



*Introduction of activity for LCS  
in Japan and Our discussion points  
for our scenario development*

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**I would like to introduce...**

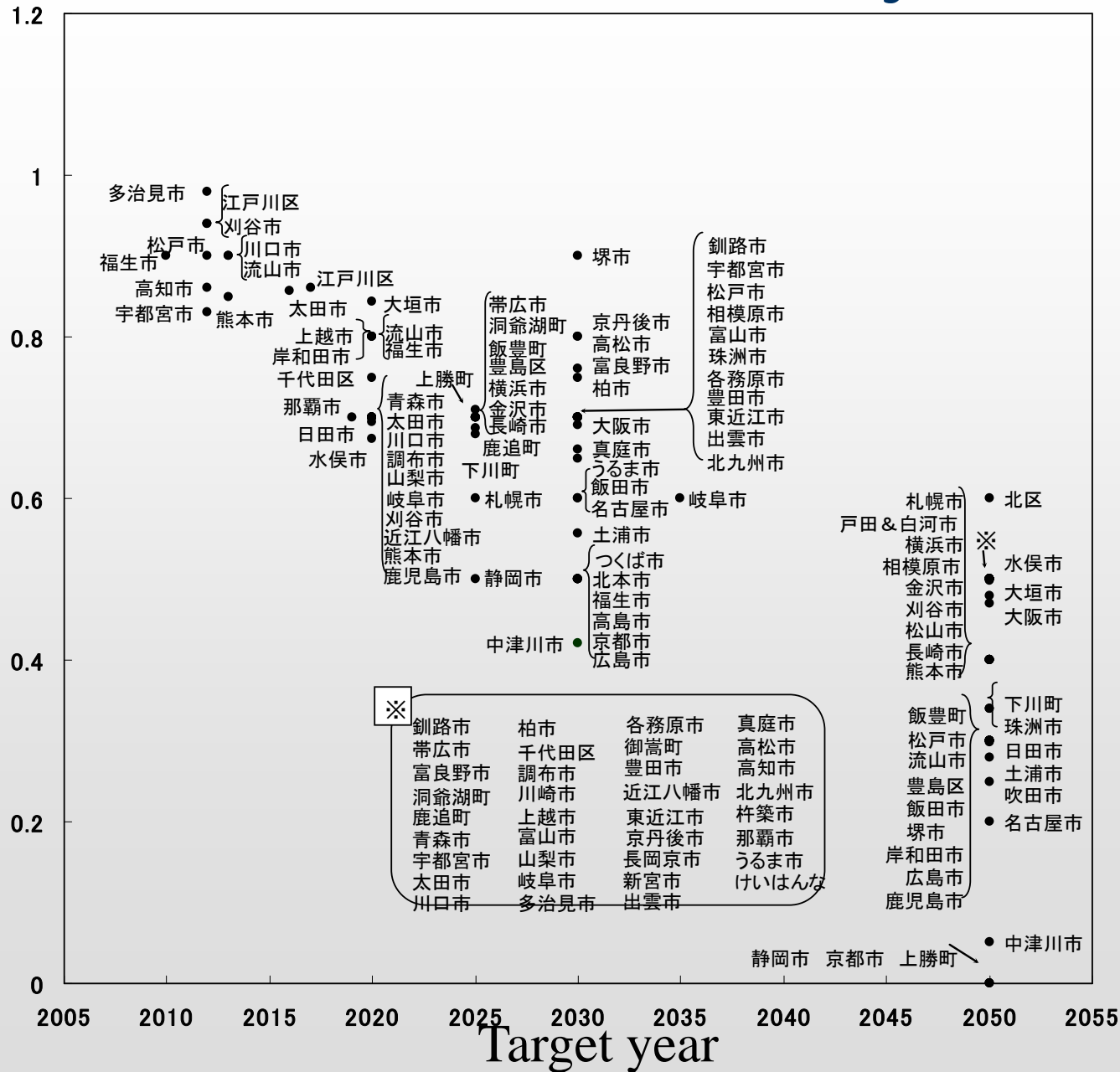
- Environmental model city
- Multi-regional model

# Environmental model city

- The office of prime minister invited it to develop low carbon society as a local level in this summer.
- The criteria are
  - ①drastic emission reduction target
  - ②leading proposal
  - ③considering characteristics of the area
  - ④high feasibility
  - ⑤sustainability
- 82 cities or states applied it and 6 groups were selected as environmental model cities, and 7 groups were selected as candidates.

