

Network analysis of Goal 7 in North and Central Asia

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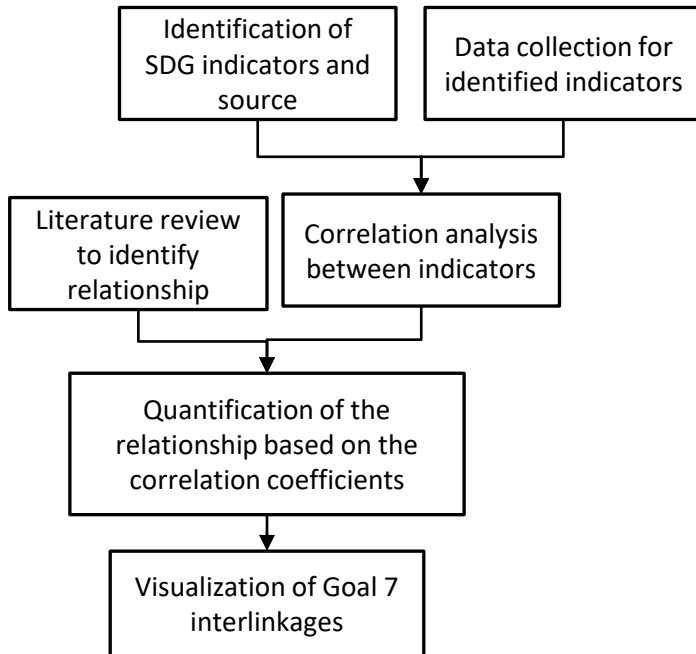
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1. Rationale of network analysis of Goal 7 in North and Central Asia

- SDGs are highly intertwined in nature and cannot be addressed in isolation
- Help better understand and manage the interlinkages between Goal 7 and other sustainable development goals
- Leverage the interlinkages to guide informed policy recommendations in a holistic and integrated manner
- Ensure that the achievement of Goal 7 is aligned with sustainable development objectives in the subregion
- Provide reference for the 2SLS regression analysis

2. Methodology description



- Data mainly collected from Asia Pacific SDG Gateway, database of UN agencies, OECD and the World Bank

- Correlation analysis performed only with stationary variables

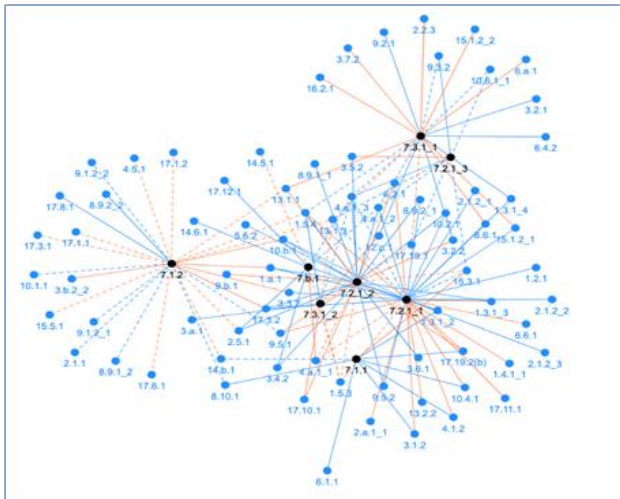
- Method specification:

- I. Capture correlation coefficients larger than 0.5
- II. Determine significant correlation with 0.05 cut-off p-value
- III. Applied to four different [country groupings](#)
- IV. Leave out irrelevant interlinkages

- [Visualization](#)

3. Interlinkages of Goal 7 by different country groupings

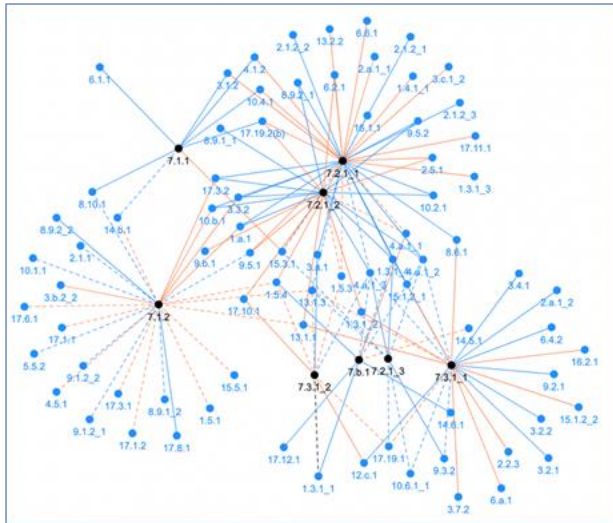
3.1. Results in North and Central Asia



- **Highly correlated goals:** Goal 1 (no poverty), Goal 4 (quality education), Goal 9 (innovation and infrastructure), Goal 13 (climate change) and Goal 17 (partnership for the goals)
- **Central nodes:** 7.2.1 & 7.3.1
- **Interlinkages mapping**

