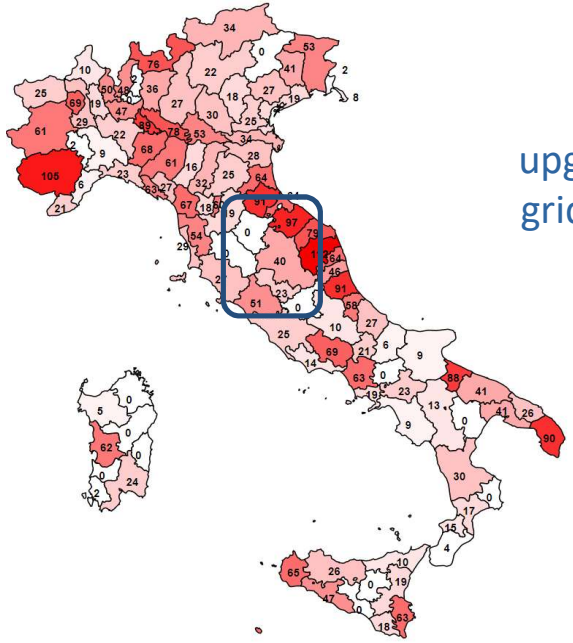
- Theoretical development potential, quantified based on resource availability and eligible area
- Electricity demand
- GDP per capita

Development of distribution networks (1/2)

Electricity distribution networks play a central role in the energy transition, having to support the end-use electrification and the further diffusion of distributed RES generation.

For distribution operators, evolution of load and generation —and their power profiles— remains uncertain, requiring a scenario-based planning.

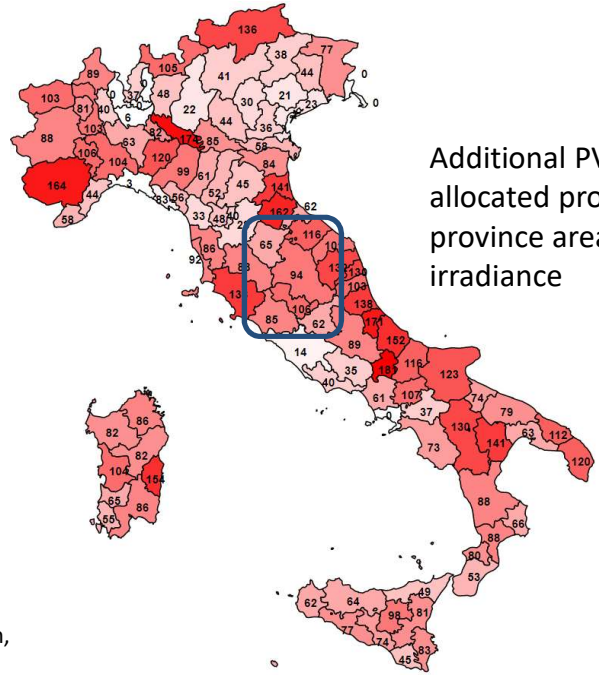
Local and Regional Authorities can help this process, increasing the synergies between authorization procedures for grids and for Distributed Generation development (anticipating instead of chasing; lowering the risk of inefficient investments).



Additional PV capacity allocated proportionally to the existing load (~self-consumption)

Unitary cost for upgrading distribution grids for +1 MW of PV

[k€/MW PV]



Additional PV capacity allocated proportionally to the province area and the solar irradiance

[Source: RSE estimation, based on public data]

Grazie per l'attenzione

Franco Cotana
Franco.cotana@rse-web.it

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