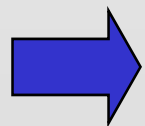
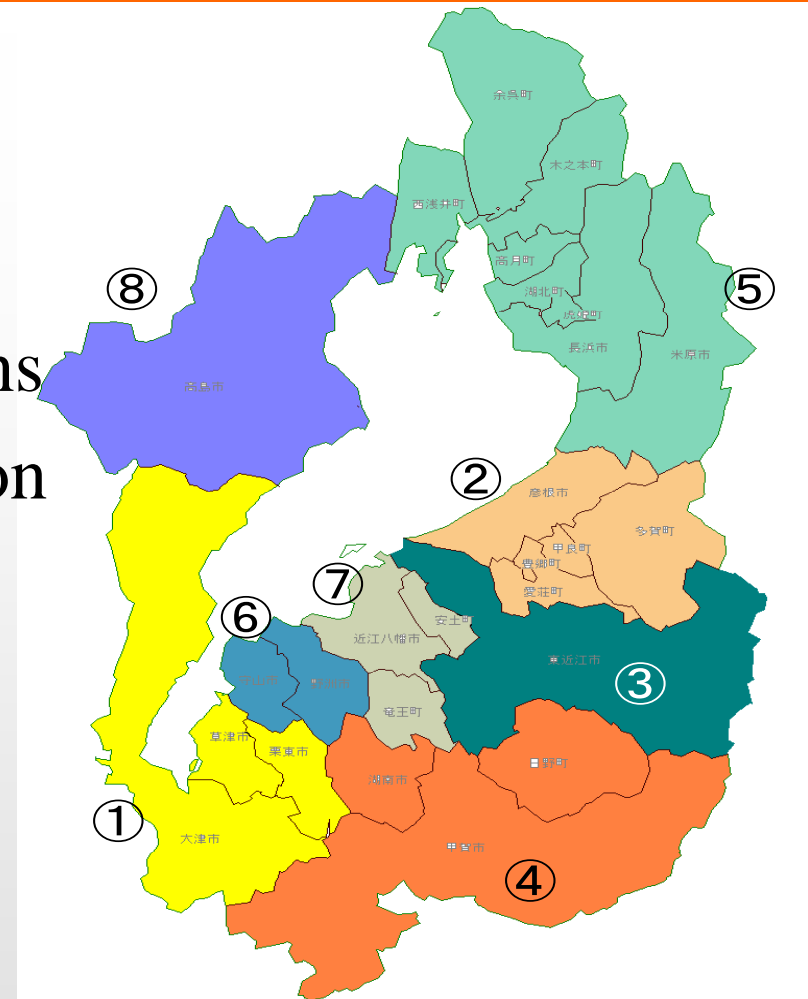
# The Environmental model city