3. Interlinkages of Goal 7 by different country groupings

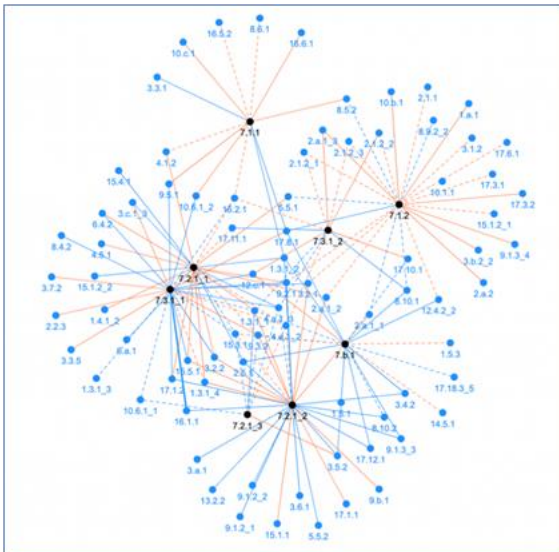
3.2. Results in North and Central Asia excluding Russian Federation



- **Highly correlated goals:** Goal 1 (no poverty), Goal 4 (quality education), Goal 9 (innovation and infrastructure), Goal 10 (reduced inequalities) and Goal 13 (climate change)
- **Central nodes:** 7.2.1 & 7.3.1
- **Interlinkages mapping**

3. Interlinkages of Goal 7 by different country groupings

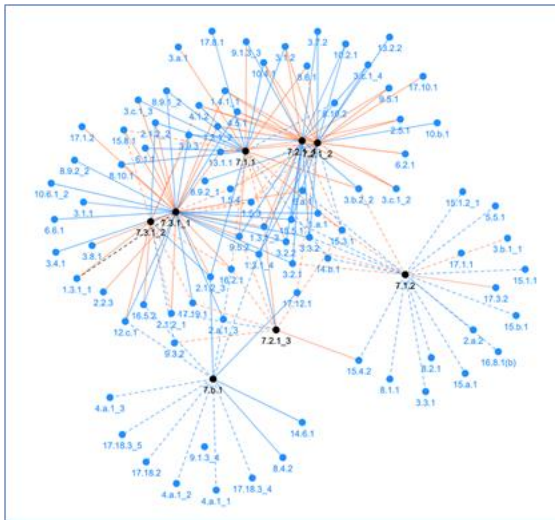
3.3. Results in resource-rich countries



- **Highly correlated goals:** Goal 1 (no poverty), Goal 3 (good health and well-being), Goal 4 (quality education), Goal 9 (industry, innovation and infrastructure), Goal 12 (responsible consumption and production) and Goal 17 (partnership for the goals)
- **Central nodes:** 7.2.1 , 7.3.1 & 7.b.1
- **Interlinkages mapping**

3. Interlinkages of Goal 7 by different country groupings

3.4. Results in hydro-reliant countries













- **Highly correlated goals:** Goal 1 (no poverty), Goal 3 (good health and well-being), Goal 9 (industry, innovation and infrastructure) & Goal 15 (life on land)
- **Central nodes:** 7.1.1 , 7.2.1 & 7.3.1
- **Interlinkages mapping**

4. Findings and conclusion

By indicators:

- Indicators of Goal 7 are strongly correlated to those of Goal 1, Goal 4, Goal 9, Goal 13 and Goal 17

- 7.1.1 (Access to electricity) ->   
- 7.2.1 (Renewable energy consumption) ->    
- 7.3.1 (Energy intensity) ->   
- 7.1.2 & 7.b.1 -> Mostly insignificant correlations

4. Findings and conclusion

By country groupings:

- The interlinkages show similar patterns for the four country groupings, distinct interlinkages can be spotted for certain groups

- Whole subregion ->



- Whole subregion excluding Russia ->



- Resource-rich countries ->








- Hydro-reliant countries ->



THANK YOU !

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