Emission Reduction target  
compare to base year



# Multi-regional model

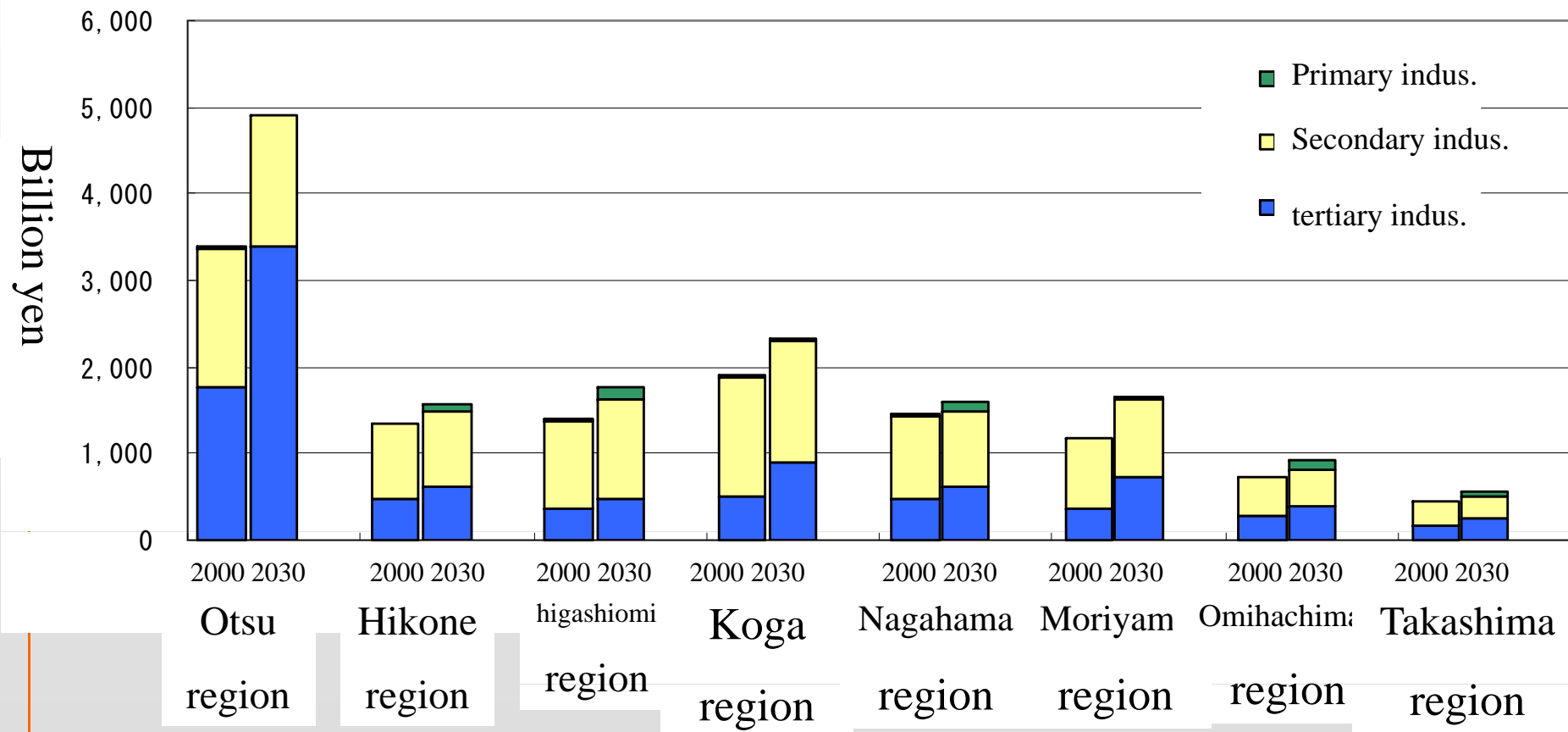
- It can
  - Describe trading among regions
  - develop scenarios of each region
    - Estimate social economic indicator for each region
    - Identify countermeasures for each region



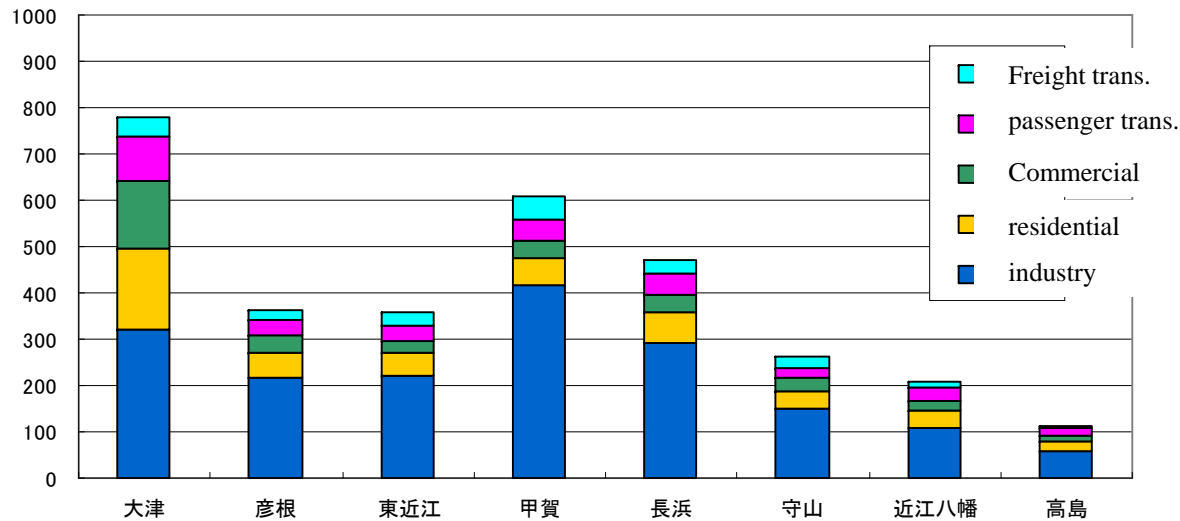
**To develop more concrete local scenario.**

- And i will also develop land use model. (otherwise i cannot graduate the university...)

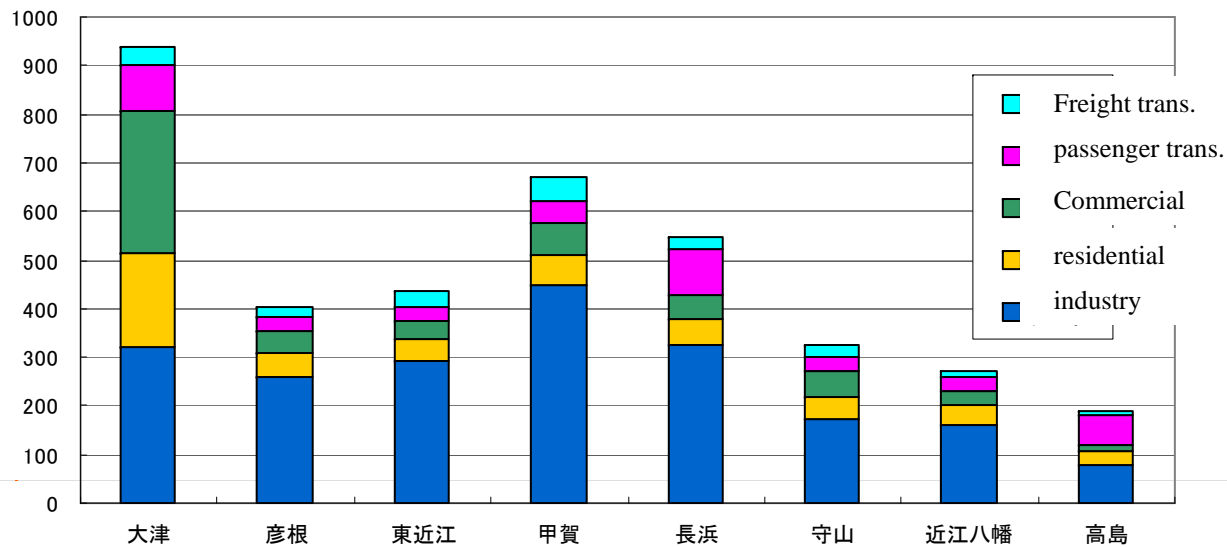
# EX.1 production volume by regions at 2000 and 2030



## EX.2 CO<sub>2</sub> emissions by regions in Shiga



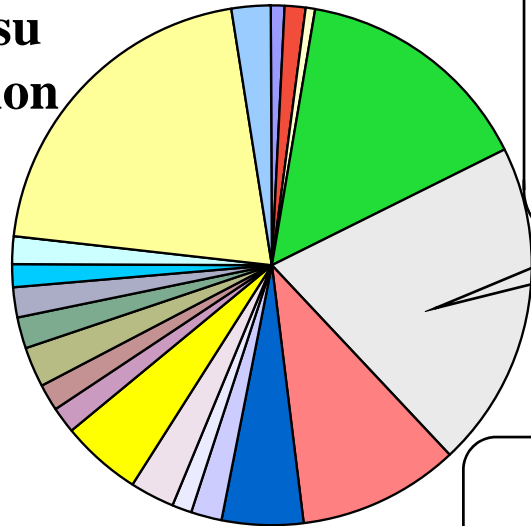
CO<sub>2</sub> emissions by regions in Shiga (base year) (kt-C)



CO<sub>2</sub> emissions by regions in Shiga (BaU case of 2030)

# EX.3 Breakdowns of regional countermeasures

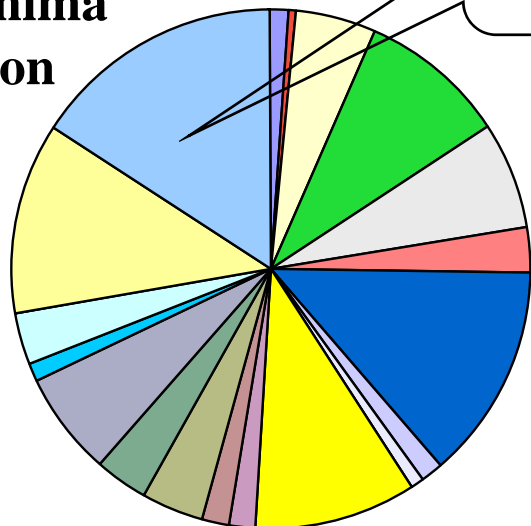
Otsu region



Improvement of energy intensity at commercial sector

Carbon sink of CO<sub>2</sub> by forests

Takashima region



- residential
  - commercial
  - passenger trans.
- Change of activity
- residential
  - commercial
  - industry
  - passenger trans.
  - Freight trans.
- Improvement of energy intensity
- residential
  - commercial
  - industry
- Improvement of carbon intensity
- residential
  - commercial
- PV generation
- industry
- Biomass heat
- industry
- Waste heat
- passenger trans.
  - Freight trans.
- biomass fuel
- passenger trans.
  - Freight trans.
- Compact city and conversion of transport
- Fuel mix change
  - carbon sink of CO<sub>2</sub> by forests

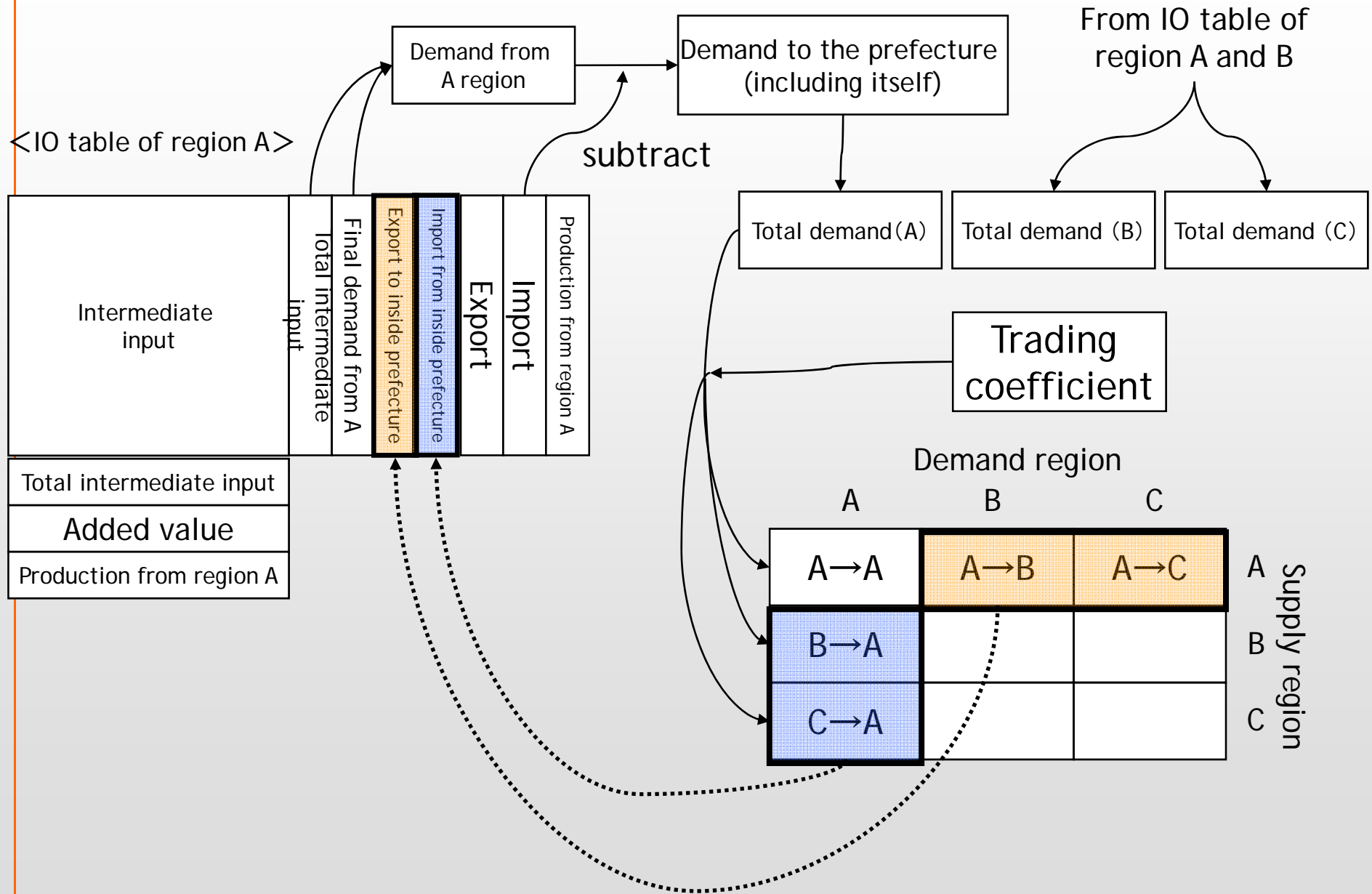


# Our discussion points for our scenario development

- Co-benefit
  - aged society and LCS, employment and LCS
- Easy to imagine
  - Specific qualitative scenario

**Thank you!!**

# Relationship between interregional IO table and trading table



# The structure of Multi-regional model

